

Sketches of Stars & Pebbles of Wisdom: A Postmodernist View of Cognition, Theosophy and Aesthetics in the New Age

Vuk Uskoković*

* Corresponding author: vuk21@yahoo.com; vuk.uskokovic@tardigradenano.com; vuskokovic@sdsu.edu.

Abstract In this extensive socio-philosophical essay written in 2007 and then updated sporadically for over 15 years, the author unleashes his imagination and acquaints the reader with a unique worldview - a combination of poetry in prose, philosophy and popular science genuinely Romantic in style and content. The essay is divided to five sections, the first of which rests on the idea that experience is a blend of what the world objectively represents and the way we, as observers, construct it through our perception. Countless ethical and aesthetical guidelines originate from this basic proposition and are elaborated in this section. In the second part of the essay, the author discusses the corollaries of following middle ways in life and in its third part the omnipresent character of music and its pervading life and the universe in their finest aspects. The fourth section contains a discourse on the dialectical nature of the evolution of our experiential realities, namely a constant struggle between opposing forces as a trait underlying every progressive path in life. The fifth and the final section of the essay connects the depths of the human psyche with the aesthetic quality of experiential appearances and ties the content back to its constructivist beginnings.

Keywords: Art; Co-creation; Constructivism; Dialectics; Health; Music; Performance.



Writing commenced in Belgrade, Serbia in May 2007. Last revised on Thursday, December 21, 2023

Contents

Introduction *a la vignette*

The co-creational thesis and the Way of Love

Philosophy of the Way

Co-creation of our cognitive landscapes and of the world as we know it

Navigating the ships of our knowledge between the whirlpools of solipsism
and the inert streams of objectivism

Theological meaning and implications of the co-creational thesis

The Way of Love

The Little Prince and the Way of Love

Sadism and masochism as extreme deviations from the Path of Love

A great wonder on the Way of Love

What else the co-creational thesis tells us

Life as a meeting

Science seen from the pedestal of the co-creational thesis: Atoms and molecules
seen as human inventions as much as the signs of an objective divinity

**On balancing many things: rigidity and flexibility, periodicity and novelty, order and freedom,
unison and diversification, looking up and looking down, being in balance and being out of
balance**

Introduction

On the balance between steadiness and change

The balance of rigidity and flexibility

Compensating rigidity and flexibility

Science as an adventure of the human mind

The art of giving inspiring lectures

On balancing giving and taking

On who brings the new freedoms about

On balancing activity and passivity

On balancing old and new, including a few autobiographical sketches

Yin-Yang character of the interplay between diversifications and unisons

The merits of one's devotion to education and of keeping an eye on the
Way of the Whole as much as on the Way of the Small

On the responsibility for carrying our tradition everywhere with us

On the effect of *vice versa* or the other way around

On the effect of 'the other hand'

Systemic nature of human thinking as stemming from the co-creational thesis

The story about a stone, or why Small is beautiful

Viva Commodore 64! Or the story about childish simplicity,
the serenest wonder, minimalism, and eternal beginnings

On the art of pursuing middle Ways

Change, music, dance

Change and music as the essences of life

The ethics and aesthetics of the blind spot effect

On the phenomenon of *ngoma*

Fractal and all-encompassing nature of the cosmic music

Dance as an inherent aspect of the hypermodern man and communication

Moving as one

Dancing and loving eyes

On the beauty and importance of mistakes and imperfections

Where fools rush in, angels fear to tread

When exact and perfect becomes confusing and imperfect

On the art of searching and not finding, always preluding and never concluding

To be open to learn and evolve is to be ready to accept mistakes

The greatest Y

The metaphor of two wolves

Communicational and evolutionary ambiguities springing from the co-creational thesis

Love emerging as the savior from the dialectic battle of life

Pure mind and heart as the guiding lights of our being

The psychosomatic roots of human wellness

On the importance of keeping one's mind clean

Our visions as final causes

Human heart as the fountain of wishes

The guiding lights of the human heart

Epilogue: From pebbles to stars and the way back

References

Introduction *a la vignette*

A starry eye, be it stargazing outwardly or inwardly, symbolizes the birth of genuine wonder, which, itself, marks the first steps towards sunrises in the sphere of human knowledge. Henceforth, the composition of this book resembles an eye in its wonders in front of the starry sky, shifting its focus from one star to the next. Instead of providing the reader with an immaculately structured framework of ideas, it presents ostensibly disconnected patches of thought that, when combined and correlated, may make up a greater and a more inspiring story than their own.

Contemplation of the links between the individual stars and the meaning of the starry sky in its wholeness eventually brings us over to a greater perspective on knowledge. A new day rises, the multitude of stars that used to be the source of our wonder slowly fades away and ceases to exist, ceding for a while its place to the Sun and the unity of being that it is emblematic of. The grandiose story of life, in fact, engrains this prolific interplay between the inquisitive wonder of the starry sky shimmering in our eyes and our bedazzlement by the graciousness of the Sun as it brings forth the fruits of its diligence and creativity to unselfishly feed the animate souls. Wonder and Love: the beginning and the end of every evolution of spirit and life.

Like all other books of mine, this one is no exception in its implicitly, from one line to another, concealing a craving to answer the following question and transmit the answer to you, its reader: What constitutes the essence of creative being? Of course, like all fundamental propositions, this primal question also hides an indefinable explanatory term, used to explain others, without anything out there to explain itself. Namely, creativity itself stands undefined in this context and I will attempt to use no words to describe it, except that at its peaks it presents the means to transform our being into a star of spirit on Earth, infinitely genuine, lively and loving, explosively expressive and able to inspire human hearts and turn them golden with the most subtle of its moves, while providing the subject with a blissful impression of dancing ‘beneath the diamond sky with one hand waving free, silhouetted by the sea’, as Bob Dylan put it into verse¹. Ultimately, I envisage this goddess of creative being to stand supported by two central columns: Wonder and Love. While Wonder, the source of our exploration of reality with every touch clicked off, with every smile cracked, with every word uttered and every glance dropped, launches our spirit beyond the limits reached by any being in this Universe, Love brings us ever closer to the heartbeats of others, all until the hearts merge and the grand oneness of being is attained, blissful and eternally beautiful. This moving *away* in search of uniqueness, originality and trueness to oneself, and *to* in search of sameness and empathic unity, conceals the image of the Way, of simultaneous separation and connectedness, the symbolic epitome of the dialectic grounds on which this whole world evolves.

From Love to Wonder to Love is thus the circular journey that this book makes within each little star of thought comprising it. Many stargazing nights I spent thinking how great of an endeavor it would be to live life allotted to writing the book of Love, the book dedicated not to vacuously preaching about Love, but to truly living its ineffable mysteries - ‘Do not talk about brotherly love! Love!’, Ramakrishna is known to have said² - and here I am, breathlessly devoted to this task, with its leafy fruits emerging on the social daylight every now and then. Though, remember, it takes incredible amounts of time for light from the stars to graciously fall down on Earth. Simply said, the starry light takes so long to travel³, while its touch with the body that it blesses with its celestial energies is momentous. Therefore, once again, we are reverted to the main symbol of this book: the Way, that is, not the aim, the destination, the answer or the end, but the road, the journey, the question and the incessant prelude, such as that which these very words constitute.

And this is how each voyage to great discoveries proceeds. From noticing minute sparkles of wonder to connecting them into a greater story of life, until the unity of being and perfect consistencies are arrived at. May the thoughts imprinted on the pages of this book present tiny twinkles of inspiration that will give rise to some bright dawns of understanding in You, my fellow earthling.

On the other hand, pebbles, stones, rocks and ridges that a wondering mind can play with on the seashores upon which the firm coasts of knowledge meet the sea of wavering possibilities symbolize the beginnings in the development of practical skills in shaping the landscapes of the world around us, which will in turn shape the landscapes of our mind. Every now and then in our exploring the fine, mysterious details encrypted on the surface and the interior of these pebbly dwellers of the archetypic interface between the land and the sea, we would come across a pearl, a solid body formed when the mantle of mollusks enwraps an irritating particle of sand or dust with protective layers of lustrous crystalline matter, signifying problems and mistakes as the driving forces of the development of any practical knowledge. This parallel between the birth of these precious biominerals and of some of the most blissful ideas ornamenting our intellects will be repeatedly drawn in the course of what follows, all until an impression is created that it may be a railroad track whereon the trains of thoughts comprising this book run. From pain to beauty, from sadness to joy, from the chasms of death to the divinest glories of life, from the darkness between the stars to the centers of their shiny globes is the bridge on which I, a seeker of divine knowledge and being, will stand as I communicate with these lines and symbols that they build the messages of great importance to You.

Eventually, as we keep on being busy discerning lines adorning the pebbles under our feet, we might gain the impression that sketches of starry being have begun to emanate from them. By looking up in our wonder and looking down in our occupation with practical tasks and other palpable matters, we may, in fact, realize that we have been looking in the same direction, that is, into the very heart of the Universe wherein the attributes of beautiful and beneficial encounter. And we may eventually realize that everything useful has a certain beauty in it, whereas all beautiful patterns carry some implicitly useful instructions within. Stars in the sky of our mind and pebbles on the palms of our hands thus become one and the same. This union is the ideal that marks both the home and the horizon, the origin and the aim, the foundations from which this book stems and the firmaments toward which it reaches on its wobbly tiptoes.

The co-creational thesis and the Way of Love

Philosophy of the Way

'I am the way, the truth, and the life'
John 14:6

The systemic thesis that I have been elaborating throughout the years could be named Philosophy of the Way. The words and reflections of ideas that will soon start rolling in front of your eyes intend to deepen and branch the concepts and thoughts expressed in the former presentations of this personal 'philosophy'⁴.

The first concept inherently related to and emerging from it is the one of co-creation of experiential qualities. Its core idea is that all that we are aware of as our experience derives from the interplay between creative actions of two sides: the subject and its environment. In the domain of human

cognition, it means that each detail of the world as we know it arises as a result of the intermingled subjective/idealistic and objective/realistic experiential aspects. Simply saying, we actively create our world with the very perception of ours as much as we passively detect it and, so to say, take 'for granted' through our senses. The world as we perceive it is continually being drawn by the coupled action of our environment and our innate creativity.

The co-creational thesis is, however, a systemic thesis, which indicates that it can be correlated with and applied within various fields of human inquiry about the nature of experience. Physical, biological and neuropsychological evidence can be, for example, brought about in its support, whereby theological, sociological, psychological and natural philosophical domains can all make use of it as a solid and fertile explanatory ground.

Philosophy of the Way and the corresponding concept of co-creation of experiential qualities may provide a useful starting point and a prolific metaphysical foundation for human inquiries about the nature of existence. Not only may versatile balances spring out from this basic concept and reflect the fundamental complementary relationship between 'science' and 'religion' (as their basic linguistic roots, respectively denoting analytic and synthetic cognitive skills, may indicate), but the concept of co-creation of experiential qualities could be also regarded as deriving from rigorous scientific observations and arguments, and yet pointing to an implicit epistemological attitude that may once again open the doors to the lost respect towards the ancient way of human communication with God, thereby seen as immanent in every natural detail. As such, this thesis provides a balance between the attributes of scientific and religious, required for the cultivation of truly fruitful and healthy cognitive attitudes.

Many other wonderful features could arise from under the umbrella of the Philosophy of the Way, as this book will attempt to show.

Co-creation of our cognitive landscapes and of the world as we know it

'Quality is the process in which an awareness of both the subject and the object is established'

Robert M. Pirsig, *Zen and the Art of Motorcycle Maintenance*

We seem to have grown up in a social milieu which taught us of being immersed in a world, the features of which we could discern in an objective and neutral manner. In simple terms, this is to say that each one of us is presumed to have the privilege to be an objective observer and form neutral opinions, free from the interference of subjective norms. All things are accordingly seen as dependent on the observer only in a superficial manner. The only way to interact with objects is imagined to occur through a coarse physical interaction, while disregarding the effects of internal synchronization of the cognitive bases of our perception and reasoning.

But the co-creational thesis tells us something completely different. It suggests that the world as we see it (a.k.a. the world of one's experience) is the result of both an internal construction and a passive detection. The elementary perceptive differences arise at the interface between the subject and its environment, and are defined by the biological and cognitive nature of the observer as much as by the physical nature of the impulses that the observed systems spread out. These elementary stimuli are then internally assembled into a conception of the world which provides the subject with a basis in reference to which he reaches a stable coordination of movement and thought throughout the existence. What initially, at the onset of the subject's perception of the world, appears as a chaotic stream of sensory stimuli thus becomes gradually organized into a coherent cognitive scheme that represents the reality in which the subject exists and with which it interacts. The best proof that our experiential beginnings involve an elaborate repertoire of internally performed actions whereby the scattered jigsaw puzzle of

environmental stimuli is being assembled into a very special and unique microcosm of feeling and thought has come from the people who have surgically retrieved sight after decades of blindness and who reported seeing not the world they have known, but a ‘jangling barrage of shapes and colors’⁵, all until their brain has not relearned how to see again. Just like learning a new language, a process that is both effortful and time-consuming, stands between our staring at an incomprehensible scribble that a text written in a foreign alphabet is to us and flicking over it while automatically ascribing meaning thereto, so does it take a considerable amount of effort and time to learn to interpret the perceptual sensations, lest all things perceived end up resembling an unintelligibly chaotic stream of incoherent impulses. The opposite example comes from the reports of prisoners who experienced prolonged confinement to the most notorious and feared prison cell in the Alcatraz; even though the cell had not even a speckle of light in it, immersing the inmates in complete darkness, after hours or days they began to perceive fascinatingly lively sensations, especially visual, autonomously projected on the screen of their senses by their minds, demonstrating again, though from a different angle, that the mind actively co-creates the world of our experience in the course of our lives. This is all to say that the world that we have the impression of living in is not objective, ‘out there’ and the same for all us; rather, it is continually being recreated by our very self, though based on the features that are still sharable in their similarity, if not sameness. Finally, because all the details of the world as we know it hide the essence of their origins, the very looking at them can lead us to recognize the reflections of both the mystical aspects of the physical reality and of the subject’s intrinsic nature and values.

The processes of perception and cognition in general can be, in simplified terms, likened to the act of watching an abstract painting with numerous layers of potential meanings. That is, if we found ourselves immersed in an abstract painting, we may think of changing the way it appears to us only in terms of manipulation with its physical settings, such as redrawing it, but we rarely think about modifying the way it looks through adjusting the essential features of our own being. But if we were to be taught that we are actively engaged in ‘drawing’ the world with each perceptive moment, our awareness of the world around would be quite different. The objectivistic distance between objects of our surrounding and ourselves may be, thus, overcome with awakening a genuine compassion for the whole world and its subtlest details. For, as much as the features of the world are inherent to all the aspects of our perception and understanding, the essential properties of our being and knowledge are likewise reflected in each detail of the world as we perceive it and know it. Recounting of numerous pictures and events that the lines and colors of the painting may present metaphors of can thus lead us to realize some magnificent messages that the painting radiates with. In fact, it is the balance between adjusting ourselves, idealistically, and modifying the features of the world, realistically, that presents the basis of a creative and harmonious impression and expression of our beings.

When we face a painting, read a book or listen to a musical piece, it is always the balance of becoming one with the observed and listened on one side, and remaining deeply within oneself on the other that keeps the keys to impressive experiences in our artistic devotion. In order for any impression to occur, we need to be open to novel stimuli that come from the cognitive encounters with the surrounding beings and objects. But on the other hand, these impressions need to be built upon some firm and reliable foundations of reasoning and experience. For, the balance between closeness and openness, ideally ingrained within all the aspects of our existence and personality, is the one that gives rise to the evolution of human knowledge and life. Self-aware anchoring of our consciousness deep inside of ourselves and trustful, compassionate immersion into whatever stands forth as the external source of our impressions at the moment has to be neatly balanced in order for cognitive encounters between our self and the environment to be enriching ones. ‘Thus is the poet. Everything in him perceives the things, and everything in him flies past the things. He is wholly in the one thing that he

experiences, and yet is already and still in all the others at the same time... His senses are the strongest anchor of the world, and his soul the most changeable keel. He drinks eternally, like the poet in the *Purgatorio*, out of both springs, Lethe and Mnemosyne, which Dante called Eunoe⁶; thus Martin Buber correspondingly alluded to the drawing of the thread between the things observed and the entire universe hidden in the back of one's head, along which one's attention will come to dance like a bouncy tightrope walker, as the act that stands behind every profound encounter with works of art. The punk poetess, Poly Styrene similarly recognized the necessity for herself, as an artist, to stand right between her sources of impressions and the fountainhead of her consciousness in order for her artistic creativity to flourish: 'You have to be detached from everything in order to write. I have to observe things in order to write about them: I can't get too directly involved. On the other hand, I don't want to become totally self-indulgent, because I write things that other people can relate to. If I totally get into myself I won't be able to do that. What I will write will just become a reflection of me instead of a reflection of everything else'⁷. This is all to say that should we turn out to be overly immersed in an artistic piece or any surrounding landscape in general, the opportunities for capturing meaningful messages become diminished, and we usually get to feed only the shallow aspects of our personality. On the other hand, when we are holding too much onto our presuppositions and ideas, not being ready to candidly change the essence of our being and reasoning under the influence of the messages of the surrounding world, our potential to engage in truly fruitful interactions becomes stifled, and we become, so to say, mentally and emotionally caged.

Such a general recipe for cognitive interactions that the co-creational thesis proposes could be correlated with the biological nature of our beings. Namely, on one hand, all of us are autopoietic creatures. In other words, all the biochemical processes within our bodies are oriented towards a permanent self-production. The role of each macromolecular, sub-cellular and multi-cellular component of the body is to continually produce all the other components in these unending cycles in which creativity becomes exhibited primarily for the sake of sustaining and edifying others. A powerful ethical and aesthetic meaning of the autopoietic character of biological systems at the ecological and social levels of complexity becomes instantly obvious: only living, working, eating, sleeping and praying for others can make us become a powerful and a truly satisfied person. The old saying that work makes the man can be interpreted in the light of autopoiesis as a message that a most crucial step in the course of biological evolution was made when animals decided to stand up and start creating for the sake of selflessly bringing salvation and happiness to those around them. Hence, we can say that the permanent self-renewal describable in terms of closed circles that comprise complex assemblies of biological entities is an essential trait of our biological beings.

On the other hand, however, to survive each being has to be thermodynamically open, that is, in the state of continual flux and exchange of matter and energy with its surrounding. Not only do human creatures need to breathe in and out and process food in order to live, but the survival and prosperity of human societies and cultures too crucially depend on their openness to exchange goods and information with each other. Such a balance between the operational closeness promoted by the autopoietic nature of biological creatures, and the operational openness promoted by our thermodynamic nature neatly coincides with the co-creational intersection of inner, subjective and outer, objective aspects in all experiences. It also explains why thorough descriptions of any behavioral characteristics of human beings need to refer to their inner qualities on one side, including genetic and epigenetic patterns of expression, and to external effects on the other, including social circumstances and traits influenced thereby, if not zodiac signs and star alignments. The doubtful ones need look no farther than the cases of mothers and sons separated at birth, yet exhibiting strikingly similar behavioral patterns as adults for the proof of the essentiality of genetics and epigenetics in determining a person's appearance and behavior,

and the case of CC, short for 'copycat', the first cloned pet, being playful and curious, unlike her shy donor, Rainbow, and also looking quite unlike her, demonstrating that a cloned being will always be a unique one because 'the interactions between environment and the genes change how an organism will ultimately turn out'⁸. The deficient concepts of behaviorism and genetic determinism, thus, become blended into a higher-order, co-creational explanatory model that describes human behavior on the basis of both inner and outer reasons and effects. By partially complementing each other, the individual fallacies of these separate tenets become transcended.

The co-creational nature of being tells us that all the decisions regarding the direction in which the evolution of a system is heading are brought at the confluence of the environmental incentives and inner propensities of the system in question. As such, it applies not only for complex organisms immersed in social milieus, but for all the entities that they are composed of, such as molecules and cells, as well as all the wholes that we are merely a component of, such as social groups, cultures and ecosystems. In that sense, it is a system and its environment that always co-evolve in their togetherness, and their mutual co-creation of each other frequently seems confusing, just as the M. C. Escher's painting of one hand drawing the other does. Hence, chemical reactions, genetic patterns of expression and phenotype of the cellular machinery all depend on both the inherent predispositions of the system and the environmental stimuli. Transferring identical atoms, cells or human creatures from one context to another thus often thoroughly changes their activities, behaviors and qualities. The prosperity of each natural entity thus clearly lies in its acting/perceiving guided by the ideal to foster the prosperity of its environment. To conceive every act in one's life as well as to merely perceive the world with the aim of bringing happiness and enlightenment to others is a hidden gem among other brilliant ethical and aesthetical norms hidden within the essence of the co-creational thesis. And yet, to succeed in doing so, one needs to be partially operationally closed and conceive acts and navigate one's perceptions in accordance with one's inner nature, potentials and aspirations. Otherwise, one may transform into a passive sensory-motor mechanism with no ability to act creatively to external stimuli. As a matter of fact, even the simplest physical acts conceivable, such as catching a beach ball tossed into the air, would present impossible tasks if it were not for our operational closeness via which we are able to run a swift subconscious simulation of the pattern of the ball and intersect it. This image prompts us to realize that to leap high in creative expression one has to remain with the petals of one's heart and mind somewhat folded inside, and *vice versa*: to arrive at wonderful insights during roaming through the passageways of our mental grove, we are obliged to reach out to the world with inventive acts. At this point already, we begin to notice that there is a paradox inherent to the co-creational thesis, arising from the dynamic balance between being open to the environmental incentives and closed so as to act in concert with one's own nature that this universal concept ardently speaks in favor of.

It was Niels Bohr, the originator of the principle of complementarity, an integral aspect of the nature of quantum measurements, who once proposed the following truism: 'Small truths may have their opposites in small lies, but the opposites of some great truths are usually some other great truths'. And indeed, the whole co-creational thesis that I propose hereby suggests a compromise between the paradigm of objective realism and its opposite in the form of the paradigm of subjective idealism. Contrary to the former view, the latter states that the whole world as we know it has been arising in the observer's mind. The observer does not see the world as-it-is, but he *is* the world instead. However, from the perspective of subjective idealism, the very fact that a multitude of cognitive individuals can agree that they observe, if not identical, then pretty much compatible features of reality, could not be accepted as natural. On the other hand, the fact that in same perceptive 'landscapes' each one of us will recognize specific sources of inspiration, and not just that, but the fact that identical ideas, songs or paintings can sometimes ecstatically bring us to tears, and sometimes make us feel dull and uninterested,

could not be accepted from the point of view of objective realism. In general, subjectivity of experiences presents a taboo topic in the objectivistic frameworks of thought, whereby the objectivity of experiences, mostly evoked in the problematic concept of truth, presents a similar enigma for the solipsistic models of cognition.

Thereupon, it is the observer who actively constructs his world as much as he passively detects its outlines 'as they are'. The concepts of 'the world' and 'experience' could, however, not be distinguished at all. Therefore, when I say 'world', I mean experience and, in fact, not one world, but one's world. But when I say 'experience', in certain extent I am obliged to mean 'world' in form of an underlying objective reality in which we are all connected, and which presents the basis of any social communication of meaning. Nonetheless, this antagonistic balance of uniqueness and equality, of one's world and one world, resulting when the worlds of experience meet at the social level, presents the driving force for the evolution of all the sublime qualities that typify humanity.

Constructivism and the classical scientific objectivism thus blended together give a perfectly balanced worldview for the contemporary times, as modern and actual as it can be. A substantial amount of experimental evidence can be provided to support the proposed entwining of objective and subjective features in every perceptive act. However, referring to the supporting experimental data falls outside of the scope of this work, as it was in more detail elaborated earlier⁹. In any case, my approach to education has never consisted in proving things, but in opening new perspectives, new windows that look at the same old world in a new light. My greatest satisfaction on the lecturing podium has been the same one that mystical artists and spiritual healers found in their workings: to disseminate the twinkles of starry wonder in the attendees' eyes and make their entire beings start to reverberate with the ancient Biblical words: 'Whether he be a sinner or no, I know not: one thing I know, that, whereas I was blind, now I see' (John 9:25). Accordingly, I will limit the following discourse in favor of the simultaneously subjective and objective character of the co-creative perceptual 'drawing' of the world to the example of mammalian eye. However, the essential mechanism of perception can be invoked in explanation of the function of any other sensory organ, from human ear to primitive sensory tentacles of single-cell creatures. Moreover, the same underlying principle, essentially illustrating subjectivistic/objectivistic synchrony intrinsic to all experiential phenomena, can be said to apply in case of numerous other cognitive phenomena, ranging from mental reflections to abstract thinking to understanding and communication through language to social apprehension of knowledge to quality assessment of artistic pieces to epistemology behind the religious experience. Hence, the co-creational thesis presents an example of a systemic idea that can be implemented on an infinite number of occasions as the result of its general character.

First of all, all sensors, artificial or natural, can detect only differences. Immersion in a perfectly static environment, hypothetic but nonexistent as such, where nothing is subject to change, would momentarily bring our cognitive apparatuses to a halt. If you have ever held a newborn in your arms, you may have noticed that moving it through space incites its attentiveness by introducing a change in its visual surrounding; soon, autonomously modulating what appears static to its senses will become a standard tool in the repertoire of its perceptive actions. For, fundamentally speaking, only difference is perceptible and a simple experiment wherein easily noticeable modifications made to a still image become impossible to visually detect when they are modulated by a dark slide can elegantly demonstrate this effect. Gregory Bateson correspondingly defined information as 'a difference that makes a difference'¹⁰, wishing to tell us that uniform flow of any stimuli will present imperceptible information unless it becomes modulated by either the action of the sensory organ itself or some environmental effects. For that reason, human eye possesses a set of fine strategies that provide it with the ability to detect even uniform signals from its surrounding. Scanning activity presents one, whereby saccadic

palpitation presents another such visual tool that eye continuously applies in order to modulate the monotonous signals that come from the environment and render them perceptible. Still, objects that do not possess distinct boundaries between them and their surrounding are quite challenging to detect and maintain in our perceptive field, as the phenomenal example of a green disc with a blue dot in the center, exhibited at the Exploratorium museum in San Francisco, can illustrate. Namely, since the edges of this blue dot are not sharp, but gradually transform into green, gazing at it for longer than a few seconds makes it fully disappear from the observer's visual field and become merged with the sea of green that surrounds it. Only an incessant shift of focus by means of which we constantly bring it to our attention anew can save us from our becoming blind to it. However, in spite of this subtle jittering of our eyes, the fuzziness of an object's edges that makes it seamlessly blend into its background often proves to be an impassable obstacle that prevents us from perceiving it as an entity separate from its visual environment. A few other strategies, including the redundancy of sensory data and their compression that begins at the very level of retina, to be further performed at the corresponding brain centers that internally govern the visual activity, are also included in this complex set of visual responses that help in classifying, modifying and redrawing the raw impulses of the being's surrounding into a personal 'motion picture' that the being brings forth with its every step.

As a side note, you can notice that all other sensory organs work on the same principle, which dictates that only differences could be detected and recognized as signal by them. For example, whenever we want to increase the sensitivity and maximize the information input using our touch as a sensor, we do not grip objects, but either caress them or play with them in our hands, unless the object itself is changing shape or texture all by itself as we hold it. Likewise, the only way to retain the awareness of clothes we are wearing is to rub them over our skin; otherwise, the sensation of garments touching the skin tends to disappear soon after we get dressed. Then, we chew food in order to prevent out taste buds from 'falling to sleep' and keep them active. Fumes typically reach our noses in unequally dense waves, which means that we do not necessarily need to modulate these signals by our own internal activity, as happens in the case of visual perception. Even then, though, being immersed in smelly air makes us unable to recognize this smelliness after a certain period of time. Leaving the room contaminated with an odor for a while and then returning to it helps in restoring the responsiveness of our odor sensors and perceiving it again. As for sounds, they reach our ears in waves *per se*. As they travel in pulses through a medium, no need for the internal modulation exists, which means that as far as music is concerned, we can merely sit back, listen and enjoy.

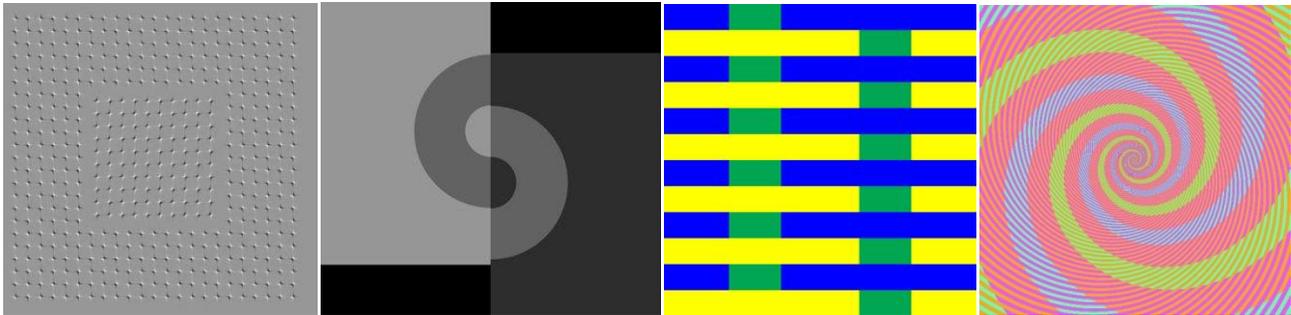
Note also that, as it usually happens in this intrinsically fractal, partially holographic reality that we inhabit, wherein the microcosmic constantly reflects the macrocosmic and *vice versa*, what applies to the finest elements of our perception applies also to its broader features that fall in the domains of more complex mental operations and qualities of our psyches. May I as an example invoke an insight that I arrived at after decades of travelling all across the face of this planet? Namely, a lesson of utmost importance that seeing the multifaceted diamond that the world is from many cultural angles taught me is that no external factors can predetermine the human mind to attain a state of happiness. From the richest to the poorest places of the world, the glow of happiness illuminating the human mind from the inside is, deep down at its core, just about the same. The reason is, of course, our biological ability to detect change and change only. We do perceive the process of change towards better social settings as elating and towards the worse ones as harshening, but some time after we settle in the new environment, be it the worst or the best of them all, we cease to notice most of its traits and fall back to the state of mind that something much deeper and profound in it, which we may call spirit itself, has predisposed us to. This is also to say that systemic principles applicable to the operations of eye as the organ of vision

and eyes of the mind, of the heart, and, quite possibly, of the Universe as a whole, are expected to be the same.

Now, the amount of information that an eye can perceive at any moment is so enormous that it would induce a freezing confusion in the brain if it came to be detected in its entirety. As a result, habitual recognition and a sketchy construction of visual objects from memory are regularly carried out in advance to and aside from their perception in detail every time we notice them. As far back in time as by mid-19th Century, Hermann von Helmholtz recognized that the amount of information travelling from the eye to the brain has to be far smaller than required for the perception of each and every detail in our visual field¹¹. The human brain, dedicating about 60 % of its powers to processing vision, actually substitutes the unperceived details with its assumptions about the visual appearance of one's surrounding based on the former experience. As the legend goes, the early impressionists recognized this scientific fact and went on to declare Diego Velazquez - who painted only things in focus with tight detail and everything else, especially towards the edges of the vision, with progressively rougher strokes of the brush, the way a viewer would see a scene at a glance - their stylistic forefather, while distancing themselves from their realist contemporaries, including Gustave Courbet, who painted each object in the picture with the same degree of detail¹². And so they began to paint with loose, casual brushstrokes instead of obeying the rather unrealistic central premise of the academic realism, which was to paint each detail with an equal level of precision, revolutionizing visual arts and paving way for even greater revolutions to follow. One of the major movements that emerged from the impressionist credo to paint the way the eye would see a scene rather than the way the scene really is was expressionism, whose goal was to evoke the subjective experience of viewing the painted scene by distorting its objects and the perspective and using unnaturally strong colors and sharp transitions between them. Yet another major movement in art that sprouted from the premise that 'a picture is now a window'¹³ was futurism, whose proponents would paint mishmashes of objects mixing up with those that were parts of the scene to denote that the imaginary world conditions the perception of reality, which is never direct, but always gets filtered through the prism of our prior experiences, distilled and reshaped by our consciousness. Cubists were also on the line of these inherently constructivist efforts when they began to use simpler geometric objects, edges and curves as means of evoking more complex objects via mental associations, reflecting the routine habit of the mind to break down reality to redundant elements during the act of perception. Of course, as the history of the 20th Century art instructs us, with their emphasis on the subject's inner world, the cubists' aspiration to reduce the whole experience to Platonically simple solids and the expressionists' quest for heightened emotionality got extensively pushed to the side of this inner life and away from the objective reality, eventually transforming to a state where expressiveness became line, shape and color completely independent of what they may be used to represent. This paved way for the birth of purely abstract art, disconnected from the outer world and deviant from the perspective of the veritable representation of human perception, which is always halfway between its constructivist and realistic natures, being both and none at the same time.

One corollary of this mechanism of perception where the majority of impressions projected on our mental screen are internally constructed rather than perceived each time anew is that only those visual stimuli that violate the anticipated become perceived in the real sense of the word; all else becomes preconceived and internally constructed on account of the previous experience¹⁴. One of such *a priori* internal constructions takes place constantly during our visual observations to make up for the blind spot at the position where the optical nerve protrudes retina. With one such filling of this blind spot - big enough to fit seventeen full Moons of the night sky into it - with what the brain literally assumes should be seen there, the observer eventually becomes tricked thinking that he does see what is in it when, in fact, he does not see that he does not see¹⁵. An awareness that we would not see that we do

not see unless we change the observational stance stands for a profound systemic discovery¹⁶. Conscious shifts of attention between perceptible boundaries in one's visual field present another subjective factor, and as these shifts of attention and gaze are essentially guided by our anticipations, habits, perceptual questions and, ultimately, values, we can conclude that seeing is equally actively seeking and constructively drawing as much as passively finding and objectively detecting. To distinguish the subjectively constructed from the objectively detected aspects of the world that our mind brings forth with every moment of our existence presents an impossible task. These two are inextricably entwined, which presents a strong point in support of the co-creational thesis.



The image on the far left is static and yet its center dances before the observer's eyes. The angles of the inner rhombs are slightly different from those of the outer ones; the mind, trying spontaneously to compensate for this discrepancy, literally reshapes the inner rhombs in brief instances of time, yielding the impression of their jiggling or sliding movement. The second image from the left, known as the Koffka illusion, contains two semi-circular stripes of the same nuance. The one on the left, though, tends to be perceived as darker than the one on the right just because of its being surrounded by a lighter shade of gray than the one on the right. The image shows the striking enormousness of the extent to which perceptual contexts define experiential qualities. The same inference could be derived from the second image from the right, the so-called Munker illusion, where green rectangles appear lighter when they intercept the blue line than when they intercept the yellow one. Finally, the image on the far right shows two spiral patterns superimposed on the alternating purple and orangey concentric circles. Although the two spirals appear to be of different colors, green and blue, they are, in fact, both of the same color – green. Perception of theirs as differently colored is caused by the green appearing green when intersected by the orange lines and blue when intersected by the purple lines. All images trivially demonstrate that the creative input of the human mind, constructive in its essence, is immense during the perception of images that appear on its screen.

Then comes the question of colors. As for colorless objects, our ability to perceive them is due to the refraction-caused bending of the rays of light as they pass from one phase to another¹⁷, the fact that once more, though from a different angle, highlights boundaries as the only perceivable portions of visual objects. Colors *per se*, on the other hand, do not exist in the outer world, independently of the observer, but are constructed from the inside, by the observer's brain stimulated by the optical signals. Hence, it has been well documented that different biological species see the world in different colors and nuances, meaning that colors, indeed, present a product of the constructivist inventiveness of life itself. Countless optical illusion experiments have also been conducted to demonstrate the volatility of colors in particular visual contexts. Two out of three different cone-shaped cells located in the retina of human eyes, for example, are tuned to react to comparatively long wavelengths of light, specifically 530 and 560 nm, and it is possible to present the viewer with a mixture of red and green lights that would be perceived as the same yellow as that of a pure yellow light, which these two cones absorb to about the same extent¹⁸. However, in favor of the opposite, objectivistic point of view we can argue that specific frequencies of light indeed instigate sensation of different colors. Even as such, though, they exist as waves, that is, periodic modulations of the intensity of the electromagnetic radiation as a function of time. Each color in the spectrum of light and each tone in an acoustic wave are recognized as specific because of the typical differences spread over the time coordinate for the given optical or aural signal.

Also, why exactly the spectrum of light between the wavelengths of 300 and 780 nanometers has been chosen as the one to construct the colors from is an important evolutionary question and the reasons may be traced to its high frequency of occurrence in daily objects and particularly those meaningful for the survival of the species. Visible light also penetrates air fairly well, while carrying a plenty of useful information about the objects around us by falling on them, letting them absorb specific frequencies in accordance with their color and reflect the rest. In any case, it is the brain that forms impressions of different colors, which yields another argument in favor of the proposed balance between constructivist and objectivistic perspectives in the way the world, always arising at the interface between the observer and this glorious and divine mystical reality, comes to being.

These primary, a.k.a. *a priori* perceptive data, in reference to the philosophy of Immanuel Kant, are further used as a 'raw material' for the formation of more complex conscious wholes. Their interpretation proceeds by means of various subconscious and conscious processes of differentiation and integration. The subjective and, in part, socially molded character of these interpretations need not be particularly emphasized, since it has been well acknowledged in the mainstream philosophical tradition. The empiric division of qualities of the world to primary and secondary ones reflects this differentiation between objective and subjective traits of human perceptive reality. But as we see, the subjective, observer-dependent nature of the primary qualities is intrinsic to the co-creational thesis. Accordingly, there is no sense of speaking about qualities of any natural system without referring to qualities of the observer, as Heisenberg's indeterminacy principle clearly demonstrates.

A physical system needs to be perturbed in order to be observed, measured or communicated with. For example, all microscopic analyses provide images that form as an intersection of the properties and settings of the given apparatus and the properties of the measured system. Thus, they are not true reflections of the morphological properties of the system. Instead, they are the results of an interactive intersection between the properties of the observer, which include those of the measuring apparatus, and the features of the observed. Atomic force microscopy, one of the most powerful techniques for the visualization of material structures on the atomic scale, for example, provides images that do not straightforwardly show us how analyzed samples look like in reality, but are, in fact, convolutions of the microscope tip shape and the surface morphology. For this reason, protrusive features on the sample surface inevitably appear larger than they are, while holes appear narrower and less deep, particularly when the size of the probe tip is greater than that of the facets and the pores scanned. For the very same reason, distortions of the tip shape are directly reflected in the appearance of the observed particles. Even the most neutrally shaped, spherical tips routinely become distorted in collision with the surface features during the scanning process or contaminated with pieces of debris and in both cases unfaithful images of the surface result. Although the effects of the probe on the measurement outcome could be minimized by means of employing more accurate and sensitive force application feedback system, it is an inescapable fact that even under perfect conditions rounded tips would naturally increase sphericity of the analyzed entities, whereas the sharp ones would promote similarly sharp morphological features of the observed particles. Similarly, when a pyramidal tip of the atomic force microscope is used as an indenter to measure the hardness of the material examined, the hardness changes in inverse proportion with the apical angle of the indenter¹⁹. The higher the apical angle, the lower the hardness and *vice versa*, meaning that, once again, the properties of the material are by no means independent of the properties of the measuring device. What is more, the radius of the spherical indenter tip can sometimes influence the mechanism of failure in specific materials, in such a way that the smaller tips tend to crack and chip the surface more, as opposed to the larger ones, which tend to produce more of the plastic, reversible deformations²⁰.

A similar and a more commonplace effect, with respect to its accessibility, of course, not the frequency of occurrence, evidencing how the way in which we observe an entity determines in what light we shall see it and what we will conclude about it in terms of its qualities, has been reported by those who looked at surrounding vegetation during a partial eclipse of the Sun and noticed crescent leaves and palm-shaped treetops all around them. Gotten used to see it all in the Sun's spherical light, casual observers of one of these rather unusual events were certainly surprised to realize the extent to which objects gain sickle-shaped contours when they are illuminated with a similarly falcate source of light. In the case of scanning electron microscopy, the radial scattering of secondary electrons used as the signal causes the nanosized structures observed to appear larger and spaces between them smaller when compared to the more veritable results obtained using transmission electron microscopy²¹. As for transmission electron microscopy itself, when used to look at crystallographic transitions *in situ*, it has been impossible to tell whether atomic movements detected were naturally occurring or were caused by the energy of the electron beam used to visualize the given structure. In scanning transmission X-ray microscopy, then, it was noticed that the scanning speed greatly affects the photoemission energy²². As for the optical microscopy, the frequency of light we shine on the analyzed objects has to be larger than the borderlines we wish to observe. The refractive index of a lens is, however, wavelength-dependent, which leads to inevitable discrepancy between the true form of the object and its optical image. Also, when the size of the critical features and the wavelength of light are comparable, diffraction or other resonance phenomena may occur, during which even the deformation of the sample is not unheard of²³, similar, though on a different scale, to the way in which Archimedes set the Roman ships on fire with concentrated rays of light.

Another scientific example may come from the traditional analyses in the field of microbiology where a repertoire of stains is used to color specific cellular compartments. Namely, not only does each stain reveal an aspect of the cellular anatomy that is invisible when another stain is used²⁴, but different protein localization results can be obtained depending on how fixation and permeabilization of the cell are performed²⁵, let alone on the cell type. Each of the specimen preparation steps that precede a microscopic histological analysis, from sectioning to fixation to dehydration to wax impregnation (that is, replacement of the native fluid phase with an epoxy resin) to permeabilization of the cell membrane to staining of the analyzed systems, similarly distorts the immunolabeled tissue to a certain extent²⁶. Different fluorescent dyes also differently affect the morphology of DNA molecules²⁷, all in a dose-dependent manner, shattering the illusion that binding of fluorophores is a noninvasive technique that has no effect on the physical appearance and properties of the labeled molecules. Not even inorganic particles, such as calcium phosphate ones, for example, that one may wish to stain side by side with the cells, as I have done innumerable times during studies on the cell/nanoparticle interface²⁸, are necessarily immune to structural or morphological change in interaction with the staining agent. A recent study has thus demonstrated that alizarin red, the most common chemical in use for labeling bone mineral particles, may induce the lattice strain and reduce crystallinity of the latter during formation²⁹. The active calcium phosphate particle surface that undergoes constant dissolution/precipitation will therefore be certainly modified by adsorption of the staining agent, yielding transformations that could structurally affect the bulk content of the particles too. In any case, the micrographs obtained using any of the microscopy techniques available today, from the optical to the near-field to the electron to the scanning probe, will not be faithful images of the real structures imaged, but rather artifacts that reflect both the properties of the analyzed systems and the features of the measuring devices and their settings, at the end of which our inherently constructivist brains, the most sophisticated measuring devices in the Universe, stand.

Biological nature of each observation speaks in favor of the inevitably subjective nature thereof. Different eyes see different features of seemingly identical objects of observation. And that is, as we see, not only due to different knowledge used as the basis for the secondary interpretation of the perceived data, but also due to a substantial difference in biological structures of the sensory apparatuses in question. Unique biological structures yield unique 'worlds' of their own. And yet there is a link between the results of perception of different beings. The subjective uniqueness and the objective sameness are, therefore, inextricably intertwined within each individual world of experience.

The ideas that the world we perceive is objective, realistic and universal could be, thus, accepted as false and noxious in about the same extent as the ideas that the whole world is an egotistic projection of our soul. The world of our experience is neither solely our own nor an observer-independent one. We are somewhere in the middle. It is the intersection of solipsistic and objectivistic points of view that on a higher plane gives rise to the true, co-creational beacons of knowledge. We are riding along the tracks, one side of which is called the Universe, and the other side of which could be named multi-verse. And it is our duty to every now and then give our hands of unity to perceptions lost and perplexed in the world of multitude, and yet to point to the lovely charms of diversifications of feeling and thought to the worldviews blinded by the permanent immersion into the unity of all being.

Finally, there is a question that many may ask. It is related to the attribute of an active creativity given to both mind and its environment with the implicit connotation of the notion 'co-creativity'. Namely, if the subject actively 'draws' his own world of experience based on inert physical streams of the environment, could Nature be endowed with a similar creativity as the one that mind undoubtedly possesses? The answer will be, of course, yes. First of all, that same environment existed before the human creatures arrived at the scene. It evolved from a soup of electrons and nucleons to the highly organized and inspiring cosmic vastness that homes a planet Earth in it with all its diversity and animated creatures thereon. It has evolved by the means of a mysterious underlying force, the origins of which in view of the highly improbable formation of life by pure chance must fall in the domain that intersects the theological and cosmological knowledge. Then, this same environment is also composed of living creatures. If a being looks at another being, undoubtedly each one of them is an 'environment' in the co-creation of their experiences to each other. Each one of these creatures also constantly modifies this environment, which therefore lives and changes in parallel with the creatures that it homes. And in the end, just as the epistemological foundations of the subject beings are hidden and directly invisible, the same can be said for the ontological foundations of Nature. What we see as the results of our perception and abstractions are merely the higher-order products of the intersection of these two fundamental planes. However, we are never able to discern their sole effects on our experiences and reduce them to only one of the two sides in this co-creative interaction. Each one of them would be like the sound of one hand clapping: silent and imperceptible. What we perceive are only the reflections of these two hidden foundations, and based on their mysterious interplay we are deciphering how we are and how the world is. The charming and peaceful *chiaroscuro* of the details of our experience can tell us that this genuine communication between our spirit and Nature, that is, our soul and God, goes fine.

Navigating the ships of our knowledge between the whirlpools of solipsism and the inert streams of objectivism

'The epistemologic Odyssey: sailing between the Scylla monster of representationism and the Charybdis whirlpool of solipsism'

Humberto Maturana & Francisco Varela, *The Tree of Knowledge*

Passive and inert streams of fate and whirlpools of blind solipsism and egotism present two extremes that, like many other antagonistic polarities, become confronted, equilibrated and annihilated in the concept of experiential co-creation. To show how sole solipsistic or sole objectivistic stances *per se* yield nonsensical observational attitudes, Heinz von Foerster pointed out the following. 'This is a peculiar delusion within our Western tradition, namely, 'objectivity': 'The properties of the observer shall not enter the description of his observations'. But I ask, how would it be possible to make a description in the first place if not the observer were to have properties that allows for a description to be made? Hence, I submit in all modesty, the claim for objectivity is nonsense! One might be tempted to negate 'objectivity' and stipulate now 'subjectivity'. But, ladies and gentlemen, please remember that if a nonsensical proposition is negated, the result is again a nonsensical proposition. However, the nonsensicality of these propositions either in the affirmative or in their negation cannot be seen in the conceptual framework in which these propositions have been uttered'³⁰. In other words, to successfully navigate the ships of our knowledge is to avoid both the dangerous whirlpools of pure solipsism and inert and misleading streams of sole objectivism.

When we walk along any road, it is the road itself that guides our traveling path as much as our own inner creative incentives do. If we were to begin thinking that the correct way to reach a desired destination lies only in our own heart and mind, and that there is no need to refer to the meanings and signs lying in the outer world, we would not be able to attain the given aim, as much as we would not be able to do so if we gave up on relying on our own sanity, composure and inner reasons, and began to blindly follow the boundaries of the outer world.

No property from any field of science or everyday reasoning could be defined without respect to both its subjective/idealistic and objective/realistic aspects. This is a classical systemic assertion that can be evidenced on an endless number of examples.

Try defining any human quality first. Goodness, benevolence or tolerance could not be represented without taking into account exactly the interaction between the subject being and parameters that describe its surrounding. The beauty of a flower or of a piece of art can be understood only as arising at the intersection between an experiential context that the subject being brings forth and the features that the object of contemplation can be attributed with. Now, let us make a move to the world of physics. There, we can realize how although it is a general rule that the higher the wavelength of light, the easier it penetrates the objects on its way, the penetration depth of light could not be explained by referring to its frequency only. In fact, the properties of the medium through which light travels are equally important. Thus, microwaves penetrate through glass, but not through water. Water and carbon dioxide strongly absorb specific frequencies of infrared light, whereas the table salt is transparent thereto. X-rays penetrate easily through metals with low atomic numbers, such as aluminum, but are absorbed by the ones with high atomic numbers, such as lead. Hence, it is the interaction between light and atoms and molecules of the material that determines whether the light will be reflected, absorbed or passed through. As a result, how deep the light will propagate through a given material depends on the properties of both light and the material in question. Since electrons could be made more energetic and, thus, shorter in wavelength than photons, they are used instead of light in microscopes with the highest resolution we have in use today, in which cases the same principle of interaction mutuality applies. For example, the volume of the characteristic teardrop-shaped zone of interaction between the incoming electron beam and the material analyzed under the electron microscope thus depends on both of the sides in this interaction, becoming larger at greater electron energies and smaller at larger atomic weights of the elements constituting the analyzed material, ranging from a few nanometers to five or more micrometers in depth.

Then, let us momentarily enter the field of regenerative medicine. There, we could notice how the quality of a material applied to restore damaged tissues could not be defined without referring both to the area of its application in the body and the finest characteristics of the material. Differently sized particles would be required for drug-delivery treatments of different tissues³¹, whereby different mechanical and chemical properties of the biomaterial are employed for tackling damages that occur at different scales. Finally, an essential feature of a biomaterial, which is defined as ‘a material intended to *interface* with biological systems to evaluate, treat, augment or replace any tissue, organ or function in the body’³², is its biocompatibility, which could not be measured without an interaction with the patient. Even though it is nowadays well known that pathological states of an organism need to be explained in terms of both the effect of foreign agents and the susceptibility of the host organism, people still sit and wonder why a specific material becomes refused by one and accepted by other patients, facing a complex reflection of the subjective nature of every medical treatment and interaction with the surrounding beings and the physical world in general. Needless to say, the effective application of each biomaterial critically depends on a favorable feedback interaction between the living system and the material, during which both are most often subject to change. To be prolific, thus, the relationship between the two must be akin to the true, not false love, as defined by Juliette from Godard’s 2 or 3 Things I Know about Her: ‘False love means I don’t change; true love means both you and I change’. A perfect hard tissue substitute is, for example, meant to be thoroughly absorbed by the body in the course of the regeneration of a tissue, which, on the other hand, replaces the resorbed material at the rate of its degradation; this, however, still stands forth as an unattained ideal, except in the case of small size defects. How this interaction could be controlled so as to trick the tissue to go through the pathways of complete regeneration when the damage is larger is a topic of ongoing interest and a problem that must be tackled from two sides, as the result of the interfacial point of origin of all qualities in Nature, always entirely co-created between some insides and outsides: the body and the biomaterial.

The concept of co-creation could be, in fact, excavated as a treasure buried deep under the lines of countless insights decorating research in life sciences. For example, in the field of pharmaceutical sciences, we have been accustomed to explain the therapeutic effects of a drug as being codependent on its physiochemical properties and on the individual physiological characteristics of the patient³³. From the brand new field of bionanotechnology, focused on the interaction between the biological matter and solid particles whose dimensions do not exceed 100 nanometers, we could concordantly bring forth the case of the cellular uptake and trafficking of nanoparticles, the subject of immense importance for the future of biomedicine. Namely, for a long time it has been erroneously thought that the chemical composition of the nanoparticles is the sole determinant of their uptake propensity. Then, over time, multiple other particle properties, from the finest difference in the size to surface roughness to stiffness to crystallinity to the surface charge to the composition and the denaturation degree of the protein corona enfolding them in biological milieus, started to be seen as equally important for determining their fate upon contact with the cell. However, as you may expect, cells cannot be considered as passive absorbers of nanoparticles, lest the billions of years of evolution separating them and the inanimate matter that the given particles are composed of appear wholly wasted in our eyes. Not only do the cell type and the intercellular signaling define the uptake efficiency, but the cell lifecycle phase does too. Thus, the pre-mitotic and mitotic phase during which the metabolism of the cell is close to its highest as it prepares for the division into two daughter cells has been demonstrated as the one during which the cell is most prone to internalize nanoparticles and their loads³⁴. To those who know that giving and taking tend to be neatly balanced in all natural systems, this insight may not come as a big surprise. In any case, as we see, whatever the quality we discern from the endless evolutionary landscape of reality, we could always

recognize its being drawn on a fault of a kind, that is, an interface whose properties are defined by the qualities of each and every one of the sides encountering on it.

Furthermore, from the most fundamental perspective of physical sciences, Heisenberg's uncertainty principle demonstrates how an interaction with a measured system needs to take place prior to any detection thereof. The nature of this interaction would, of course, be specific for each perceptive being or sensory device, which constitutes one of the basic problems arising out of the subjectivity of experiential and natural phenomena in general. For, any inference we make can always be seen as a child resulting from the marriage between premises and observations, possessing the essence of both in its heart. As a result, the way in which we pose questions predetermines the structure of the revealed answers. The way in which we look at the world predetermines what we will see, which presents the argument that reflects the heart of the co-creational thesis. In that sense, with every reason it can be repeated that 'difficulty in most scientific work lies in framing the questions rather than in finding the answers'³⁵. From the spiritual standpoint, which will have always complemented the scientific, we could be reminded of the epigraph coined by the first German professor in experimental physics, Georg Christoph Lichtenberg, when he compared his books to mirrors: 'If an ape peeks in, no apostle will look out'³⁶.

But once more, do not forget the opposite argument, too: that is, what we see predetermines the structure of our questions about the world as well. The face of the world partly determines the attitude with which our curiosity will face it, and the questions with which we face the world partly determine the facets of Nature that we would be able to see. Mind draws Nature, and Nature draws mind, as in the famous Escher's painting with two hands, one drawing the contours of the other.

Another example coming once again from the heart of the field of tissue engineering may be worth mentioning at this point in the discourse. Namely, for many years bone regeneration specialists thought that the stronger the material used as an *in vivo* substitute for a damaged hard tissue, the better. This goes back to the first attempts of materials scientists to contribute to the field of biomaterials for bone regeneration. Having seen their clinical fellows struggle to create high-quality bone grafts using relatively primitive techniques, such as grinding dry bones from cadavers into cements or isolating ingredients from plants or animals, paying no heed to the risks of immunological response, they stepped up to help them by bringing in more rigorous scientific views. These views, however, stemmed from decades of work on materials for mechanical engineering applications, be it turbines for steam engines or steel plates for spaceships. Gotten used to deal with the problems of wear, tear and corrosion, and finding the sole merit in extending the durability and stability of materials, they saw the human body as an ultra-corrosive and unfriendly environment to be fought against instead of engaged in a Godardesque love affair where both sides would be subject to change. 'The materials should resist the change and last in the body for as long as possible', they would say, not recognizing the intrinsic toxicity of one such point of view. It was a shock when they discovered that applying metals as bone substitutes is unfavorable exactly because of their superior mechanical properties. Once implanted in the body, metals tend to absorb most of the mechanical stimuli that the surrounding tissue is subjected to. Just as one's living in a perfectly sterile environment slowly puts one's immune system to sleep and makes one less resilient to intruding species, this stress-shielding effect induces weakening, not strengthening of the surrounding bone. As the mechanical forces are directed away from it, this bone adjacent to the implant becomes eventually resorbed, causing the entire biomechanical structure to collapse³⁷. This problem is today known under the name of 'elastic modulus mismatch' and presents the main reason why bone engineers switched to the design of less perfect materials to substitute bone with. This resulted in one of the most poetic paradigm shifts that biomedical sciences have ever witnessed: namely, perfection suddenly became found in imperfect materials, those that biodegrade and fall apart oh so easily, under

the slightest of stresses and the quietest passages of the train of time, behaving like a seed planted into the soil, knowing that it must die before a tree or a bush with all its luscious fruits could grow in its place. ‘*Architectus aedificat per machinas transituras domum mansuram*’, meaning ‘an architect uses scaffolding and machinery that is going to be removed, in order to build a house that is going to remain’³⁸, Saint Augustine of Hippo noticed in his sermon on the resurrection of the dead (Sermo 362), echoing the evangelical parable about the corn of wheat that ‘fall into the ground and... if it die, it bringeth forth much fruit’ (John 12:24) and unknowingly putting forth a motto that the tissue engineering mainstreamers of the day heartily live by. Today we, in the bone engineering field, find ourselves ascending to the top of this paradigm hill, wherefrom, one day, I know, like Icarus and his father, we would once again engage in attempts to conceive of biomaterials that would augment, not necessarily merely regenerate the functions of the tissues integrated with. Until that day comes, we would relentlessly enjoy in the poetics of the idea that structural weakness is the ultimate therapeutic strength of biomaterials for bone replacement.

Similarly, when it comes to the design of scaffolds as biodegradable bone substitutes, it has been discovered that if a biomaterial with identical elastic properties as natural bone is applied, the implanted cells would not do any work at all to proliferate and ‘instill life’ therein. Eventually, the probability for its rejection by the body would be high. Therefore, a biomaterial has to remain slightly imperfect in order for the host cells to proliferate within and additionally reinforce both the material and themselves. This perspective that highlights how important it is for a biomaterial to possess a weaker mechanical response than what may seem most desirable from a superficial biomechanical standpoint may also be complemented by the many times observed necessity for a biomaterial in contact with cells to possess a rough surface, for only as such can the conditions for an optimal cell attachment be achieved. For this reason, titanium implants are subjected to sandblasting and etching procedures prior to their application *in vivo*³⁹. The material is in such a way endowed with surface roughness, which makes it seemingly less perfect at first sight, although it leads to a more optimal integration with the organism in the long run, as confirmed in numerous scientific studies⁴⁰. Similarly, remember, neither is the ideal content of knowledge for us at a given moment revealed as utterly comprehensible to us nor do the most idyllic sceneries for the thriving of our souls make us fall in love with them completely at first sight. Rather, through their obvious imperfections they force us to change while accommodating to them and learning to love them, all so as to become a better man in the process. Hence another Saint Augustine’s analogy, from the very same sermon, between the earthly realm and ‘*machinamenta temporalia*’, the temporary scaffolding atop of which the eternal edifice of the City of God rises^{41,42}. Or, ‘it is by certain time-bound and passing and fleeting events and deeds that we are prepared for eternal life’⁴³, as the saint himself prophesied. In other words, posing itself as a problem, not as a solution, is how the best solutions to problems in life come in touch with us upon our encountering them for the first time.

Also, when it comes to the design of tissue engineering constructs for the substitution of load-bearing defects in bones, it is tempting to consider materials with the most superior mechanical properties as the best candidates. To achieve such properties, the densest materials subjected to sintering at high temperatures are usually used. However, such materials display significantly lesser resorption rates, if any, compared to their looser, more porous counterparts. Also, their ability to be infiltrated by cells, which speed up the integration process, is also nil. Therefore, to produce a biomaterial with the best possible response for one such load-bearing application, the ideal mechanical response must be sacrificed or else the bioactivity of the material will be problematically low. Of course, if bioactivity tends to be maximized without any consideration of the mechanical properties, the opposite extreme will be hit and the material would break down under a slightest biomechanical stress, which would be equally unfavorable. I often use this example in the courses on biomaterials and medical devices I have

thought over the years not only to illustrate how complex the design of such structures is, but also to call for the expansion of focus among students, away from that on simplistic maximization of single variables and toward their optimization. This is one out of many points in my natural science classes wherefrom the awareness expands in the direction of systemic insights pertaining to literally every single aspect of our existence. This example, for one, instructs the students to broaden their worldviews and beware of the linearly narrow foci that see nothing but one parameter at a time. For, anytime our goal in science, technologies or life is to maximize a single variable, we would realize that our success will cause the reduction of a number of other essential variables and amount to the failure of the system as a whole.

In any case, the design of partly defective structures with the purpose of boosting their bioactivity has grown into a mainstream approach in the field of tissue engineering⁴⁴. Additionally, note that not only cells, but small molecules too are best adsorbed on rough surfaces, as demonstrated by the recently evidenced absence of adsorption of carbon monoxide on atomically smooth gold surfaces⁴⁵. This example irresistibly brings to mind the ancient Hawaiian aborigines' decision to assign the name *a'ā*, that is, the first letter of the alphabet repeated twice, a symbol of the beginning of it all, not to smooth and flat lava known as *pāhoehoe*, but to clunky and jagged lava stones. For, it is from the latter that life in the form of flowers and trees began to sprout before spreading over the entirety of these Pacific islands, once bare like the surface of the Moon, but now luscious and bursting with biological diversities, deservedly carrying the epithet of one of many paradises on Earth. Hence, from biomaterials to conventional catalysts to volcanic rocks, surface imperfections are vital for the optimal functionality and proper performance of these materials to be maintained.

Likewise, not a single communication should ideally be unilateral, as the futility of the spoon-feeding education, the illusoriness of autistic thoughts disconnected from a reasonable feedback with the social environment, and the dangerousness of dictatorial governments based on radio and television propagandas could neatly exemplify. The obsolescence of unidirectional communications, be it amphitheatric lectures or televised messages, is, however, challenged by the modern, participatory art forms and Internet-based communications during which all parties involved are invited to offer an opinion or an act, and thus mutually change along their course. In fact, highly collaborative art forms, such as movies and music played by rock bands, can be seen as the most influential ones during the 20th Century, replacing solo art forms of writing and painting as dominant throughout the preceding eras. Lights can thus be thrown onto the words of Joseph Beuys: 'In the future art will be expanded as a social sculpture created by many people'. The future trends in creativity and communication will thus certainly belong to embodiment of the ideals of co-creation: living so as to transform the brightest visions and dreams lying inside of us into reality, but also being open to other people's visions and Nature herself, letting them partly shape these co-created works of ours. After all, that seems to be the central message of the co-creational thesis: instead of either expecting the things in life to be perfect incarnations of our visions, of the way we wish them to look like, or expecting them to be achieved by means of other people's acts or external circumstances, we ought to look for the middle ways that reconcile and synchronize the creativity of ours with the creativity of our environment.

'For whether is easier to say, Thy sins be forgiven thee; or to say, Arise, and walk?' (Matthew 9:5), asked Jesus in reply to accusations of the masses for his habit of forgiving the sins of others, meant to belong exclusively to the powers of gods. Hence, in order for a correspondence between a pair of cognitive entities to be productive, there always needs to be some space left for the other side to edify the commonly built ideas and concepts. This is where Lao-Tzu's maxim becomes seen as meaningful: 'The true sage shines, but does not dazzle' (Tao-Te-Ching 58). Correspondingly, the best doctors are not those that appear unassailably confident in their knowledge and advices that they give, but those that

blend an intense desire to provide a healing stimulus to the patients with a dose of humility and graceful ignorance in interaction with them. Whereas the former attitude spontaneously makes the patients passively receive the prescribed treatments and misleadingly shift all of their inner healing powers to the doctor's authority, the latter approach truly opens the door for the patient's self-recovery, thus enabling a lasting and complete healing process.

The same attitude of adopting a piece of uncertainty alongside a piece of faith can be said to apply to all truly productive expert opinions. The movie director, Agnès Jaoui, for example, learned the following: 'The best actors have doubts about what they're doing. A bad actor is an actor who thinks he's great. A good actor, even the best, the most popular, often needs reassurance'⁴⁶. In such a way, she, naturally at odds with the common opinion that confidence comes together with experience and the skill, has reminded us that it is rather a constant clash between determination and doubt that rages within the seafaring souls that are truly great in their endeavors. If we are to trust the worlds according to Euripides' *Bacchae* and other plays⁴⁷ or Richard Wagner's *Ring of the Nibelung*, the same doubts, uncertainties and constant changes of the mind typify gods and their unpredictable actions too and if one thing got lost with the systematic extermination of polytheism from the Western world in the medieval times and the uniform adoption of monotheism all across it, it is exactly this sense of disparate emotions and thoughts running through the divine Head, inclining it to one action one moment and then another action another moment. It got lost in favor of bland and unnatural steadiness and the scrawny spirit of certainty that only monism, unchallenged by its antagonists, can breed. Yet, although 'the world is full of those who know what to do'⁴⁸, as pointed out by Šarlo Akrobata, you, I, the robot-busting Yoshimi and whoever else aspires to reach divinity in thoughts and actions and has enlightening ideas brewing inside one's mind ought not to feel ashamed for sitting idly, crushed by the millions of crossroads crisscrossing and tearing apart our souls, having no idea which way to turn, where to go and what to grasp with our hands and hearts. For, only through such hesitations, uncertainties and crucifying doubts can our spirits soar themselves to the realms of heavenly thought and bring from these sublime vistas something of lifesaving importance to the Earth below. If we go back now to our self-doubting therapist, remembering that the healing of human spirits is what a fully creative human being is engaged in at each and every moment of its existence, we might realize that these internal insecurities act as an open door for bidirectional interactivity between the self and the environment, which lies at the heart of the idea of co-creation. For, perfect confidence is also a gate closed for the inflow of stimuli that originate in other people and it is a way to extinguish empathy and promote indoctrination and passive compliancy rather than empowerment and independency of another. To put it differently, no healing of the world could be achieved by those who live in the clouds of certainty, cleansed of the specks of sceptis.

This balance between a colossal desire to provide crucial impetuses that will orient others toward enlightening ways and a humble willingness to listen and open enough space for others to productively express themselves and thus grow from the inside is exactly the key to understanding the Way of Love that is going to be mentioned just a bit later in the text. Also, leaving all our deeds in life at least slightly imperfect, deviating from the exact visions we have constructed in our minds, presents a necessary precondition for the exhibitions of a truly harmonious creativity. As Francis Bacon claimed, 'There is no excellent beauty that hath not some strangeness in the proportion'⁴⁹. Whatever it is that we make, there needs to be part us, part Nature involved in it; part me, part you; part knowledge, part randomness and intuition; part technique, part great desire and aspirations; part diligence, part prayer. Francis Bacon would have probably further argued that 'Nature to be commanded must be obeyed'⁵⁰.

Magnificent healers know how to be perfectly imperfect in such tiptoeing on the tight string stretched between sanely dropping guiding stars for others to follow and trustfully, almost childishly following other people's directions of emotion and thought. They succeed in this feat by balancing the

extents of meditative detachment and interactive compassion, i.e., by equilibrating the force that pulls the outer energy - carried by external impressions - inwards and the force that releases the inner creative energy of the being outwards, thereby setting their beings as bridges or tight strings that reverberate with divine music, fixed between the poles of their spirit and the world. This is neatly summed up in the following words by Patricia Zeng of University of California, San Francisco: ‘While most of us entered the field of medicine because we want to care and heal, sometimes it seems like expertise is more central to the practice of medicine than compassion. Physicians are expected to provide medical care that is compassionate, but we are also expected to project an objectivity that is largely undemonstrative. This aura of impassiveness is often cultivated both to reassure patients of the strength of their physician and to detach the physician, who might otherwise get too emotionally involved. In the face of such a dichotomy, medical students and practitioners often struggle to find a balance between their hearts and their minds. It becomes especially hard to be able to express compassion, to deal with grief, and to best reach out to their patients while maintaining an appropriate objectivity. Yet professionalism includes both compassion and objectivity’⁵¹. Building the sense of unity with the surrounding creatures and entire Nature and yet cultivating a sense of detachment and uniqueness that provides us with the ability to bring sane decisions, unaffected by the drive to conform, is a great art to be learned in this life and very soon we will begin discussing it in detail.

However, prior to broadening the scope of this discourse, one more example is to be mentioned. Namely, as a passionate swimmer, I have occasionally wondered whether swimmers should move faster in chlorinated pools or in salty seawater. Now, in order to answer this question, just like any other, we need to take into account both the subjective and the objective factors. That is, the emphasis needs to be placed on interaction, in this case between the swimmer and the water. First of all, the swimming velocity of a swimmer would vary depending on the density of the medium. Whether the viscosity of the watery medium is significantly shifted towards the one of air or the one of honey, the result would be the same: a decreased velocity. Therefore, for any particular swimmer, there is an optimal viscosity of the swimming medium at which her speed would be maximal. But that is only the objective aspect of our analysis. Now we have to shift to the subjective side. Once on it, we may notice how the human body is subject to modifying its constitution depending on environmental and behavioral requirements. Therefore, a swimmer moving through a lighter medium would gradually develop a lighter body that would propel her quicker in that particular medium, whereas a swimmer swimming specifically in a denser medium would develop a heavier and more muscular constitution. The effects of relatively small variations in density of chlorinated and salty water might be, therefore, compensated by the effects of variations in the subject’s properties. Had the non-linear equations that model this situation not been so hardly solvable and establishable at all, we would have already witnessed precise settings of the composition of the water in the pools at the major swimming competitions. This discussion over the optimality of the swimming water density neatly resembles the one over which athletes and their coaches have wondered for a long time. Namely, athletes run faster and jump higher and farther at high altitudes where the air, the medium through which they move, is less dense; on the other hand, the lesser pressure and the lower amount of oxygen in such air compared to zero altitude poses limits on their performance.

The same type of reasoning can be applied to the question of whether it was giraffes that developed long necks to reach the fruits of tall trees, or it was the trees that grew tall to escape from the reach of the browsing giraffes and other terrestrial animals. From this point on, many other co-evolutionary questions could be answered using the same type of circular, feedback-permeated logic. And many other situations in life could be explained by referring to feedback mechanisms, too. For example, the reason why I, who am feeling awkward in the presence of children, and a child feeling

awkward in the presence of a grownup end up in separate corners of a room during our encounter would become illuminated thereby. So would the obsession of airliners with reducing the weight of airplane seats by removing a layer after layer of their cushions be explained too. Namely, as the seats become less cushiony, the sitting on longer flights gets more uncomfortable for bonier and more lightweight people than for the chubbier types, which discourages the former from flying and effectively increases the average weight of the passengers, prompting the airliners to further reduce the cushioning, thus further increasing the average weight of the flyers, and so on *ad infinitum*. To mention yet another example, in my imagination I will enter a stadium to enjoy a soccer game. There, one of my favorite pastimes to enjoy is to get immersed, deeply, as if in meditation, into the white noise, the hum generated by the tens of thousands of spectators, sensing in it the magician's cloud from Ingmar Bergman's *Fanny and Alexander*, wherein 'the despair, the hope, the dream of deliverance and all the cries, all the tears of man gathered over thousands and thousands of years are condensed', the cloud akin to Borges' *Aleph*, through which, if entered deep enough, one could reach the enlightening, perfectly empathic oneness with all that there is in the blink of an eye. As I hold my ears focused on this hum, I will have surely noticed that all the fans around me chant with their deepest voices, as if they have all gone hoarse and gravelly. I did wonder for a long why it was so and then I realized that there was a positive feedback involved. Namely, as the song sung takes place in a vast open space, the sounds arriving at the fans' ears after crossing dozens of yards from the point of their origin are much deeper than the sounds initially produced. Just like when we listen to a distant conversation we hear deeper sounds than normal because higher frequencies are easier absorbed in the environment, the same effect is at play here. Now, the fans think that they should fit the deep tonality and, therefore, start to sing at lower frequencies. The reverberated sounds now become even deeper, and this positive feedback takes place until the fans reach the lowest possible frequencies in their voices. This explains why their songs sound so rough and surly. Imagine what would happen in a world in which this shift would occur towards higher frequencies. The songs heard would be certainly milder, more pleasant and serene, which might incentivize the rise of a whole new mindset among the soccer fans. This example also shows us how sometimes learning about the feedback mechanisms in which we are involved, yet which we are completely ignorant about, may make our actions more sensible and our beings more conscious about the responsibilities and choices that we are in possession of.

And after we learn to recognize innumerable feedback loops at work all around us, quite in the footsteps of first-⁵² and second-order⁵³ cyberneticists, we may start to see the world as pervaded with gazillions of interconnected feedback swirls, some of which are positive, uncontrollably increasing in magnitude over time, and some of which are negative, dwindling down in volume and intensity, all until they merge with the sea of silence and stillness on which the boats of our beings ultimately float. Many things and circumstances in life then seem to me as either dissipating in vicious circles or spontaneously, with as little effort as possible, moving towards ever more opulent and prolific states. To illustrate this, I often refer to what I dubbed as peeing-in-the-backyard effect. Namely, imagine that you badly have to pee outside, with no bathroom nearby and only two backyards where this action could be clandestinely performed. One of them is tidy, with greenery neatly cut and floor freshly swabbed, while the other one looks all shabby, stinky and cluttered. Which one would you choose as a place to empty your bladder in? The latter one, of course, unless you are driven by the sublime ideals of equality for all and the feeling of despise for the riches that these ideals often entail. In such a way, therefore, the dirty backyard would get dirtier and the clean one would be prone to maintain its cleanness. In other words, left to evolve all by themselves, things in life that already thrive will spontaneously tend to flourish even more on the account of the disparagement of things caught in the whirlpools of hardship and suffering, as if reflecting the ubiquitous actuality of the Ostwald ripening effect well known to chemists and materials

scientists: the disappearance of small particles on the account of the growth of the big ones during their aging as a part of the same precipitate. Finally, in the context of this discourse, we should be aware that ours is the world wherein solipsism naturally breeds more and more narcissism, self-withdrawnness and self-centered outlooks. Objectivism, on the other hand, is akin to an inert stream that tends to drag all those that enter it away from the sanguine guiding voices of their inner selves and towards the very same destinations where a myriad of souls caught in it and comprising its streaming force is heading to: a deadening uniformity of worldviews and appearances, an emotional and intellectual desert wherein each grain of sand appears to be absolutely the same as all the others.

It is true that we are partly constructing our self and others, but always in conjunction with the realistic features of the constructed entities. The constructive aspect of human experience entails many delightful consequences, such as the open potential to shape our own qualities and powers as well as to heal and enlighten others by mere visualizations. However, it is important not to give too much freedom to ourselves in the assessment of our images of the world and of our own being. Should we build an overly subjective personality, we would become like blunt and ignorant police officers whom I have known from my rebellious youth days and who always saw in others whatever it was that they wanted to see. It is true that occasionally we ought to succumb to the famous Paul Dirac's principle of beauty in science, according to which 'it is more important to have beauty in one's equations than to have them fit the experiments'⁵⁴, but the doors for the feedback interaction between the visions and opinions of ours and those of others have to always remain open and actively used. For, there is no recipe for maintaining the balance between subjective and realistic streams in our reflections, primarily because shifts to one of the sides are sometimes necessary to bring about fruitful results. For example, occasionally we are tempted to hold on to our beliefs despite their non-matching the actual experience. But in some other situations, it is smarter to follow the path of the least resistance and give up on pursuing our subjective lines of thought for the sake of conforming to the methods and opinions of our surrounding. Hence, there is an incessant struggle to compromise inner beliefs with social criticism, and *vice versa*. This balance neatly reflects the general systemic struggle between adaptation and evolution that we now know to take place in the domains of biological evolution and ontogenetic development as much as in this constructivist/objectivistic cognitive synchrony.

This is all to say that, lest we be swallowed by the monstrous mouths of the demons of autistic solipsism or deadening uniformity awaiting us at the rough shores of a narrow passage that we must go through, sooner or later the time will come not only to redirect the ark of our consciousness away from the symphony of surrounding heartbeats and into the remotest cosmic distances in the stellar space of our mind, but also to recognize that 'the clarity of purposively realized objectivity is the most supernatural of all visions'⁵⁵ and that the objective aspect of our experience, enabling us to see the sameness in our worlds and draw threads of love and compassion around them is a greatest blessing to befall on us from gods. This is how we could continue our journey straight between the two pulls crucifying our being from the inside and turning it into a state describable by the image of the Christ on the Cross, inwardly and outwardly, towards the center of our soul and towards the whole wide world, as in a star sustained as the result of a balance between (a) the force of gravity that tries to compress and collapse it into a black hole and (b) the endlessly expansive energy emerging from our insides and craving to be released and shed shinningly onto all things, the former of which works to separate the star from it all and the latter of which works to merge it with all things around it in a single instant and put an end to its existence as a sole entity disconnected from all else, a shiny dot enwrapped by infinitely vast veils of darkness. These antagonistic and inherently schizoid pulls, though seemingly hardly compatible, nevertheless need to be precisely balanced and coordinated if our feet are to remain on this magical road that the Way of Love, of which more will be said in just a little while, is.

Theological meaning and implications of the co-creational thesis

'In the beginning, God created the heaven
and the earth'

Genesis 1:1

'I stood between the Lord and you at that
time, to shew you the word of the Lord'

Deuteronomy 5:5

'And the Lord spake unto Moses face to
face, as a man speaketh unto his friend'

Exodus 33:11

'God
Disguised
As a myriad things and
Playing a game
Of tag
Has kissed you and said,
'You're it –
I mean, you're really IT!'
Now
It does not matter
What you believe or feel
For something wonderful,
Major-league Wonderful
Is someday going
To
Happen'
Hafiz, *You're It*

From the wonderful carousel of perspectives presented herein, the world can be seen as arising from the interplay between its epistemological and ontological features. It is the image of the depths of human creatures as much as it is the image of the mystical features of Nature. Whereas deepening of the features of the former can lead us to appreciation of the Spirit, exploring the latter would yield knowledge on what has been depicted in religions of the world with the metaphor of God. Their incessant dialogue that we become aware of from the point of view of the co-creational thesis can be considered as responsible for the parallel evolution of mind, spirit and planet, which we can easily witness via simple historical extrapolations.

This ultimate theological dialogue is manifested in the appearance of every tiny detail of the world. The smallest ridge on a seashore pebble or a stripe on a flower petal may whisper to us the deepest secrets of our being and God. Everywhere we do look, we see reflections of the essence of our being and knowledge as much as we could see the mysterious messages of the divine Creator. But every product of our creativity, each line that we draw also presents an essential sign on the spiritual paths of both our own being and others. Such an approach to creativity, in which we perform for the satisfaction of our own being as much as for the sake of enlightening others, and in which each book presents an intimate diary and each personal note may be meaningful for the whole civilization, has yet to be attained. The concept of this book presents only a tiny step in the direction of attaining this ideal of well-balanced individuality and commonality. For, like the multitude of stars of the night sky and the spirit of

unity of it all brought forth by the blazing Sun flow into one another before each sunrise and after each sunset, so is the differentiation of one into many and fusion of many into one a pair of operations that our minds need to incessantly alternate in order to maintain the blissfulness of their inner spheres. After all, Adam, the first character to appear in the play on the origins of life known as the Old Testament, is the word that has originally denoted a single human as well as the whole humanity. Its echo may still signify the impossibility of separating what is relevant for one human creature from what is relevant for humankind in its entirety.

However, none of these poles that co-create experiential features could be known alone, as Kant's things-in-themselves. Rather, they are merged into perceptive forms of a higher order, so that each object, inasmuch as it is endowed with unique objective features, is also a reflection of the current state and the complete history of the observer's consciousness; or, as Kant, himself, would have pointed out, 'objects are quite unknown to us in themselves... they are mere representations of our sensibility'⁵⁶. Consequently, bearing resemblance to the interaction of poles represented in the ancient Chinese Tai-Chi-Tu emblem, every epistemology, *i.e.*, the nature of knowledge, has its roots in ontology, *i.e.*, the nature of being, whereas every ontology has its fundamentals in epistemology. The observer defines and co-creates the observed, whereas the observed defines and co-creates the observer.

Any changes that occur on the plane of our deepest spiritual aspirations, therefore, could not be directly seen and appreciated, but become mystically reflected in the features of the world of our experience. For this reason, it has been said that 'now we see through a glass, darkly; but then face to face' (Corinthians I 13:12). These links that connect experiential appearances with the deepest aspirations and spiritual desires of the subject beings present the strings of the lute of ethics and aesthetics that all the theologies, religions and traditions of wisdom of the world have been playing on. All the prophecies and revelations present none but insights into the nature of this correlation between human heart and welfare within the world of human experience. This has been frequently summed up with the old prophetic saying, 'Ye will reap what ye sow' (Galatians 6:7).

Theological reflections of the co-creational thesis point to an incessant dialogue between human spirit and Nature immanent in each tiny detail of the world. The harmony between subjective and objective traits of any experiential reality, inherent in the co-creational thesis, also makes it perfectly clear that only a parallel listening to one's own heart and to the guiding voice of Nature may provide us with the right incentives towards the mutual evolution of inner, spiritual and outer, informational landscapes of the world. And just like the ultimate religious insight in the Hindu tradition belongs to the enlightening moment when one realizes that Atman, equivalent to the human soul, is one and the same with Brahman, equivalent to the soul of the world, the same ultimate peak in our journey of co-creative learning in this dialogue between the deepest features of our being and Nature belongs to the revelation that the pathways of human heart end up with the Way of Nature, and *vice versa*: that the ways of Nature end up in the wells of the human heart. In those moments, we realize that the ultimate freedom equals a faithful obedience of the divine mission meant for our being to carry out, and the other way around: that fulfilling this divine mission is impossible without relying on the free choice of our self. Thus, when Nature and our spirit become One and the same is when we have reached the highest summits in the co-creational evolution of our being.

The co-creational thesis as a depiction of an encounter of two equally creative halves together involved in crafting the evolutionary path for the whole implies the inherent imperfection of both of these poles. For, had one of them been utterly perfect, no need for handing over the creative power to another would have ever arisen. That the human mind as one creative side is imperfect does not come as a surprise, but that God, that is, Nature is equally imperfect may come forth as quite a surprise to most of us. This may be especially striking to those who have been made familiar with the most popular,

mainly monotheistic theological systems only and have skipped the fact that many ancient, particularly polytheistic religions of the world, including the Mayan⁵⁷, for example, actually supported this idea of inherent imperfection of the creator of the Universe. This insight, moreover, comes with a plentiful of theological implications. One of them, most crucially, is that with such a shift in the way in which the divine Co-Creator of reality is seen, from omniscient and omnipotent to humanely imperfect, gods *per se* become far more lovable in our eyes and, thence, our relationship with them becomes more open, intimate and versatile. Together with one such expansion of our capacity to love gods and Nature as a whole comes the broadening of our religiousness and potential to heal the world with our acts. Just like employees tend to see their superiors surrounded by an aura of flawlessness, so do humans have a tendency to represent gods in the light of phony perfections, a perspective that is as childish as it can get in this world of ours where only perfect imperfections can claim the epithets of utter perfections. Relationships based on the presumed perfection of one of the parties do not only result in disappointments sooner or later, but also produce carelessness, passivity and uncreative obedience, as opposed to creativity that solely arises from care for fragile and imperfect things of this world, be they human creatures, inanimate objects, works of art or very God. Finally, whereas a sense of perfection naturally yields stagnancy and creative inertness, finding perfection in imperfection and *vice versa* marks the onset of the awakening of genuine wisdom in us, whereby we become able to love each and every detail of the world, regardless of how flawless it may be, alongside involving ourselves in its ceaseless propulsion towards ever more advanced states. This all goes to say that only a co-creational relationship between the human mind and Nature, whereby each of the creative sides looks after selflessly edifying the other, can give rise to a Cosmos that unstoppably evolves towards ever more blissful emanations of inexplicably great potentials dormant in the material substrate of our physical reality. Also, the realization of intrinsic imperfectness of the divine Co-Creator can be poetically rephrased by saying that God needs our help to save the world, an insight that presents the starting point of our ascent to becoming a spiritual star on Earth, a true Son of God as the Christ was.

A beautiful theological analogy may be, furthermore, drawn between the idea of co-creation and the fundamental concepts of Christianity. Namely, the concepts of the Father and the Son can be regarded as respectively representing the hidden ontological reality and human mind, which are, in fact, the two co-creative sides behind the formation of primary experiences. And the concept of the Holy Ghost presents none but this mysterious way that links these two poles. It can be imagined as presenting the points of intersection of these two basic creative spheres, human being and Nature, and, thereupon, accepted as identical to perceptive boundaries. As a result, all that we can perceive and be aware of can be regarded as an emanation of the Holy Ghost. Everything arises as the touch between human spirit and all-pervasive God.

In both Catholic and Orthodox Christian traditions, when people enter a church or emphasize a prayer, they cross with their arms and fingers, although in slightly different manners. However, the basic ritual is always the same. The hand draws the first point up signifying the Father, and the second point down signifying the Son, making an imaginary vertical between Heaven and Earth. But then the hand makes a horizontal line that divides the vertical one in half, signifying the Holy Ghost. The analogy between this symbolic theological concept of the cross and the idea of co-creation of the world thus becomes more than obvious.

Objectivistic religious views have taught us that man is helpless and that the real salvation lies in the hands of the all-encompassing power of God 'out there'. In contrast, solipsistic views of religion have been pointing to undiscovered powers lying in the domain of human spirit, in terms of our deepest aspirations and intentions. Whatever we wish, Nature provides for us, they may claim, emphasizing that the world is but a stage for the deep fountains of our fancy to play on alone. Christianity has, however,

introduced a balance between these two extreme views by invoking a harmony between the divine powers ascribed to man ('Ye are Gods' (John 10:34), the Christ reminded his disciples of the message from the psalms (Psalms 82:6)), and a belief that the presence of God penetrates every tiny bit of the world around us. Christianity thereby introduced the notion of the Holy Spirit as the link between the Father and the Son, and set the metaphysical grounds for the co-creational thesis propounded herein. In fact, Christianity could be on one hand regarded as merely a metaphor of the ontological essence of the co-creational thesis, in which a creative involvement of both the human spirit and Nature in outlining each detail of the world of our experience is proposed. On the other hand, however, Christianity can be seen as a glorifying continuation of the co-creational thesis, wherein the creative powers of the two sides involved in the co-creation of experiential features – mind and Nature - are magnified to fantastic proportions.

The co-creational thesis also provides a dazzling theological perspective on reality by envisaging the latter as composed of incessantly interacting missionary self and Nature, that is, God. By ascribing the attribute of 'divine' to literally everything beyond the boundaries that define the physical limits of one's being and demarcate oneself from one's environment, not only inanimate objects and processes turn out to be seen as emanations of the divine, but the spirits of all living creatures other than oneself become similarly embraced by the starry shroud of sheer godliness. Consequently, in agreement with the Christ's utterance, 'Ye are gods' (John 10:34), each creature other than one is seen as God from one such enlightened standpoint. After all, if we strive to attain a spiritually stellar nature, we should be at peace with the state of being whereby one dwells in the blind spot of one's own light, unable to recognize it and rejoice in its view, living under the constant impression of resting in the dungeons of cosmic darkness, while others are seen in the light of eternal goodness whose rays emerging from our insides illuminate them. This may be so because assurance of one's own divinity is a death sentence to the latter, whereas constant doubtfulness, questioning and uncertainty about the correctness of our paths are ineluctable steps that lead to higher vistas on the pyramidal evolutionary platform of being. If we presume that one such point of view helped the Christ to realize the celestial potentials of his, and arguably everyone else's being, we could arrive at a logical conception of beliefs that only when we ascribe an ultimately divine nature to each and every creature in this Universe and thus uproot the tree of knowledge whose fruits Adam and Eve tasted before they were being deported from Paradise (Genesis 3), that is, of judgmental discernment of things good and evil, quite illusory and irrational under the holistic umbrella of the dialectical evolution of life as a whole, will we fulfill an essential mental requirement that conditions our ascension to heavenly states of creative being.

Be that as it may, the underlying message of both the co-creational thesis and Christianity is that we need to creatively build ourselves from inside, through a meditative inwardness, and also to live so as to learn to recognize the divine, angelically beautiful voices revealed in every detail of the world. In view of this, whenever we enter the church, we should not do it while believing that the only real church lies at the bottom of our hearts and thereby neglecting the precious messages we can find in the sense of subtle breeze, quite sound, serene smell and the placid visual appearance of the finest details in it. Neither should we enter it obsessed with these outward messages, while ready to passively submit the creative core of our being to the authorities of others, be it the very image of God, the guidance offered by priests or the signs delivered by icons hanging on the wall. Instead, we should enter the church with the brightest flame of faith and love burning in our hearts on one side and with a humble passion that makes us deeply admire the preciousness of the divine underlying meaning and message of every tiny detail of the 'home of the Lord' on the other. And when we succeed in attaining this balance between focusing inward and outward, we will find ourselves humbly bowing in front of the beautiful murals

with soft tears in our eyes and a lump of pure devotion lightly shaking in our throat, and yet we would feel as if the faces on the murals equally happily bow to us.

After all, the image of the crucified Christ could be also identified as a strong metaphor of the advocated co-creational thesis. Namely, besides being emblematic of the duality of choices that outstretches our beings in the opposite directions and impels us to find a middle Way between them, this powerful image depicts the Christ's bow-headed immersion into his own heart, but with his hands stretched towards the world, symbolizing both his inner quietness and the divine goodness that spreads out his inner love to sanctify and heal others. Somewhat like the Sun, deeply immersed in itself, burning its inner essence to sustain its wonderful glow, and yet existing purely for the sake of animating others. Without requiring anything in return, it places the life-sustaining light upon the planets that circle around. It is exactly this balance between an inner peacefulness and introspectiveness on one side, and living thoroughly for others on the other that presents the secret of the miraculous pathways of Love.

The Way of Love

'You shall be together even in the silent memory of God. But let there be spaces in your togetherness, and let the winds of the heavens dance between you. Love one another but make not a bond of love: let it rather be a moving sea between the shores of your souls. Fill each other's cup but drink not from one cup. Give one another of your bread but eat not from the same loaf. Sing and dance together and be joyous, but let each one of you be alone, even as the strings of a lute are alone though they quiver with the same music. Give your hearts, but not into each other's keeping. For only the hand of Life can contain your hearts. And stand together, yet not too near together: for the pillars of the temple stand apart, and the oak tree and the cypress grow not in each other's shadow'

Kahlil Gibran, *The Prophet*

Each way stands for an entity that stands between. At the same time it divides and unites. It connects presumably separate beings or things, and *vice versa*. As such, it may be accepted as an ultimate symbol of the ubiquitous dialectical nature of existence. The symbolism of the way may be also reflected in the simultaneous existence of independence and self-responsibility on one side and empathy, compassion and spiritual unison on the other in our social relationships. And this is the essence of the advocated path of the divine Love.

For Love does not passively follow others, forgetting thereby its own inner path. It also does not listen only to one's intrinsic voice of self-satisfaction, neglecting thereby the subtle calls to satisfy the spiritual desires of others. Just like the aforementioned Sun that burns its own inner essence whilst deeply immersed in itself, and gives away the resulting light without desiring anything in return, Love shines through an attitude of mind that is firmly anchored in listening to one's heart and the music of the divine mission from inside, and yet passionately lives to creatively build others. Such a nature of being is perfectly consistent with the already mentioned autopoietic character of biological systems in which, irrespective of their complexity, ranging from molecular entities of unicellular organisms to the components of ecosystems and the biosphere, all comprising species continually re-produce the overall system by being engaged in the mutual re-creation of each other⁵⁸. After all, as wise men have taught all through the ages, only cycles of life based on self-sacrifices made from one generation to the next, for the sake of promoting the wellbeing of the newcomers to it, have a chance to act as evolutionary wheels

on which life on this planet will be ridden towards divine and utterly blissful forms of being, far beyond the animalistic selfishness that has had the heart and soul of the common man in its grasp for millennia.

The autopoietic nature of fulfilled being is nicely illustrated by a story in which a sage is brought by God to take a peek into Heaven and Hell. First, he gets to have a glance at Hell, which appeared as a room filled with people with gorgeous food sitting on tables in front of them. However, all the people in the room had large spoons tied to their hands and they extended far too long to enable each one of them to feed oneself. The scene appeared absolutely appalling to the visitor, as he gazed at a pale and starved person trying to pour food into his mouth. His efforts were in vain as practically all of the food either dropped to the floor or rolled down the long edges of the spoons and got spilled all over his already stained and stinky clothes. Starved to death, each person in the room was preoccupied with trying to feed oneself with as little energy as they, malnourished as they were, had. Their struggle was simply immense. Then, the sage was walked to see Heaven. He was stunned to realize that the room and everything in it, from the food to the people to the large spoons attached to their arms, was exactly the same. Yet, they all seemed happy and well fed. The sage turned to God and asked: 'I do not understand. Why are these people happy if they share the same troubles as those in Hell'? To which God replied: 'They mastered the art of feeding each other'. To live so as to feed the spirit of others and yet to be aware that creative powers that enable us to do so are sustained by our meditative dwelling deep inside of our mind and heart where we ceaselessly forge precious memories, visions and emotions into these bursting sunrays of creativity, is the key to the balance of the mind that I christen hereby the Way of Love.

In fact, the Way of Love could be seen as residing at the heart of the co-creational thesis. Namely, by pointing out that each detail of one's experiential world is the creation of oneself as much as it is the creation of the external physical reality, the co-creational thesis implicitly outlines the need to care for both the inner and outer sources of experience. Our attention needs to continuously balance the relevance ascribed to impressions arising from looking inwardly and outwardly. When placed along this middle way, many harmonious solutions to problems and challenges in life will dawn on us. As such, the principle of mutual referencing to insides and outsides could be used as a general principle underlying many fruitful problem-solving attitudes.

Hence, when translated to the level of interpersonal interactions, the co-creational thesis with its inherent balance between subjective/idealistic and objective/realistic features points to none other than the balance between self-responsibility and following of one's own 'voice of the heart' on one, subjective/idealistic side, and compassionate living for the sake of salvation of others on the other, objective/realistic side. Although common sense reasoning dictates that Love is inextricably connected with one's devotion to another, this inherently submissive tendency needs to be balanced with one's marching to the beat of one's own drum, so to say, if one is to personify Love in its divine nature. It is for this reason that one of the two most basic commandments uttered by the Christ had pointed at the need to love the neighbor neither more nor less than as much as one loves oneself (Mark 12:31). With this message of his he implicitly told to the world that without this intrinsic sensitivity, carefulness and reflectivity that love of oneself in its most divine form naturally yields, no spiritual progress on this planet could be imagined. To succeed in this mission of evolving into a stellar spirit, thus, besides striving to reach a sense of unison with other people's hearts, one has to be in constant meditative harmony with the music of one's own inner microcosmic, mental and emotional spheres. 'Love has no other desire but to fulfill itself'⁵⁹, Kahlil Gibran thus noted down, bringing us face to face with the fountainhead of a celestial being on Earth, ultimately oriented towards bringing forth the infinite treasures of one's divine soul through a most intense introspective focus. Aristotle had a similar vision of the ultimate deity, having seen it as a sentience 'completely wrapped up in the contemplation of his

own experience, in the ecstatic enjoyment of his own eternal perfection, being unlike Olympian Zeus as such⁶⁰, which inspired him to advocate the imitation of it by the earthly souls striving for cognitive perfection, the result of which was his idea that ‘the good man should be a lover of self (for he will both himself profit by doing noble acts, and will benefit his fellows), but the wicked man should not; for he will hurt both himself and his neighbors, following as he does evil passions’⁶¹. Many centuries later, the proponents of (post)modernism in literature recognized that the greatest art is born when the artist is immersed in one’s own world and pays no heed to the satisfaction of the reader, thus reiterating the love for oneself as an indispensably essential driver of creativity. And if anyone accuses one of narcissism for observing this self-loving precept, think of Gustav Mahler, Danilo Kiš or Pablo Picasso, all of whom were called narcissists by their nemeses, including Robert Hirschfeld⁶², Dragan Jeremić⁶³ and Normal Mailer⁶⁴, respectively, simply because of dwelling in their own worlds and digging through them for golden insights, insights that they would be wholly and selflessly bestowing upon humankind as a whole, holding in their narcissistic aura the secret of their creativity. In defense of this idea of self-lovingness, Erich Fromm complemented Aristotle’s views in his magnificent essay on the Art of Loving, where, among other things, he proposed the following: ‘Love is possible only if two beings mutually communicate from the centre of their existence... Love, experienced as such, is an unending challenge; it is the place not of resting, but of an incessant activity, growth, mutual strivings... And really, to be able to concentrate, to be able to be alone with oneself is the predisposition to love. If I am attached to another person because I cannot stand on my own, he or she can be my savior, but our relationship is not the one of love. Paradoxically but true, the ability to be alone is the precondition for being able to love’⁶⁵. Carl Gustav Jung struck a similar chord when he stressed out that ‘loneliness does not necessarily present an obstacle to intimacy with others, since none is more sensitive to intimacy than a lonely man, and intimacy succeeds only insofar as every person preserves its individuality and does not identify with others’⁶⁶. Similarly, in the effort to create the so-called ‘beehive’ sense of harmony between actors in a single improv troupe, Jerzy Grotowski, who held onto the belief that theatre at its core is an act of co-creation of events by actors and spectators⁶⁷, implemented the following ideas that strongly resonate with the alternation between moving away from and to one another that constitutes the core of the Way of Love: ‘A group cannot always be together. You must separate and meet again. You need hours and days of common work within your community, but afterwards each must have days during which one goes in one’s own direction... After several days we all come together again in our group. We want to come together again because this double rhythm exists. As inspiration and expiration. As night and day. In order to be together, in order to really remain together, without any reciprocal defenses or defense mechanisms, one must also keep the right of solitude, the right to leave in order to return. A certain rhythm of leaving in order to return is inevitable for the group to live. If it doesn’t, it closes itself in on itself, resulting in a kind of collective egoism, functioning against everyone which is around it. You must have the two rhythms which are, which are very beautiful’⁶⁸. Concordantly, Shimi Cohen, a fierce criticizer of the online social networking platforms that, according to him, offer their users a quick fix for their sense of loneliness with the mantra ‘I share, therefore I am’ noticed that ‘we slip into thinking that always being connected is going to make us feel less alone, but we are at risk because the opposite is true: if we are not able to be alone, we are only going to know how to be lonely’⁶⁹. Finally, this is why the trapeze artist from Wim Wenders’ *Der Himmel über Berlin*, who says that she ‘has never been lonely, whether alone or with someone else’, uses the suddenly awakened sense of ‘lonesomeness’ in her to realize that she has been gazing into the eyes of her soulmate; for, when a perfect interface with another human being is such that it polarizes one’s mind into a simultaneous sense of intimacy with oneself and intimacy with another, then either the powerful empathic connectedness with the neighboring soul or the inspired immersion inside oneself can be interpreted as signs that this

perfect relationship has been reached. Being unable to feel stellar in solitude and always running out to holds hands with others is, thus, posing risks of the same magnitude for our spiritual growth as feeling comfort only when we are isolated from people and not expected to interact therewith. After all, if there was a single trait by which we could recognize stars of spirit on Earth, it would be their ability to retain a comfortable state of loneliness even in the midst of the busiest and the most congenial crowds of people.

By spending time in solitude we naturally focus on ourselves, inducing quietude of reflective loneliness in our mind, whereas by spending time in community we spontaneously build the desire to live for others. However, being alone with our focus deeply anchored at the depths of our heart and mind and yet passionately maintaining the oneness between our self and others presents the key to the Way of Love. Simply saying, if our desire is to enrich the world with the enlightening messages that we will radiate with by the way we reason and behave, we need to cultivate the incredible richness of spirit within ourselves. Eventually, this communicational enrichment that presents the ultimate purpose of our lives is a feedback process during which we continuously enlighten our spirit by being impressed by the beauty and the wonders of the world, whereas on the other hand we live so as to leave the traces and imprints of pure, divine beauty in the world itself by means of our creative powers.

If you have ever wondered what the secret behind the magnetic personalities is, be sure it lies in their residing on the Way of Love. People tend to be naturally attracted to persons who seem as if holding onto an inner path of their own with a peaceful and aristocratic radiance, but do not neglect the ideal of living thoroughly for the sake of enlightening and beautifying others. A glance at the balance between a peaceful, inner meditative focus and a warmhearted and natural feedback of gestures and acts in interaction with others can be used to assess the psychological wellness and harmony of a being. If it seems as if the being possesses enough of the inner focus but lacks a natural vividness in communication, appearing frozen or distant, one can conclude that a shift away from the balanced state may have occurred. An opposite extreme would lie in one's expressional liveliness, although coupled with an inability to exert a quiet and peaceful radiance upon focusing onto one's own inner path.

Lao-Tzu's Tao-Te-Ching is a book that in its form neatly reflects the balance lying at the core of the Way of Love. The first verse of the book states that 'a way that could be denoted is not the eternal Way, Tao' (Tao-Te-Ching 1), clearly inviting the reader to look for a divine path inside his own being. The way of this book, practically enwrapping the essence of the entire sum of human wisdom, however, ends with an observation that 'the holy man does not pile up knowledge and treasures for himself: he lives for others and yet becomes ever richer; he gives to others and yet lives in an ever greater abundance' (Tao-Te-Ching 81). Such a well-balanced meditative withdrawnness, careful listening to the inner way of one's being, and living so as to give the fruits of our creative existence to others, enlightening them on the way, is also intrinsic to the original, Jesus' teaching of the Christian path. When asked by one of his disciples about the ultimate commandment for a spiritually fulfilling life, Jesus replied: 'The first of all the commandments is, Hear, O Israel; The Lord our God is one Lord: And thou shalt love the Lord thy God with all thy heart, and with all thy soul, and with all thy mind, and with all thy strength: this is the first commandment. And the second is like, namely this, Thou shalt love thy neighbour as thyself. There is none other commandment greater than these. And the scribe said unto him, Well, Master, thou hast said the truth: for there is one God; and there is none other but he: And to love him with all the heart, and with all the understanding, and with all the soul, and with all the strength, and to love his neighbour as himself, is more than all whole burnt offerings and sacrifices. And when Jesus saw that he answered discreetly, he said unto him, Thou art not far from the kingdom of God. And no man after that durst ask him any question' (Mark 12:29–34). By proposing two major norms, one related to immersion in the divine voice concealed at the depths of our own mind and heart and the other tied to being compassionately devoted to creatures that surround us, the Christ placed two

end points, representing nods between which the strings of the Way of Love can be easily stretched and let play with sounds that inspire humans and gods alike.

Thus, while walking along the Way of Love, one is wholly devoted to others, but also absorbed in the way of one's own heart. One strews others with the sparkles of care, but does not forget about the importance of looking after one's own path, knowing that the personal divine mission in life can be accomplished only if one manages to balance giving oneself thoroughly to others and sanely nurturing the creative core of one's being from which all the inspiring incentives arise. Should one succeed in balancing this sense of solitariness and trueness to the voices and the vibes emerging as divine guidance from the depths of one's psyche on one side and the sense of unreserved dedication to a fellow soul on the other, one would come across the solution for the 'bitter tears' of Petra von Kant, namely Rainer Werner Fassbinder's character who realized that 'people are made to need each other, but they haven't learned to live together' and let her marriage go down the drain because of not being able to preserve this trueness to oneself while being bonded to another person. And when we slip from this balance of the Way of Love, neither are we anymore capable of digging celestial actions that inspire the world from the starriest depths of our soul nor does the world, itself, anymore have the magical appearance to our senses. In a particularly lucid moment of her fancy, Mrs. Miniver drew the solution to this problem in the form of a Venn diagram of I and Thou levitating in the air before her bubbly head, having suddenly 'seen every relationship as a pair of intersecting circles'. 'It would seem at first glance that the more they overlapped the better the relationship; but this is not so', she continued. 'Beyond a certain point the law of diminishing returns sets in, and there are not enough private resources left on either side to enrich the life that is shared. Probably perfection is reached when the area of the two outer crescents, added together, is exactly equal to that of the leaf-shaped piece in the middle. On paper there must be some neat mathematical formula for arriving at this; in life, none'⁷⁰. This witty equation I derived long ago, as a teenage chess prodigy, when I realized that if king and queen were to stick together on the chessboard all of the time, positioned at adjacent squares, a catastrophic positional error it would be, inevitably costing one a game against a sufficiently strong opponent. It is then that I learned that some distance must be made between any two most fondly related characters if the game, be it of chess or of life, is to be won. Also, when you draw a heart, pay attention that it is but a circle that folds inwards at its top and protrudes outwards at its bottom, attesting to the central tenet of the Way of Love, which says that the only viable way of reaching out to a person in love with is such that it makes one simultaneously pulled inwards, into the depths of one's inner world wherefrom the sources of beautiful words and gestures could be dug out and pulled to the surface of one's being. From the mystic messages inscribed in the shape of the heart, my antediluvian chess insights and Mrs. Miniver's fanciful musings, it follows that the mentality of the Way of Love is such that it maintains the core of one's deepest emotions, thoughts and aspirations secret, knowing that this is the only way for the other, expressive and empathically intimate aspect of our being to shine in its full creativity, gliding on angelically pure and unconstrained flights of spirit.

Hints at this fundamental behavioral-perceptive principle christened here as the Way of Love have sporadically popped in ruminations of various classical and contemporary thinkers, before drifting back into the ocean of the eternal mystery where the most beautiful ideas abide best. In her analysis of the perennial problem of loneliness that has haunted human beings ever since the dawn of the human race, the graphic novelist, Kristen Radtke said that 'if a line were drawn and I was asked to mark an X for loneliness and an X for love, I might impulsively draw them at opposite poles. But the drive of each is similar. They're both designed to keep us together.... I want to use loneliness – yours, and mine – to find our way back to each other'⁷¹. A similarly keen insight about the complex overlap between inwardness and expressiveness as this one or Mrs. Miniver's was arrived at by the memorable movie

character, Frances Ha, a. Namely, in the eponymous movie about Frances, she finds herself by the dinner table at a couple's place and, having noticed the enormous extent to which their Miniver's circles overlap, leaving no space for their openness to the world around them and making them insipid and miserable because of being consciously shielded from all the beautiful things that their social surroundings have to offer, she says the following: 'It's that thing when you're with someone and you love them and they know it and they love you and you know it, but it's a party and you're both talking to other people and you're laughing and shining and you look across the room and catch each other's eyes, but not because you're possessive or that it's precisely sexual, but because that is your person in this life and it's funny and sad, but only because this life will end and it's this secret world that exists right there in public, unnoticed, that no one else knows about. It's sort of like how they say that other dimensions exist all around us, but we don't have the ability to perceive them. That's what I want out of a relationship. Or just life, I guess'. The key to finding this balance between being dedicated to another and yet being open to life as a whole, so that love arising from the former could be given to the world and the beautiful insights that the world has to offer could be, in turn, used as a fuel to foster the fire of this love, lies, of course, in the Way of Love. In other words, the point is to have the cognitive spheres of the lover and the loved overlap extensively, but not completely, so that the remaining portions thereof could be used as pots wherein insights derived through independent introspection and exploration of the world are melted, yielding energy that sustains this intersection at its most prolific. Alternatively, if this balance is disrupted and one of the circles starts to eclipse the other, a relationship analogous to that between the nymph Echo and Narcissus from the Greek mythology would form. And because Echo, in so much love with Narcissus, would only repeat Narcissus' words, whereas Narcissus would love his own reflection only, their relationship would eventually reach the point where the same words and acts get repeated, over and over again, and no new insights or gestures for either sides become possible.

Somewhat similar to the difference in the electrical potential that sustains the flow of current through the circuit, placing one pillar of our cognitive devotion into the inner shrine of our deepest thoughts and aspirations and another one in the midst of the wonders of the surrounding world sustains the flow of the life-giving energy through our mind and body. And yet, in order to make this energy flow, an uninterrupted connection between these two pillars has to be maintained. Impressions of the outer world are thus to be brought close to our hearts, whereas the aspirations, emotions and thoughts swirling across the depths of our being are to be embodied in our expressions and, via subtly inspiring others, let freely multiply across the fields of the world. Only then may these majestic strings stretched between the two nodes, one residing in our soul and the other residing in the world, start vibrating with an enchanting music that can nourish both man and entire Nature with the waves of divine inspiration.

Such a balanced personality is aware that it is in human nature to be particularly mesmerized by the mindsets that follow their own inner course, but live for the sake of beautifying others. 'Love mankind. Follow god'⁷², Marcus Aurelius instructed oneself during his meditations, reflecting on the most captivating behavior out there, which is such that it is being constantly guided by the divine voice inside while handing over all its blessings to others and others only, albeit without letting this relentless devotion to another take one off the inner track. 'The reason why we love Eden is because we have been expelled from it'⁷³, William Vollmann said once, reminding us that partly expelling the world and the surrounding beings from the domain of our awareness by withdrawing our attention into the inner spheres of emotion and thought, but still embodying a whole Paradise by living with the sole purpose of beautifying others is where the secret of irresistibly charming personalities is hidden. Those who respect and value others more than they value and respect themselves will essentially leave the impression of an awkward and desperate neediness for love in others. Such an attitude, therefore, does not represent one's enlightened readiness to give love in charming and inspiring ways. Instead, it reflects one's greedy

cravings for attention, affection and approval from others. And it is a well-known psychological phenomenon that whenever we badly need something, we forfeit our inner strengths and powers that foster effective communication⁷⁴. This makes us appear weak and instead of looking for the creative encounter between our inner aims and expectations of others, we may become easily manipulated and controlled by others. This naturally drowns the confidence and excitement of our expressions, making them cede their place to feelings of fear, discomfort and uneasiness.

However, the other extreme, that is, the state in which one values oneself more than others, can be seen as equally dissatisfying. Such personas leave the impression of displeasing egotism and wholly unattractive selfishness and deviate from the balance of the Way of Love into spiritual voids with an equivalent level of degenerateness as the souls living to satisfy others to such an extent that they have forgotten to dance their expressions out to the beat of their own celestial hearts. One or the other, like pious churchgoers, world wide web dwellers or actors who can pour their hearts out only when their communicator is hidden in the darkness by the confession grid, by the virtual distance or by the limelight, respectively, they often find the enlightening love for man in the complete absence of another man, the feel that instantly deflates in view of the first living person in their vicinity, all as a result of their tragic divergence from the Way of Love. For, whether one drains one's own creative well by submissively worshipping another or by being unable to dig the drives to embellish another with stars amidst which one swims, the destination is the same: a lonely gutter by the side of the Way of Love.

This Way of Love is as much about strewing others with the sparkles of beauty and grace as it is about promoting their own creative expressions. Extensive living for others, at the price of extinguishing the light of the torch that lights up the way inside and cutting the channels through which the divine voices echoing from the center of our being crave to be released to its surface, has, in fact, comprised the essence of the distorted teaching of the Way of Christ, as propagated by the mainstream of his religious followers. This imbalance is to be blamed for Christianity's raising spirits that have nothing in common with the Christ, resembling dark shadows walking in long processions after one another more than shiny spirits that boldly bless and beautify the world around them, as well as for the fact that the first and the foremost regret of people lying on their deathbeds is being untrue to oneself and living life too passively, always looking after the reception of the social praise and compliance with the trends and expectations set forth by other people, being more akin to Morrissey's 'rain-coated lovers' puny brothers... raised to wait... underact, express depression'⁷⁵ and Nietzsche's 'soft-treaders, and half-and-half ones, and the doubting, hesitating, passing clouds' than to heralds of 'noise and thunders and tempest-blasts'⁷⁶. As it usually happens, the first generation of followers can be said to have been responsible for this quiescent wander off the strait and narrow line of balance between the Christ's two quintessential commandments, one orienting oneself to one's insides, wherefrom the divine guidance extends outwardly, and the other one impelling oneself to open up and release this inner shine externally. Contrastingly, St. Paul the Apostle demanded the predominant obeisance to the latter, empathic commandment and erroneously propped it as far more significant than the former, meditative one. Such a deviation from the Christ's path was one of the reasons for the harsh criticism in the light of which Friedrich Nietzsche and many other Christian anarchists, including Ammon Hennacy who famously proclaimed that 'Paul spoiled the message of Christ', interpreted the teaching of St. Paul the Apostle.

The latter, as we see, was manifested in the open sticking to only one of the two major commandments proclaimed by the Christ (Mark 12:29-31). Thus, St. Paul says 'all the law is fulfilled in one word, even in this; thou shalt love thy neighbour as thyself' (Galatians 5:14). One can argue, of course, that by promoting this particular commandment over the one associated with obeying 'the divine voice inside', St. Paul wanted to bring peace to the world which he might have felt was threatened to become one pervaded with Crusade Wars, Christian fundamentalism and the terrors of Inquisition, the

world in which ‘(those who profess religion) are they who are represented as professing to love God whom they have not seen, whilst they hate their brother whom they have seen’⁷⁷, as observed by the former American slave, Frederick Douglass. Notwithstanding that in the absence of St. Paul’s somewhat marketing, merchant effort to spread Christianity outside of the borders of today’s Israel and Palestine, this religion would have probably remained only one of out of innumerable sects that abided on this land two millennia ago, this rather incomplete teaching of St. Paul was criticized for enabling the subsequent manipulation of religious followers by the church authorities, which human race evidenced for many centuries that followed. As an anonymous commenter on a blog posted by Slavoj Žižek, noticed, ‘Christianity should in truth be called Paulinity after Paul... Followers of Jesus were admonished, browbeaten, harassed, convinced of their original sin, a Pauline invention, and threatened with damnation into subscribing to what in fact is Paulinity, a rather nasty and misogynistic update of the Old Testament wrapped in the guise of the words and deeds of the New Testament Jesus’⁷⁸. The torturous dogmatic teaching that followed paradoxically went right against the core concept of Christianity: faith, which makes people’s minds open to questioning, uncertainty and wondering rather than confined and limited in the frame of undisputable axioms of thinking. Also, when we abandon the cultivation of inner ethics and the sense of responsibility that refers to the core of our own hearts first and only then to the authorities of the world (by such a negligence of the commandment that makes us amenable to the voice of our own being from inside), the space for manipulation of ourselves by others becomes open.

Of course, all through the ages, visionaries able to realize that institutionalized religious thought transforms the Christ-like creatures who insist on everyone being gods in their essence (John 10:34), wishing never to autocratically raise themselves over others, to the Grand Inquisitor depicted in a popular scene from Dostoyevsky’s *Brothers Karamazov*, demanding sheepish obedience and extinguishment of the guiding divine voices within people’s hearts, raised their voices against such attempts to make an organized political movement out of a spiritual teaching and utilize it as a tool for manipulating the public opinion and governing entire states. One of them was the crafter of the American Declaration of Independence, Thomas Jefferson, who shared beliefs in unacceptability of the endowment of the Christ’s creed with political and inherently manipulative motives. For, as he believed, ‘No man can conform his faith to the dictates of another. The life and essence of religion consists in the internal persuasion or belief of the mind’. Upon paying a visit to the National Museum of American History in Washington, D.C., one could thus come across Jefferson’s Bible filled with holes he made in it in order to separate the authentic Jesus’ words from embellishments added to the scripture by the evangelists, that is, ‘misconceptions of Jesus’ followers, expressing unintelligibly for others what they had not understood themselves’⁷⁹, as the third American president, himself, put it. Rebelliously going against the New Testament writers’ threats that whosoever ‘shall take away from the words of the book of this prophecy, God shall take away his part out of the book of life’ (Revelation 22:19), he lived in accordance with both the authentic approach of the Christ as well as that necessary for one to bring innovative ideas and expressional manners to the world, both of which always have their first steps made in opposition to the mainstream and clichéd stances occupied by the majority and into the dark and uncharted territories of human being.

Be that as it may, transformation of the originally anarchic Christ’s teaching into vulgarized autocratic forms imposed by the Church has left permanent scars on the consciousness of humanity. Although the Christ emphasized each and every one’s ideal role of a servant in the society (Matthew 23:11-12), drawing our attention to the fact that any desire to govern implies control of another, which can be, in turn, considered as violent in its heart owing to threats lying at its core and, therefore, inherently antichristian, in practice we see the essence of his teaching fully inverted with words wholly intact, an incessant reminder of how the deepest foundations of our worldviews, our intentions, emotions

and other invisible qualities are what truly matters, while holding on to mere language in our attempts to grasp the divine essence of the Universe predisposes us to epic falls from grace. Yet, to prompt churchgoers to be an obedient and spiritually emaciated flock and pay mere lip service to the powerful ethical teaching of the Christ rather than to be free-thinking individuals who would doubt, reanalyze, rediscover and digest the essence of His ideas over and over again with one's heart has been found out to be more desirable by the power-seeking Church. For, to foster control, the religious authorities naturally demanded elementary charity as more important than listening to the voices of angels reverberating across the divine dome of the microcosm of our heads and hearts, and brought about a striking fall from the balance of the mind describable by the concept of the Way of Love.

Needless to add, such a shift away from the balance of Love and in the direction of being too charitable to others naturally transforms us into passive and masochistic devotees, easily subjected to manipulation by the powers that be, be they political organizations or any social associations, or simply humans to whom we have ascribed an aura of authoritative powerfulness. Such a shift that suffocates the drives emanating from our sense of self-responsibility for the state of ourselves and the world also has a blurring effect on the creative traits of our being. For, seeking to satisfy the expectations of an authority when trying to express ourselves is what naturally leads to awkward behavior as well as limped diligence and creativity in the long run. Yet, by preserving the attitude of partial independence of both others and ourselves, we have a chance to sustain the creative impulses from which brilliantly inspiring acts originate, which is, by the way, why successful leaders could be recognized by their striving to balance the drives for independence and for collaboration within each segment of the systems they manage⁸⁰. Naturally, when one such balance is integrated internally within an organization, its products will spontaneously guide their users towards assimilation of the same balance within themselves too. In other words, goods will be given to people, but they will be also taught the art of fishing instead of being just handed out the fish we have caught to, the amount that may last for a few meals only. Economic analysts could remind us that with such a balanced approach we foster sustained social welfare instead of passive servitude; likewise, spiritual harmony emanates from any other aspect of social being into which we manage to infuse this balance between autonomously digging impulses for creative action from the core of the self on one side and engaging the river of our heart into a ceaseless empathic confluence with those of creatures that surround us on another.

Everybody is, more or less, aware of how businesses that strive to provide their customers with only what they want end up selling culturally and intellectually degrading, low-quality products. Company owners who decide to produce only 'what people demand', without any inner vision and desire to educate them and instigate to use more sustainable and intellectually progressive products, thus turn into passive and in long-term even noxious social factors. Social movements that literally 'reach out' to their communities with intentions to primarily satisfy and only then to edify them thus enter the waters of boredom and passivity, never producing truly progressive stimuli for the world, which, as we know, always induce a dose of confusion and tend to be rejected on a superficial basis by these very same communities. Sending out surveys to the community and then acting merely so as to satisfy each one of the listed desires and complaints, without ever considering the need to elevate the people's tastes and therefore their values by offering things that they may repel at first but which would in the end prove to be essential for their growth has never been shown as a prolific approach. Scientists that present their results by wishing to satisfy merely their funders and other authorities, disregarding any connections with the wells of inspiration and beauty residing within their own minds, thus end up suffocating the romantic charm of scientific endeavor and become inert and uninspiring slaves of other people's aims and opinions. Instead of passionately searching for 'truth' through the genuine dialogue between human mind and Nature that all sciences represent, scientific activities thereby begin to

resemble any other inertly conducted business wherein the creative forces are being subdued to the demands of other people. Created on the wings of a wish to appeal to the populace, arts similarly transform to mainstream movements of little artistic value and, as such, luckily, do not stand impressed for a very long time in the collective mind of humanity. To avoid these risks, we need to humbly respect our tradition, but also always carefully listen to the voice of our own heart. In other words, our deeds ought to have benefiting other people and humanity as a whole as their aims, although a reference to the bottom of our mind and heart, which tells us how truly successful in fulfilling our divine mission on Earth we are, should never be lost.

It is true that one is not able to provide a high-quality customer care without hopping onto the other side, merging with the customers' viewpoints, understanding the world from their eyes and conceiving products and services that would be in concert with their wants and needs. However, without instilling streams of originality into the products delivered to the world, streams that would be in partial conflict with the clients' cravings, our attempts to make this world a better place would, sooner or later, fail. Still, because truly progressive ideas are usually disconnected from the immediate and shortsighted needs of the populace, profitability and marketability can be seen as disproportionate to the true ingenuity of the marketed ideas. For the very same reason, the neoliberal, free market premises of the western economies could be blamed for fostering mediocrity of marketable ideas and favoring incremental, paradigm-building schemes over groundbreaking, paradigm-shifting ones. For, when one's elementary survivability is conditioned by one's appeal to the masses, as is the case in the neoliberal economic systems, one is prone to sacrifice the search for far-reaching innovativeness to the provision of mediocre ideas for the mediocre median member of the public. This is in direct contrast with the impetus for either indolence or the derivation and deliverance of extraordinarily creative ideas in a socialist system wherein stable professional positions are guaranteed for everyone, unconditioned upon the liking of the products of one's work by the general populace. Although no one can dispute the disastrous effects of any form of elitist totalitarianism on the creativity of human spirits, letting the median demand on the market be the key determinant of the direction in which the creativity of the suppliers is to be invested presents another extreme, although historically less harmful, as some may notice. What I claim, therefore, is that there always needs to be a dose of inner innovation instilled through a gentle aristocratic approach by which at least the rules of the game in which the users will come to participate would be set forth so as to inconspicuously promote fosterage of benevolent values in the participants. Speaking of 'the rules of the game', I recall that from Jean Renoir's cinematic classic that bears the same name to Claude Chabrol's *La Cérémonie*, depiction of the manner in which the simpletons given the right to steer the wheel of the ships of society inadvertently sink them against the ridges of mind-boggling irrationalities while inducing plummeting of sensible Andrés, the artistic spirits who spend time soaring from one cloud of sublime thought to another, has been a pervasive theme of many French movies and other narrative artistic forms originating from this part of the globe, presumably owing to the deeply rooted cultural reference to the way in which the aristocracy, a large portion of which was not guilty for the avarices of the high society to which they were born, had been guillotined by the unforgiving peasants, savagely blinded by their hate for riches, demonstrating along the way how communist insistence on equality for all is as inherently toxic as its opposite extreme of a ruthless capitalistic milieu wherein the rich become richer and the poor become poorer with every new day. Putting down straightforwardly each exhibition of aristocratic peculiarity by insisting that we are all the same, comrades or bros on equal footing, is thus as intrinsically baneful as coldheartedly letting spirits distance from one another, each in their own unique aristocracies, like galaxies torn apart and producing a sense of vacuous sterility in the air. In other words, aristocratic imposition of opinions and beliefs onto others, as soft and sensible as it ideally should be, naturally complements the anarchic

attitude of perpetual fosterage of freedoms. Or, as put forth by Andy Warhol, ‘an artist is someone who produces things that people do not need to have but that he - for some reason - thinks it would be a good idea to give them’. The graphic designer, Alan Fletcher, similarly noticed that ‘the aim is not to give the client what he thinks he wants, but what he never even dreamt he wanted’⁸¹. Having realized how listening to one’s own heart rather than being an insipid conformist that passively complies with the norms of the majority has a whole lot of positive implications on the expressional outbursts of our creativity, Malcolm Gladwell spent his entire fifteen minutes of fame on the lecture podium⁸² telling the world of a certain psychophysicist who became rich by advising pasta sauce makers to begin selling chunky sauces that consumers had never asked for because, firstly, they had had no idea that they had existed and, secondly, they had not known that they would have liked them as much as they eventually did. This is irresistibly reminiscent of the case of a perfume production company that was horrified at first to discover that theirs was the most popular brand among the low-budget portion of the market. Then, its executives found out that the bulk of their lower-class consumers did not like jazz. As a lucid solution, they decided to start playing exclusively jazz music in their televised and radio advertisements, thus boldly placing Joseph Addison’s wicked old adage that ‘the Taste is not to conform to the Art, but the Art to the Taste’⁸³ up on its head. What sits deeply grooved inside the inventive brains behind these initiatives must have been the recognition of the infection with the virus of awkward adulteration and inspirational sterility that the substitution of the guiding voice of one’s heart with those of the actual peers, the populace and the authorities causes in practically any domain of human creativity.

Another key example in favor of this element of intrinsic aristocracy that endows the most sublime creative approaches comes from the musical criticism. Has anyone noticed how ‘the best of...’ lists made by the general audience seem trifling compared to those compiled by the experts, whatever that word really meant? A decent example comes from the Mojo magazine readers’ response to the list of 100 greatest albums compiled by the critics in August 1995 and the substitution of the Beach Boys’ Pet Sounds with the Beatles’ Revolver on its No.1 position. Moreover, while Thom Yorke selected How to Disappear Completely as his favorite Radiohead song, the fans of the band voted Just as their favorite⁸⁴, and for those familiar with the opuses of this band, the context of this discussion makes any comment to this observation needless. Listeners digging Satisfaction more than Shine a Light or Prodigal Son in the oeuvre of the Rolling Stones, Under Pressure more than Word on a Wing in the oeuvre of David Bowie, Gloria more than Madame George in the oeuvre of Van Morrison, Penny Lane more than Here, There and Everywhere among Paul McCartney’s songs, Dylan’s All Along the Watchtower more than Long Hot Summer Night among songs on Jimi Hendrix’s Electric Ladyland, When Love Breaks Down more than any other song on Steve McQueen, the landmark record by Prefab Sprout, Usamljeni Hašišar more than Zimovanje among songs on the LP debut by the Belgrade band, Darkwood Dub, Just more than Black Star on the Bends, the first great record by Radiohead, Bitter Sweet Symphony more than Velvet Morning among songs on the Verve’s record Urban Hymns, Orange Crush more than Hairshirt and Everybody Hurts more than Nightswimming among songs on R.E.M.’s records Green and Automatic for the People, respectively, Wonderwall rather than Don’t Go Away among songs by the Britpop band, Oasis, Song 2 more than the Universal, Best Days or, god forbid, Battery in Your Leg among songs by another key Britpop band, Blur, present other examples falling off the top of my head. For this reason, it has not unheard of that musicians completely abandon playing some of their shallow hits live, having become aware that what is liked most by audiences is never truly the best from their oeuvres. In fact, in a world where upon learning that Kim Kardashian is the most googled person on Earth⁸⁵ intellectuals naturally begin to wonder if all they do is float in a secluded bubble in the sea of shallowness and if retreating into a cave would be a sensible choice, there should be no room for surprises whenever the lists of favorite things compiled by the populace drastically deviate

from those created by the critics, just as it should not astound us when we learn that individual grandmasters almost always defeat the World in terms of tens of thousands of chess players democratically voting for each move in real time. It is as if opinions of the critic with a sophisticated taste will always go against the mainstream of perceiving and understanding a given art, making him predestined to quietly stand aside at concerts and abhorrently watch the masses loudly and ecstatically show their appreciation of an artist on the stage while, as a rule, choosing not the best but the most catchy riffs to raise their thumbs up to. In such a way, it seems right when one observes that ‘most critics usually disagree completely with the public; every critic, even the most mainstream hack, thinks of himself as a ‘rebel’’⁸⁶. Still, it would be nonsensical to even try thinking of making a perfectly objective compilation of this kind. The only truly satisfying choice of ours would be inter-subjective: a middle ground between an objective quality and subjective taste. Should our mind become overshadowed by the wish to draw a perfectly neutral chart, the threads that connect the meaning of the music with our own heart and make it tell us stories that remind us of the paths and missions of our being in the world would get all ruptured. But should we become preoccupied with satisfying only our own musical and emotional thirsts, the lists we compile could easily become too personal and thus turn out to lack an objective character that is required to enable their effective and affectionate sharing with others. The same is, of course, with any other product of perception of ours and the sense of quality that it awakens. It always has to lie at the boundary between subjective and objective - where it naturally belongs – in order to be simultaneously meaningful for ourselves and others, thereby placing our opinions, thoughts and actions along the threads that connect our heart and mind with those of others. The latter is the vital precondition for our exhibiting the art of the Way of Love.

This miniature triptych about the corruptive effects on creativity whenever the popular taste is allowed to be its guide is here to remind us of the rather problematic divorce between the artist *bona fide* and the society, which happened in parallel with the popularization of arts in the early Industrial Age. Namely, as true artists became increasingly aware of the superficiality of the popular taste, so did they become distrustful about the public opinion and start to withdraw from the society, creating chasms in their psyches, which have to this very day fed the creativity of some, but have disoriented and destroyed far more. For, when the passion of a devout artist is to create something that will enlighten the fellow humans, who, on the other hand, cannot be trusted because of their shallowness, then the wonder about the purpose of the creative work becomes constantly lit inside her head, providing perpetual mood swings between the moments of exaltation and the moments of depression, which are challenging to live through.

At the same time, these examples demonstrate that the democratic appreciation of the opinions of others, majoritarian in essence, and an aristocratic reliance on opinions established at the graceful depths of our mind ought to go together, holding each other in an endless stream of references to each other. This golden mean strikes in accord with Plato’s three and a half millennia old reference to ‘a mean between monarchy and democracy’ as an ideal way of governing a society⁸⁷. In the Republic, Socrates demonstrates that this ideal mean, a.k.a. aristocracy, i.e., the government of the noble, incorruptible and visionary elite, left to evolve on its own, tends to transform first to ignoble timocracy once the pliant conformist followers take over and then to oligarchy once the wealthy buy out the corruptible timocrats and start to segregate, often from the shadow, as the ruling class, then to democracy when the commoners’ backlash takes place against the power of the wealth, bringing forth the state of mediocracy, and then, finally, to none other but monarchic tyranny because of the susceptibility of the inherently weak, democratic society to be manipulated by powerful personas. Hence, not only does democracy present a shifty bridge between oligarchy and tyranny in this earliest and most influential politically philosophical study ever written, but it also brings about a social state that favors mediocrity

instead of elitism. As significantly as it can get, Plato ensures to draw a parallel between the city and a single mortal and point out that all the transitions outlined here are applicable to explaining the evolution of the states of mind within a single person, giving democracy an equal, if not a more dangerous connotation. The recent social experiment in giving people more or less equal opportunities to express themselves through social networking platforms has only reiterated this propensity of democracy to settle in a state of mediocrity and permit quantity, so to speak, to prevail over quality, as can be evidenced from the fact that never in the history of media have the popular science and art communication channels been flooded with as much low-quality stuff as today. In parallel, this global experiment has demonstrated with crystal clarity that quality is secondary to the marketing campaigns when it comes to determining which human products would receive a mass audience and which would not, which itself is a trend that reinforces the power of big businesses, quite in contrast to the democratic premises that underlay this experiment. In one of his witty meta-movies, *Crimes and Misdemeanors*, Woody Allen thus remarked that ‘deadening the sensibility of the Great Democracy’ was the ultimate purpose of his artistic endeavors, coinciding with the message uttered by Alexander Hamilton, whose statue I watched daily from the 32nd floor of my Chicago abode amidst the clouds for years, as he called for the ratification of the US Constitution at a speech in 1778: ‘It has been observed that a pure democracy if it were practicable would be the most perfect government. Experience has proved that no position is more false than this. The ancient democracies in which the people themselves deliberated never possessed one good feature of government. Their very character was tyranny; their figure deformity’. For, while despotic regimes punish individuals for not following the royal orders, in democracy they are ostracized just as tyrannically and cruelly for not galloping and gazing, let alone mooing, in the same direction as the herd. It is for this reason that Winston Churchill lucidly reiterated Alexander Hamilton’s point of view 170 years later by saying that ‘democracy is the worst form of government, except for all those other forms that have been tried from time to time’⁸⁸, inspiring us to always look for the subtle and sophisticated ways to infuse aristocratic opinions and values into the democratic bases of a given social milieu, lest demagogues, who take advantage of appealing to the lowest common denominator in a democratic population, spread their influence, become the loudest voices in the society and begin to lead it toward the abysses of mediocrity. Only through such a niche would we be able to support the growth of the aristocratic beauty of a philosophy that quietly dwells within the inner landscapes of our self, and yet spreads its inner knowledge outwards, finding fruitful reflections in the social domain. Should we start valuing the opinions of others more than our own, the balance of the Way of Love would be disrupted in favor of an increased appreciation of others, thereby neglecting the importance of listening to the voice of our own mind and heart. On the other hand, should we begin ignorantly disregarding the opinions of others in our solitary explorations of the world, we would never be able to find the ways to give others the songs that reverberate within our self. In the long run, such an attitude would shatter the puzzles of meaning of the very life in our heart and mind. This is when the sun drops its rays on democracy as a noble concept, the closest one could arrive to the philosophy of anarchy that I have advocated over the decades, for in it lies the path to the humbling of an aristocratic ego and the acceptance of mediocritized social states of affairs for the benefit of a greater good, which may manifest itself in a longest run conceivable, far beyond the farthest horizons beyond which we could glimpse. In short, to distribute one’s focus from oneself alone to oneself and another alike is to break up from the slavery to one’s visions, regardless of how noble and progressive they are relative to the commoners’, and go with the flow of collective consciousness, a ride that will yield endless unexpected discoveries and surprises to a spirit on the quest for enlightenment.

Hence, the only way to continually enrich the emotional, intellectual and spiritual depths of our being is to engage ourselves in faithful and trustful interactions with others. But in order to keep on

enriching the lives of others by our actions, we need to carefully cultivate the aristocratic sanity and aesthetics arising from our inner shrines of thought and feeling, always slightly distant and yet incessantly open in relation to the world around. Our heart should be like a mysterious temple that has a life of its own, but whose doors are always open for others to enter. Thus, aristocracy and democracy are carefully balanced on the Way of Love, all with the purpose of initiating sustained enlightenment of the world with our actions and thoughts, and *vice versa*.

Another example could be given in connection with the art of musical composition and performance. Have you ever noticed how all the successful and original artists who initiate new waves in artistic expression and experience are never simply mirrors of their audience? Though they do somewhat mirror people that they communicate with, they mainly strive to make their audiences the mirrors of their own inner worlds. A music critic thus once mused on a class of composers who ‘lack a language of their own’ and concluded that exactly because of that, they fail to ‘speak to many’⁸⁹. In other words, the deeper we plunge into the creative core of our being and deliver our actions in accord with genuinely soulful impulses derived from it, the more we will speak the language that miraculously touches the surrounding souls, provided our mindful attention is anchored to the bottom of the ocean of our spirit at all times, while the strings along which these brilliant impulses are sent outwardly extend all the way to nearby eyes that orbit in amazement amidst their drowning in swirls of stars drawn in them. This, of course, reflects the balance between a compassionate conformism and an original and unique pursuance of an inner mission of one’s heart, which is inherent to the co-creational thesis and the Way of Love. Should we lose our innate sense of compassion that makes us spontaneously awaken the emotions and worldviews expressed by others within ourselves, the subtle harmonies streaming within our being would be disrupted, as much as they would be upset should this empathy overcast our sense of independent judgment and sanity residing in this inner silence distant from the world around.

It is also an old business rule that says that if an employer compensates a worker for his services more than he actually deserved, laziness and unreliability would creep into his future endeavors, whereas paying him less than what he deserved would induce dissatisfaction and indignation, eventually producing similar effects on his work ethics and performance. From this point of view, the words of Nietzsche’s Zarathustra become clear: ‘Our faith in others betrayeth wherein we would fain have faith in ourselves. Our longing for a friend is our betrayer. And often with our love we want merely to overleap envy. And often we attack and make ourselves enemies, to conceal that we are vulnerable... One ought still to honour the enemy in one’s friend. Canst thou go nigh unto thy friend, and not go over to him? In one’s friend one shall have one’s best enemy. Thou shalt be closest unto him with thy heart when thou withstandest him. Art thou a slave? Then thou canst not be a friend. Art thou a tyrant? Then thou canst not have friends’⁹⁰. Thus, as the blind spot effect, which will be elaborated later in the text, teaches us, trying our best to be too much of a friend can be, in fact, detrimental for a truly fulfilling friendship. Hence, I sometimes astound people saying that I have come to make brothers enemies and to make enemies brothers, but only to the point when they realize that it was merely a striking way of emphasizing the balance between the detached individuality and the compassionate communality that the Way of Love speaks in favor of. Whether we lose our sense of self-responsibility and cut the cords through which the reference to an inner core of our creativity is being maintained by overly longing to satisfy the needs of others, or forget to cultivate the compassionate music in our hearts for the sake of enlightening ourselves only, we would end up staying away from the state of real harmony. Metaphorically saying, ‘every friend an enemy and every enemy a friend’ may thus be one of potential aphorisms stemming from the co-creational thesis. For, balancing dialectical confrontations and empathic unisons is the key to the mutual progress of ourselves and others in our daily communications.

Thus, whenever we realize that we have become too much of a ‘friend’ in the sense of shrouding the sanity brought about by anchoring our attention to the deepest seabed of our being with the light shone by nearby spirits, doing it all to leave a good impression on them, we should step a bit away, regardless of how irrational or unethical it may seem. Because by doing so, we are doing a benefit both to our self and to others. Namely, by replacing a part of this active attention of ours towards others with the attention towards our self, we increase the creativity that can come radiating from the essence of our heart, and thus the probability that these blessings will fall upon others. Had we not done so, both our self and others would be deprived of the fruits of our inner creativity. For, what the balance of the Way of Love teaches us is that exhibiting too much love for others may suffocate them and stifle the shine of this divinest of all qualities from their insides. Namely, one hemisphere of the celestial ball of our consciousness has to be occupied by our own landscapes of feeling and thought, while the other one is to offer a starry space to be filled by the surrounding souls’ affairs. In such a way we leave enough room for the neighboring persons to grow internally, while at the same time we make them capable of sensing mysterious inner powers that radiate from within ourselves, powers that are the true sources of creativity evocable in our relationships with others.

On the other hand, some people claim that they are moved by being too much of an ‘enemy’, exhibiting negativity towards others in order to suppress and transcend the feelings of awkwardness that an overly ‘friendly’ attitude based on trust and faith in others brings about. This seems to be their way of overcoming that helpless sense of inertness that the compassionate reflection of surrounding people’s attributes implies. Attitudes like this are predominantly present in the developed societies of the Western world where the qualities of freedom are frequently valued more than the qualities of love. Though it has always reminded me of attempts to build a house of windows without making solid foundations for it. That is why I always repeat: there cannot be freedom without love; there cannot be movement without stillness; and we cannot be liberated unless we become fully dedicated with our whole being to bring good to others. So, cultivating self-oriented and hostile attitudes in order to attain the ideals of freedom cannot be said to present the right way. As ever before, the middle Way is what we should seek to attain.

Paying attention to one’s own needs and inner paths only sooner or later proves as a wrong way. Because every path of one’s heart leads through the hearts of others, just as a river meets many other rivers and streams on its way to the sea. Thus, instead of following the desolate trail that leads us to become solipsistic sadists and treat others as if they were only puppets attached to the strings of our ego, through pursuing the balancing art of the Way of Love we may have the opportunity not to discard either the relevance of the guiding voices that deeply resonate within our being or the satisfaction and meaningfulness arising out of our social engagements. In such a way we could practice balancing the art of fruitful dialectical confrontations with the art of peaceful and loving conformations, which, in a broader sense, might end up providing a tiny impetus in favor of finding the compromise between competitive and socialist political modes of social organizations, alone typically mirrored in extensive individualism and selfishness in the former ones, and dull, passive and uninspiring behavior in the latter.

Thereupon we could avoid being a passive listener who readily agrees with everything people around him say, but also avoid behaving like those who are ready to pertinently, for hours convince the audience at conferences in the immaculateness of their theories that supposedly explain everything. The economic crisis that has gripped the globe towards the end of the 2000s has been caused by one such disparity between the capacity to create and the purchasing potential of the consumers, with the former outstripping the latter, quite neatly reflecting the state of affairs in the world today, wherein the majority of people are busy expressing themselves by various means without ever finding time to lean their hearts onto those beating next to them and become one therewith, in humble and unpretentious empathy. In Daniel Callahan’s low-budget movie, *Come on in*, the protagonist explains that he quit rapping because

the rap scene is ‘like a big ass hall full of people yelling, trying to get heard, the problem being that with everybody’s yelling, can’t nobody hear it’, and this description could apply to virtually every social and professional domain two decades into the turn of the 20th century. This is why I hold that the world today needs characters such as Michael Ende’s Momo, the girl who had but one extraordinary skill, that of listening deeply with her heart, more than ever. This is also why my heart leaped with excitement when I passed by an internet graffiti, saying how ‘to be kind is more important than to be right, as what people need many times is not a brilliant mind that speaks but a special heart that listens’, for in it I saw a recipe on how to regain the existential harmony on a number of its levels. That to receive with kindness rather than to cordially give is the solution for rebalancing the lost equilibrium of our civilization in multiple of its aspects has, of course, not occurred to many social analysts and trendsetters, let alone poets, the traditional saviors of societies fallen from grace. Yet, to give and to receive is a balance on which our sustenance on this planet depends as much it does on the one between inhaling and exhaling. Exactly one such balance between (a) inwardness through which we absorb the external impressions and endow them with illuminating nuances, and (b) extroversion through which we express our insides in enlightening manners, is being embraced by the conceptual arms of the Way of Love.

Like a skillful soccer player, we have to listen to our innate intuition, rely on the learned technique, keep next to the flame of aspirations burning within, and yet precisely watch for the actions and intentions of the opposing players. A constantly aware feedback interaction between the two has to be attained in order for the player’s dribbling tricks to succeed and his winning desires to be fulfilled. Also, a skillful player simultaneously controls the ball well and keeps his eye on the position of other players on the field. Should he become solely preoccupied with the movements of himself, his ability to make a good pass would be diminished, and if he only looks after where the others are, his art of precise handling and delivering the ball would be similarly distorted. If you have ever watched inexperienced soccer players, you could have noticed how they either keep the ball for too long in possession, preoccupied with their own individual skills, or tend to get rid of it too quickly, thereby making a mistake, because of being overly focused on the positions of other players and neglecting the need to composedly control the ball. And the same balance between keeping one eye on the coordination of the team as a whole and the other one on the art of handling the ball of individual players applies to all good coaches and keen critics of the soccer game.

Just like a winning soccer team gets to be composed of strong individuals that cooperatively interact building a team spirit that is more and beyond a mere sum of the qualities of individual players, the same is with every other social group in life. There needs to be a permanent desire in each one of us to edify ourselves from the inside, and thereby become original and unique in the way we act and see the world. But one should equally be incessantly devoted to weaving the threads that in peacefulness, togetherness and fruitfulness link the surrounding beings. Thus, whenever it starts to seem as if the spirit of inner withdrawnness and solitude is about to prevail over the spirit of blithesome communion, whenever we realize that desolate longings and staring in the distance or immersion into one’s own heart have taken place for too long, we can know that it is time to make a move towards enriching the playful interactions between us and others and make the threads that link various creatures around us vibrate with blissful joy. Or, when we feel as if the relaxing and rejuvenating play with others is about to start diminishing our inner creative potentials, we ought to withdraw ourselves slightly from the cheerful gatherings around us and spend spiritually reviving moments while being deeply immersed within our self. The most beautiful parties are thus the ones in which everyone seems open and welcoming to others, but this partial inner withdrawnness supplies their glances and actions with an impeccable grace. Everyone walking along the Way of Love is not only oriented inward and outward at the same time, but

is working hard, mentally, emotionally and physically, with all her creative charms, to beautify and enliven with spirit these insides and outsides alike.

‘I hear voices telling me what to do. They come from God’, Joan of Arc says in the Bernard Shaw’s play. ‘They come from your imagination’, uninterestingly replies the inquisitor, but Joan continues by saying: ‘Of course, that is how the calls from God and His messages come to us’⁹¹. On one hand, it is essential to develop the ability to meditatively plunge deep into oneself and, through prayer, converse with inner voices about what our mission on Earth is and how far or close we are to accomplishing it. But, on the other hand, we also need to look for the signs and meanings in the world around us, replacing some of the referential sources for our decisions in life from our own heart and mind to those of other beings of the world. Unless we find this compromise between inwardly listening to our own heart and living for the sake of enlightening others, we would end up either in a solipsistic state of mind with the ruptured contact with the reality or in the state of passive compliance and surrender to opinions and guiding principles set by others.

The Way of Love, thus, on one hand teaches us to regard the inner voice of our own being as a central subjective frame of reference for our decisions in the world. But in equal measure it tells us to treat the surrounding beings as the very same subjects as ourselves, as in accordance with the Christ’s second commandment (Mark 12:31) and Kant’s categorical imperative⁹². Let the latter, objective side prevail and we would become permeated with inert behavioral streams, guided 100 % by others and endlessly running to find a promised place in the world that would give us perfect satisfaction, independently of the settings of our mind and spirit. But let the former, subjective side prevail and we would end up treating others as mere worldly objects, subject to our own manipulative tendencies. In the spirit of somewhat passive Buddhist religious attitudes, we would erroneously make ascertain that the only path towards the improvement of the world that we can pursue is the one stretched deep within our heads.

A Buddhist story neatly illustrates this extreme subjectivist attitude. In conclusion, it suggests that the crucial place onto which our focus regarding the change and the improvement of our complete experiential reality should be oriented is not the world around us, but our self. In the story, a barefooted Buddhist monk walked. And as he walked, he gradually realized that the terrain below was becoming ridged and hurtful to his bare feet. So he started thinking how to solve this unpleasant situation, and came to a couple of choices. Accordingly, he could either layer the whole road upon which he walked with a smooth surface or he could simply make sandals for himself from that same smooth material. And he, as expected, ingeniously opted for the latter. Now, if we were to grasp this story as a profounder parable, a logical question that could be asked is whether as the result of the monk’s choice the world would become deprived of the same metaphoric enlightenment that the monk alone would become immersed into. Or, you may say that the world would recognize the monk’s invention and all of us would become implicitly invited to do the same and pursue the path of inner happiness, neglecting the importance of the change in the world. Now, I am convinced that there are people who passionately search, diligently work and, along the streams of uncertainties within their minds, place similarly enlightening signs onto the roads of this world. Ancient Yogis knew so when they said that the path to wisdom and fulfillment of our mission in life should not be the same for everyone and divided the route to enlightenment to different paths/schools, including Raja (Yoga of meditation, that is, of the pureness of the mind), Gyana (Yoga of wisdom and contemplation), Karma (Yoga of selfless and divinely devoted work), Bhakti (Yoga of love), and Hatha Yoga (Yoga of health), which are to be pursued based on the inner predispositions of the individual.

Still, by changing oneself, the world changes too, whereas any change introduced in the world automatically affects the spirits dwelling in it. Change introduced in the world as the result of the change

in our mental and emotional dispositions comes through a different perception of it as well as through its spontaneous modification by the different way of one's being. As for the former, the constructivist aspect of the co-creational is very specific when it tells us that by changing the essence of our being, the world that we experience changes as well, because we are the ones that are partly creating this world through creative perception. Notice, though, the emphasis on 'partly' here, as we are talking not about sole creation, but a co-creation. The objectivistic aspect of the co-creational thesis, therefore, teaches us that the world in the way that it is inevitably has an impact on who we are. The outer patterns of the world change our being, while the inner patterns of our being outline the world the way we see it in this closed feedback loop connecting the insides and the outsides, that is, mind and Nature.

The co-creational thesis, thereupon, tells us that mind draws Nature and Nature draws the mind, in every instance of their co-evolving existence. As a result, we always reflect the way Nature works in our thinking and in the way we see the world, whereas everything comprising our experience is also an invention of ourselves to some extent. This implies that we can recognize both the essence of our mind and heart and the divine foundations of Nature in every detail of the world around us. Therefore, whatever the natural landscape we enter, a sunlit meadow, a church or a room full of people, make sure that they enter ourselves at the same time, soaking the sponge of our spirit and ingraining long-lasting impressions within us. And if you want to verify that objectivity and subjectivity are intermingled in each one of our experiences, you can do the following exercise. Firstly, upon entering a scene, change the perspective and notice how the overall impression of our observations changes accordingly. If you stand in a church, notice how every different angle hides new impressions. Step a foot aside and look carefully at how the relative positions of frescoes, sculptures and other ornaments that fill the interior give rise to new metaphoric meanings. The same thing would happen if we were to travel across the Milky Way in a spaceship. What now seems as an organized constellation of stars from the Earth would dissipate, giving rise to thoroughly new constellations as we reach a distant point at the other side of the Galaxy. Wholly new shapes would then be discovered in the very same swarms of stars as those levitating over our heads as we speak. This dependence of the impressions of ours and of the way we see the world on the observational perspective is a strong evidence of the objectivistic nature of every experience of ours, which could further be strengthened by invoking the similarity of experiences between different beings. Alternatively, however, the shapes recognized in stellar constellations observed from this hypothetical other side of the Milky Way might just as well be the same as those that our ancestors saw in the starry skies above their heads and anyone familiar with Adelbert Ames' chairs made in the 1940s and nowadays decorating the San Francisco Exploratorium, demonstrating to its visitors that no matter how arranged a myriad of point sources of light before one sometimes is, one's perception always assembles them into an identical chair, would not be surprised at all if one such triumph of the subjective over the objective was about to happen. Still, the subjective aspect of experience is best seen by comparing the way the world seems to us when we are in the state of happy and healthy harmony and when we feel ill or depressed. Every flower and every sound, every human being we encounter and each piece of art that we come across will typically appear to us in synchrony with the way we feel: ominous and worthless if we are depressed or merry and shiny if we are happy. 'Nature always wears the colors of the spirit'⁹³, Emerson thus noticed in his essay Nature and on another occasion remarked another memorable phrase, 'The difference between landscape and landscape is small, but there is great difference in the beholders'⁹⁴, wishing to tell us that no two sceneries are ever the same, for not only are even the most similar observers always profoundly different from each other, but every subsequent perception of a scenery is different from any of the previous ones because with every blink of our eyes we change and continuously flow from one unique and irreproducible state of being to another. On the opposite side, that objective and realistic contexts of our observations co-define

the qualities that we will come to perceive may be supported by noticing how those very same flowers, sounds and pieces of art tend to appear more touching to us on a sunny day, when Nature herself illuminates them with sunlight, rather than on a cloudy and gloomy day. However, the middle Way of the co-creational thesis helps us overcome the potential slavery of our attitudes with respect to either the subjective predispositions of ours or the objective circumstances of the outer world, including the norms set by others, by always looking at the world from the tender harmony of the niche at which the radiance of the sunny spirit of ours meets the sunrays Nature poses in front of us to guide us on the way.

The active, passionate spiritualism borrowed from Christianity, burning with the celestial yearnings to express oneself in the divine light and cherish others with the gifts of love, and the attitude of inwardness, quietude and meditative preoccupation taken from Oriental theologies thus become blended in the emanations of the Way of Love. In that sense, we could be reminded of the timeless words of Saint Sava of Serbia, in his letter to Irenaeus from the 13th Century: ‘At first we were confused. The East thought we were the West, while the West considered us to be the East. Some of us misunderstood our place in the clash of streams, so they cried that we belong to neither side, and others insisted that we belong exclusively to one side or the other. But I tell you, we are doomed by fate to be the East in the West and the West in the East, to acknowledge only heavenly Jerusalem beyond us, and here on earth - no one’. All the fruitful and theologically enriched ways of thinking are nowadays predestined to stand at the boundaries between East and West, heaven and earth, metaphysics and physics, Nature and mind.

‘Let there be light: and there was vision’, can be said to present the objectivistic motto of Christianity and in particular of its Judaist theological roots. It is also the basic premise behind the classical theories of vision, according to which the only role our visual apparatuses have is to passively detect and directly represent the light patterns that fall on our retinas, without any internal modifications thereof. On the other side, as a counterbalance to these objectivistic assumptions regarding the origins of our eyesight, Heinz von Foerster’s exclamation, ‘Let there be vision: and there was light’⁹⁵, is positioned, as in sympathy with (a) the idealistic Oriental worldviews that have, in one way or the other, supported the belief that beauty lies in the eye of beholder, (b) hypnotists’ ability to rewire the brain and magicians’ talent to deceive via being aware that ‘not what one looks at, but what one sees’⁹⁶ hides the key to opening the door to the exhibitions of their manipulative arts, (c) the constructivist theories of perception according to which ‘your brain, encased in absolute blackness in the vault of your skull, is in the dark but your mind constructs light’⁹⁷, and (d) the concepts of vision that Plato and pre-classical Greeks held onto⁹⁸. The latter claimed that it is not light that falls onto eyes that produces images of the world, but *vice versa*: eye is the one that shines and illuminates objects of the world with its light. Etienne Condillac, who allegedly influenced the thought of Lavoisier, said once that ‘when we first see light, it is not so much that we see it, but rather we are the light itself’. And Daisetz Teitaro Suzuki in one of his lectures bravely exclaimed the following: ‘In the Bible, God said, ‘Let there be light’: and there was light. But who in the world was watching it? I watched it. I am the witness. Our minds have a potentiality to notice it. We are practicing them for this every moment’⁹⁹. In other words, the polar unity inherent in the co-creational thesis leads us to acknowledge that there is a light that falls into our eyes from the world itself, but there is also a mystical, inner light that eye shines to the world. Their co-creative intersection gives rise to all the visible features of the world as we know it.

This midway perspective brings us over to a sense of wonder enflamed in Empedocles, the Greek philosopher who imagined Aphrodite, the Greek goddess of beauty, to have lit fire in the human eye, enabling it to illuminate the world with its inner light. Namely, on one occasion, as he gazed at the stars, he asked himself how come the eye is able to momentarily cast light on such infinitely distant objects. This stargazing moment of insight prompted him to arrive at a new worldview wherein the colorful

reality was depicted as the product of an interaction between the rays of light originating from the human eye and the sunrays reaching the world from the Sun and other stars. Thereby, he subtly and yet profoundly touched the essence of the co-creational thesis. This line of thought became deepened when Aristotle recognized that the eye detects changes in the medium between itself and the viewed object rather than being passively influenced by the object alone. This prompted him to infer that senses must be self-aware to some extent¹⁰⁰, being the idea that echoed the constructivist view of perception two millennia before Immanuel Kant would propose the unknowable nature of things-in-themselves¹⁰¹ and take this view to even more empirical heights.

Once we learn to see everything through such a fundamental intersection of the subjective and the objective features of being, Plato's metaphor of people who lived in a cave and held that the real images of the world were but shadows dancing on the cave walls acquires a new meaning, too. For, for as long as we are closed in our preconceptions that correspond to either solipsistic or objectivistic worldviews, we see merely the murky reflections of our wrongly presupposed features of knowledge and being. But when we step out of this cave of ignorance, both our beings and the world spread out into beautiful horizons, letting their interplay cover ungraspably wide ranges. For, in the end it is eyes and the droplets of rain falling through a distant sunlight that together create a rainbow. The rainbow moves relative to both our eyes and the droplets impinged by sunlight, which is why it may present a perfect symbol of the co-creational thesis, shedding meaning on an artist's view of rainbow as 'a symbol of the alliance between God and humankind'¹⁰².

In fact, in its interaction with physical objects, light can be reflected, absorbed or passed through, and this triad of possible interactions can serve as a neat metaphor in describing both balanced and extreme attitudes appearing along the Way of Love, especially in the context of the proposed parallel between the rays of our attention and shining light in the world. Namely, our inclinations to adopt overly objectivistic attitudes may make us prone to have our attention simply reflected from the external features of the surrounding creatures and become panicky blinded by the light bouncing back to us while carrying merely information about the superficial features of theirs. On the other hand, overly solipsistic aptitudes may lead to the rays of our attention carelessly penetrating through others, as if they were inanimate dolls or heartless robots. Although many people nowadays enjoy living in such a transparent fashion, including all those singing along to Fujiya & Miyagi's 'I look through transparent things and I feel okay'¹⁰³ call, this attitude presents an unsustainable one in the long term. Sooner or later, the humane need to interact with others in all the depth and sincerity of our real nature will show up as imminent. In search of guidance, therefore, we could turn to Paul Nash's painting titled *Landscape from a Dream*, on the left side of which is a mirror and mirrored in it are a hawk, the symbol of the material world, staring at itself, solely preoccupied with reflection, and glossy levitating balls, the symbols of the souls, and on the right side of which is a transparent panel overlooking a coastal landscape. This surrealist image veritably portrays the state of mental equilibrium where the mind is part transparency, part reflectance, where it partly looks through things with a thousand-mile stare and is immersed in the dream of one's own, but partly it responds to stimuli cordially and candidly, albeit always wrapped in the clothes of mystery, like that of the missing viewer's reflection in the mirror painted in this memorable painting. Hence, the most optimal choice is the one of a middle Way, in this case corresponding to partial reflectance, partial transparency, but mainly absorption of light, and from there on scattering, exciting or merely warming up the bodies in contact with the light of our eyes. Hence, as we see, we should never underestimate the idea that our eyes with each tiny glance of theirs shine radiance of an immaculate light of spirit to the world.

The Way of Love through which our attention partly dwells deep inside of our own heart and mind and partly gets immersed in the traces of the surrounding world does not imply our incomplete

dedication in facing the fellow beings. It does not mean that we will appear distant and superficial in communication due to our partial meditative withdrawnness, but quite opposite. Namely, the only way to incessantly support our interest and focus in facing others and make our attention wiggle with charming vividness is to constantly replenish this polarity of our awareness. Such an inside/outside polarity is the one that provides a continuous drive for our lively interest and enthusiasm in interaction with others. Just like a light sensor follows the path of the radiated light, waits for its reflection from the measured object and detects it on the returning path, inspiring rays of our attention always need to be linked with the sources of their origins, that is, with the wondering depths of our mind and heart. An unbalanced preoccupation with either internal or external impressions at the cost of neglecting their complementarities inevitably produces a diminishing effect on our creative interests and attentiveness, primarily because this tiny thread that connects the source of our wondering with the outside world gets ruptured. Learning how to set a feedback synchrony between the creative awareness of our insides and outsides leads us to the mastery of the co-creation of our experiential worlds. And once these incessant fluctuations of our attention make our insides glow with the fire of love that inspires and sanctifies the creatures of the world, we may know that we have firmly set our cognitive bases upon the grounds of the Way of Love.

The Way of Love draws a thin line of balance, the awareness and careful following of which make us avoid many extreme imbalanced attitudes in life. Thus, we could overcome becoming in our interactions with others either like a rock singer that intoxicated carelessly flows in her own world, whereby the audience leaves the show dissatisfied, or like the one unable to sanely deliver the essence of her heart to others, constrained by the panicky worries about what the others will say. We could likewise avoid being either like a writer who is unable to express himself satisfyingly because of the constant need to conform to norms and opinions set by others, or like the one that finds a perverse satisfaction in writing in pompous manner and circumlocutory style, not thinking about how well the others will interpret these words. Thence, we should be sure that all our deeds in life, when done perfectly properly, could not leave us thoroughly satisfied. But this is not the reason to despair. Because, in the end, this mild lack of satisfaction is the one that presents the driving force in our strivings to act better and achieve more in our future attempts towards enlightening others. Thus, as the Way of Love teaches us, one part of our attention should always rest at the depths of our mind and heart, searching for the ways to illuminate our inner landscapes. But the other part of our awareness ought to be empathically tending to find synchrony with the heartbeats of the surrounding creatures.

The metaphor of the co-creative dialogue between mind and Nature is employed here to reflect the intermingling of our inner aspirations, wishes and tendencies on one side (i.e., mind) and the outer juxtaposition of the divinely projected path for the evolution of the world and the billions of starry wishes that humanity and the whole biosphere are composed of on another (i.e., Nature) in each detail of the world as we know it. In that sense, the Way of Love is all about placing ourselves in the middle, right between the inner mission of ourselves, outlined by what we may call God, and our dedicated servitude of others. Thus, as we stretch the imaginary arms of our angelic spirit, on one side we will touch the underlying divinity of Nature, whereas on the other side our hands will graciously grasp the merits of humanity. The Way of Love implies listening and following the Way of God, silently interwoven within the essence of our mind and heart, and at the same pursuing the path of limitless devotion of ourselves to others. However, just as having two leaders in a dance of couples produces unexpected results, the same can be said for the evolution of the world based on one such twisting and turning of human beings around two poles at the same time, being alternately dragged in one and then another direction. On one hand, this may seem to be a bit of a problem, as recognized by Rosemary Kriescher, who wrote to me in a letter through a song: ‘When I meditated on the word Guidance, I kept

seeing 'dance' at the end of the word. I remember reading that doing God's will is a lot like dancing. When two people try to lead, nothing feels right. The movement doesn't flow with the music, and everything is quite uncomfortable and jerky. When one person realizes that, and lets the other lead, both bodies begin to flow with the music'¹⁰⁴. On the other hand, however, having a pair of creative centers instead of one leader and one passive follower can produce conditions for an endlessly diverse evolution of the inherently dancey cognition and life. As we could have already recognized by now, static equilibria should not be the goal of this balancing act if we wish to provide conditions for an optimal evolution of humanity and the planet. Rather, dynamic balances in which the states of perfect balance spontaneously lead to imbalanced states, resulting in an endless shift of balances and imbalances, are the ones that present the underlying wheels of the parallel evolution of mind and Nature. Thence, our self starts to fluctuate around the center, alternately approaching and diverging to and from the side of God and the side of others, letting the divine music of life wash over the face of the planet. To get back to the words of Rosemary's song, 'My eyes drew back to the word Guidance. When I saw 'G': I thought of God, followed by 'u' and 'i'... God, you, and I dance'.

The Way of Love reminds us that the whole life is a bit like the famous San Francisco's Bay-to-Breakers race, the longest consecutively running footrace in the world. It starts at a sunlit bay coast and ends at the foggy ocean beach, symbolizing the human lifetime run from the safe, light and carefree childhood to an old-age immersion in the unity of all being. At every corner there is a party going on, inviting us to meet other people and stay for a while, resembling other rivers converging into the river of our being, making it richer and wider on its way to the sea. As such, it is considered as the race in which only losers strive to rapidly reach the finish line. They would be compared to rivers that never succeed in absorbing the precious waters of other rivers on their way to the sea and thus never let themselves become wide and solemn rivers upon which may many boats cruise and many creatures swim and dwell. But the losers would also be the ones that get stuck at a single party, overcast their divine mission in life with the earthly pleasures, become enchanted by others, and cease to advance forward. They would be comparable to stagnant puddles in which the waters stop streaming forward and become all muddy and filthy. The Way of Love teaches us how to find the balance between going along the line of our aims and being warmly susceptible and delivering sparks of inspiration to the surrounding creatures. It teaches us to attain the balance between living for the sake of enriching others and still having the divine mission of ours in our minds. Should we be running solely to win and thereby neglect the benevolent needs to astonishingly look at other people's eyes on the way and engage ourselves in a childish play with them, we would fall from the state of perfect balance. But the balance would be also lost should we get stuck along the way by being too much attracted to others and to the worldly pleasures they offer, thus never finishing the race at the Ocean shore. In the end, the real race run is not the one in which we try our best to beat others and reach the finish line first, but the one in which we turn back to help them, even though we would thereby lose the winning streak of ours. Lest we turn into a sentience devoid of spirit and a living thing devoid of life, a mere skeleton, as it were, like that cutting the red ribbon in Ron Whitacre's sculpture called Finish Line, which I came across in the Civic Center Park in Newport Beach one fine afternoon, sooner or later we must shun the winner in us and embrace that lovely loser, for the sake of saving the soul. That is the only way to eventually reach the miraculous seashores of our life, where timeless words of St. Paul the Apostle would await us: 'I have fought a good fight, I have finished my course, I have kept the faith' (Timothy II 4:7).

We have heard many times that it is important to be good to others as much as to be good to ourselves. And indeed, when the old age strikes, we could see how people who neglected their own intellectual and spiritual growth - not only because of their lack of talent or laziness, but also for the sake of being loyal, faithful and benevolent to others - lose their appeal and become ignored by the society.

One needs to look after maintaining a bright and enchanting glow of a winning heart of one's own lest one's words and advices be eventually blown in the wind, unappreciated and unabsorbed by others. On the other side, people who did not cultivate benevolence and charitable attitude to their fellow beings similarly remain without friendly minds in their vicinity. This is somewhat similar to what constitutes virtuous teachers and mentors. Namely, although some of them may indeed always be there to assist students in their endeavors, unless they devote time to edify their own knowledge, inner qualities and approach, despite all the desire to help, the incentives given will in the end prove to be vain and futile. The opposite extreme wherein one works solely for the sake of improving oneself, neglecting thereby the need to build the knowledge of others, is, however, equally disproportionate. The real balance, as the Way of Love suggests, lies in the dedication of our being towards improving ourselves and others at the same time. All our creative endeavors, thoughts and travels should be done for the sake of both living the divine, evolutionary and missionary path of our being and improving the whole wide world. Or as Martin Buber mentioned, 'I do, indeed, close my door at times and surrender myself to a book, but only because I can open the door again and see a human face looking at me'¹⁰⁵. A mysterious old man who stood in the elevator I entered on a gloomy fall day in Chicago concordantly mumbled, 'Doors open to me, but only with people at them', people who *are* the doors to a world whose greatness only our wildest imagination could glimpse, as I remember I retorted to his witty comment. And so, regardless of how deep I am immersed in my work, when the door opens and I get illuminated by a human face from behind it, I let the thoughts about work momentarily fly out of my head and stand all set for the direct communication of the two hearts.

The Way of Love is all about balancing enjoyment and satisfaction found in the moments of an absolute inner loneliness and of a loving and inspiring communion with others. Even more, it is pointing to the ways of intersection between the two. That is, finding the source of creative expressions in the pure silence within ourselves and sanely absorbing the impressions of the outer world straight to the essence of our mind and heart. It is about learning how to dance with ourselves throughout the seconds of desolateness and yet finding an immaculate source of happiness in dancing with others. Should we fall from this balance onto one side, we will find ourselves able to find satisfaction only when we feel perfectly lonely and completely deprived of the surrounding observers. But if we fall onto the other side, we will find ourselves entering the states of desperateness and unbearable boredom as soon as we stop feeling the presence of the surrounding creatures. As such, the Way of Love teaches us the balance between being immersed in our own inner world and living in accordance with the innate desire to act so as to bless and sanctify others.

The Way of Love teaches us how to live with a heart filled with a burning wish to save the world even in the midst of seeming solitariness, and yet to preserve the sane silence reverberating in our mind in the midst of a buzzing and cheerful company. It teaches us the miraculous art of finding ourselves through others, and also finding the meaning of that divine Buberian Thou in the depths of our heart. In the end, that is the key point of both true friendship and enlightened loneliness. Not to lose oneself the second we approach another soul and then to renounce in despair our place in the community and seek happiness in desolation, but to learn to see the sparkles of beauty of our own spirit in the eyes of others and yet to find the meaning and place of that holy Other at the pedestal of our hearts. Hence, I love to say that the real company should enlighten the path to our own soul as much as to the souls of others. It can lead you to know thyself as much as to show you the jolly charms of being a good friend. Therefore, every road probed and door tapped in our quietest contemplations always lead to the doorstep of a fellow human soul, whereas in the midst of even the most congenial and least self-centered communication with another, we are obliged to live up to Branko Miljković's precept if we wish not to become depleted of vital energies and retain the shininess of the sun of our spirit: 'All over, at every

place, I seek myself¹⁰⁶. A harmonious relationship is thus like a music that clears up the way forward, towards others, and yet lightens the path backward, towards the essence of one's own being.

An old Egyptian belief is that each soul after the departure from this world is greeted at the entrance of Heaven with two questions: 'Have you find joy in your life, and have you brought joy to the lives of others?' What we could immediately recognize is that these two questions possess inextricably related answers. For, how could have we brought joy into someone else's lives had we not found joy in our own? Or, how could have we found joy in our own life had we not brought joy into lives of others? And this is exactly what the Way of Love points to, in sympathy with the co-creational thesis upon whose foundations it is being built: sprinkling joy in the world seen from the eyes of another in an equal extent as we infuse the world seen from our own eyes with joy. Neither more nor less, for the beauty of the world seen from our eyes and the beauty of the world seen from the eyes of another are essentially interrelated, and the more we enkindle spiritual splendor within ourselves, the greater will be the need to shine to the world therewith, whereas the more we live for the sake of others, the clearer would be the way that leads towards reaching our own self-realization and settling with the caravan of our roaming thoughts in some permanent oases of true spiritual happiness.

The longest waves on the planet exist not in the places where we have one side of a natural balance subduing the other, but where two sides meet each other with an equal contribution. It is, in fact, at the place where Amazon River flows into Atlantic Ocean, and Atlantic Ocean simultaneously flows into the mouth of Amazon. A San Franciscan artist, David Park thus enjoyed painting 'couples consisting of unique individuals who are nonetheless mirrored and shaped by a partner through both separate and shared experiences'¹⁰⁷. For, being one with oneself and being one with others is clearly the secret of the Way of Love. Bowing down to the divine essence concealed within our self is the precondition for bowing with true respect and astonishment to others, and *vice versa*. This is the balance which, when attained, will whisper to us that 'love is on the way'. For, when we are truly good to ourselves and make an effort to enlighten our mind and heart with bright and loving thoughts and feelings, we are good to the whole world as well, whereas being gentle, careful and respectful to the people of the world and the planet itself naturally nourishes our mind and heart with peace and love. We could never become truly harmonious persons in terms of both our inner satisfaction and happiness and our outer expression and behavior until we start to live every moment of our lives for the sake of benefiting and beautifying the lives of others. Almost everyone has at least once entered a room full of people while being preoccupied with one's own appearance, desiring to look as neat, good-looking and attractive to others as possible. But in an approach like this there will always be something missing in that grace of ours that we dream to achieve unless we awake a genuine interest in how the world looks from the eyes of other beings, and make moving attempts to ornament these looks with heavenly notes and sparkles of care that radiate from our heart. We would never become truly strong until every bite of food we swallow, every step we make and every breath we take are seen and made with the thoughts of helping the whole world with the strength that is descending on us with them. But the opposite argument also holds true. It tells us that to succeed in the attempts to beautify the world with our creative powers we need to be careful and loving to our own being as well. This all leads us to see love and care for both ourselves and others as the tickets to the majestic route of the Way of Love.

To live a wonderful story of life is to be immersed in the adventure of finding the Way of Love. And finding it means reaching an ultimate balance in our worldly relationships: neither being overly egotistic and sonorous nor obsequious and servile. Neither being a passive duplicator of other people's attitudes, desires and ideas nor ignorantly and insensitively requesting everyone to comply with our own, but being at the same time originally and creatively responsive and empathically reflective. Being

simultaneously a source of quality and its faithful absorber, knowing that it is our aim to process and craft all the impressions of the world into beautiful values that we may then give freely to others.

Finally and perhaps most importantly, all this is to say that resting on this middle ground described on these pages under the name of the Way of Love does not only predispose us to naturally exhibit the divinest of all feelings, the sole purpose of our existence, and the one and only thing that the saintly souls have sought with every heartbeat of theirs: Love. In fact, awakening this holy feeling within us, being akin to a sunrise that suddenly illuminates an otherwise dark night of the soul, spontaneously sets our feet on this middle way between our deepest self and other selves and makes the most natural act in the world out of tiptoeing gracefully around the state of perfect intimacy, meditative and empathic, respectively, with both. The luminescent feelings of Love arisen in us are magical in a sense that they endow us with two diametrically opposite psychological momenta. While the shine of Love from the center of our heart anchors us to the core of our being and prevents our losing ourselves submissively in the face of veneered another, at the same time it pushes us outwardly, impelling us to draw acts that bring our heart into a blissful unity with the surrounding hearts. Love, as such, provides its gifted bearers with grace and gravity at the same time, dually, and, moreover, equilibrates the two antagonistic forces in us, the meditative one which works to cocoon and compact us into an introspective dot and the empathic one which works to dissipate us like stardust and leave but a puff of wind in our place. But with a balance of these two forces in us, we have a chance to fulfill the spiritual mission assigned to us at the moment of our conception in the belly of an angel and become a true star on Earth. Thus, in a way, as it is usually the case, in our strivings to incarnate divine being within our frail and earthly self, the mind offers a long and tortuous path to this sublime mountaintop that the Way of Love is, while the heart draws a magical path that parachutes us there faster than the blink of an eye. In the end, it matters little whether we begin our journey from tuning our mind or tuning our heart to this ultimate experiential harmony because sooner or later we would realize that tuning one tunes the other as well, as their destination is one and the same: the Way of Love, the holy grail of our existence.

The Little Prince and the Way of Love

Fortune cookie No.1: Cherished heart sings a song of its own

Fortune cookie No.2: The only way to have a friend is to be one

Panda Express, Parnassus Avenue, San Francisco, California, Oct. 31, 2007.

Fortune cookie No.3: Love is on the way

The Great Wall, Potsdam, NY, July 2006.

Many proponents of the constructivist philosophies enjoy seeing the world of their experience in an opposite fashion from the standard, objectivistic points of view. In the latter framework of thought, deeply settled within our culture, we tend to see the details of the world as objective and detached from ourselves. Our beings float in a world that is the same for everyone. However, from the constructivist point of view, the situation is thoroughly opposite. In it, one tends to see everything as entirely created by the subject being. Every perceptive moment arises like a majestic dawn straight from the essence of one's heart and mind. Both the features of the unanimated world and the traits of fellow beings are, from this perspective, created from within.

But a natural remark that poses itself at this point is what happens when two constructivist creatures find themselves facing each other. In essence, their solipsistic points of view become evidently unsustainable at that moment. This is why a Middle Way that would unite the principles of constructivist

philosophies and the premises of the paradigm of objective realism needs to be established. The thesis of the co-creation of experiential qualities does exactly that.

The allegory depicted in the *Little Prince*, the beautiful story penned by the French pilot, Antoine de Saint-Exupery¹⁰⁸, can be used to illustrate the essentiality of the constructivist/objectivistic balance as the point of origin for the presumably divinest way of being, a.k.a. the Way of Love. First of all, let us represent the Way of Love with the picturesque image of ‘meeting of the worlds’. From the constructivist point of view, each being creates one’s own world of experience. But if we yearn to be successful in implementing the Way of Love in our social relationships, we ought to be prepared to fall into worlds of others as much as to be determined and creative in drawing the essence of our own world around them, and freely invite them in. Neither should we be pulled inside more than outside nor the other way around if we crave to incarnate the Way of Love in our way of being.

Therefore, the aim is not to steadily sit on one’s own planet and work on its maintenance only, as the people on the planets that the *Little Prince* visits in the beginning of the story primarily do. They neither seem ready nor interested to meet other worlds and fall into their crevices, that is, to look and wonder at the world from the eyes of another. They appear deprived of compassion and empathy that would push them through and make them fly to some other cognitive planets of this miraculous world. The latter might be, in fact, depicted as a network of meetings of experiential worlds, which, upon touching each other, induce cross-fertilization and giving rise to ever more magnificent and enlightening impressions and experiences.

The *Little Prince*, however, is unlike these narrow-minded peeps. He travels on and leaps from planet to planet to see how the world looks from some other cognitive vistas. And, most important of all, in this marvelous journey, he never forgets his own home, a tiny asteroid with three volcanoes, one baobab tree and a lovely rose resting on it. Like children born to the Earth with an innate drive to constantly move back and forth between the safety and comfort of their parents’ snuggle and the adventurousness of their wondrous exploration of what lies out there, beyond the safe hands that harbor them, Saint-Exupery’s little hero is aware of the need to constantly refer to the home of his heart and a mysterious rose he had left on it and yet to endlessly seek and spread his spirit towards other planets in this Universe of starry souls. This is particularly neatly illustrated in his majestic saying that ‘stars look beautiful because of a flower one cannot see’.

By falling freely into the orbits of planets he comes across in the course of his interstellar ride, and then landing thereon to meet their lonely dwellers with an equal grace, the *Little Prince*, it is important to note, evades the traps of sole constructivism. Namely, when he could be sharing the lamentation of a sensitive and despondent worldly soul who walks across the city streets with love and care illuminating his heart, yet knowing that no one recognizes this inner glow, for all they see in him, like forest animals, are reflections of their own motives and sentiments, from dread to rancor to vapidness to voracity, he decides to jump off the cliffs of safety of his own world and into the fields of gravity of planets unknown to him, so as to cast off the shackles of sole constructivism, that is, constructivism unbalanced by its objectivistic antipode in a state a.k.a. the Way of Love. This is where the leap of the *Little Prince*’s comes forth as essential to be made, lest one remain confined in the scopes of animalistic cognition, never seeing anything other than the glimpses of one’s own feelings and thoughts in others, predisposed never to evolve into an angelical demigod out of a frail human that one is, a human that is merely, as Friedrich Nietzsche observed, ‘a rope stretched between the animal and the Superman, a rope over an abyss’¹⁰⁹.

Be that as it may, after visiting many planets, the *Little Prince* lands on Earth and, there, lo, he finally finds someone interested in his own world. The space for mutual reflections thus opens, leading to the rise of Love. Eventually, as the story comes to an end, the *Little Prince* sets on the voyage back to

his asteroid, the home of his heart, to make sure that the baobab does not choke his beloved rose with its viciously spreading roots. Thus he lets us know that not only is jumping bravely into other people's shoes and sympathizing with them an essential part of every truly fulfilling and inspirational way of being, but tending one's own heart in every relationship is necessary too, lest the baobabs that spread following our negligence of these inner, introspective pathways overgrow the divine essence of our heart, from which the power of love shines forth. With his rise back to his planet, he also signifies the essence of every Way of Love: an unending dance between approaching and distancing, uniting and breaking away. For, this is what the symbolism of the Way essentially stands for: simultaneous unison and division. Preserving it within every aspect of our existence is to truly live the Way of Love.

Sadism and masochism as extreme deviations from the Path of Love

‘The man of virtuous soul commands not, nor obeys’
Percy Bysshe Shelley

Sadism and masochism are psychotherapeutic concepts colloquially used to describe some of the common personality disorders. Ultimately, whereas sadism is associated with psychological tendencies to value oneself more than others and, thereupon, treat people in an oppressive manner, masochism relates to tendencies to engage oneself into relationships of passive servitude with respect to others.

However, a more crucial argument is seldom observed. It is that sadistic and masochistic traits of any given person are existent in different aspects of his personality and at different levels of his interaction with the society, as the result of which they usually compensate each other. Hence, should we notice a creature whose acts are obviously manipulative, we should be sure that this creature is also being manipulated with on another plane, and *vice versa*. Authoritative personalities, thus, as a rule, demand obedience of their own commanding stances, but are simultaneously subservient before those whom they consider to be an authority for themselves. Famous oppressive leaders who were either the ‘captives’ of their loved ones or the slaves of historic traditions are typical examples of this psychological effect that dictates subjection to control of all those who wish to be in control. Erich Fromm thus recognized that Adolf Hitler, the epitome of a tyrant, was a soul helplessly subdued to the ideology of Lebensraum, that is, of a historic, expansionist destiny he envisioned for German people¹¹⁰, while Slavoj Žižek included Joseph Stalin under the same hat by recognizing his own similar subjugation to ‘the necessity of historical progress towards communism’¹¹¹, in both cases signifying the necessity for the enslavement of an autocrat before his enslaving others can take hold. Bosses who are driven to repress their subordinates because they, themselves, feel suppressed by their own supervisors may present another routine example, complying well with the Serbian proverb saying that ‘nothing instigates the weak one to serve the stronger one amenably but his will and urge to be a master to an even weaker one’, a saying that would be equally true had its cause and effect swapped places. Then, people who tend to oppress others at work and be offensive to their neighbors on the street are often submissive at home, in their family circles. When I was thirteen years old, my middle school psychologist, who happened to have been the granddaughter of the Serbian Patriarch Pavle, singled me out as the most curious phenomenon, a smart and cute rebel as I was, among thousands of my schoolmates and, after having me subjected to a rigorous psychological study, realized that acceptance by specific social circles was my most important goal in life and that my delinquency arose solely from it, bringing to mind a plethora of accomplished artists, including Gustav Mahler, who craved to be loved and accepted by the world that they secretly despised because of its backwardness and strived to transcend with their work, having thus being predestined to carry an unsettling chasm inside their minds for as long as they lived. And that my notorious antiauthoritarianism actually has a root in submission to

the authority of fellow humans, if not of a divine voice resonating through my fancy, that is, of people I have loved, of those poor, unprivileged and weak earthlings whom I strive to 'make heroes' with all my heart, comes to me as a surprise, a magnificent plot twist, to this very day. Radical dissensions and nonconformities against specific types of authority are, in fact, usually rooted in a categorical loyalty to specific ideals, which are but more abstract forms of authority than the living persons. Wilhelm Reich thus pointed out conditions under which human psyche tends to become anomalous by adopting the traits of slavishness and rebelliousness at the same time, pointing out that subjugation to whatever the subject sees as authority and inner impulses to topple the very same or another source of authority down can be seen from the panorama of psychoanalysis as two sides of a single coin. Sainly personas, from the Buddha to the Christ to St. Francis of Assisi to St. Catherine of Siena, having chosen to obey the voice of God outlining the path they were about to follow in the deepest grooves of their hearts and thereby implicitly went against the dictates of their parents or whoever happened to be the social authorities of their times, sacrificing the approval of man for the praise from gods, so to speak, are some of the obvious examples of this psychological phenomenon. Many similar examples can be found in almost any romantic relationship that we can conceive of, oftentimes representing the embodiments of the rule that the personality of a 'dagger' has a 'wound' for the partner. The latter person in this relationship, however, often consciously plays the role of a wound so as to bind the dagger to it and bring it under its control, prompting the external observer to begin to wonder after a while who, in the end, is the dagger and who is the wound; or, as Neil Halstead sang toward the end of Souvlaki, 'I am your dagger, you know I am your wound'¹¹². A person, typically a female, who permanently falls ill in her relationship with a sadistic partner, might be, for example, in desperate need of love and care, which she can receive only when she demonstrates her severe weaknesses to the partner. Open displays of frailties have thus often been used as a psychological tool in the course of the history of human relationships, particularly by feminine personalities, to place oneself in the center of attention and from there on manipulate with others. This, however, promotes conditions for even more expressed sadistic features of the dominant personas and masochistic traits of the submissive ones, as in agreement with the positive feedback nature of all disharmonious relationships in the living domain.

As a matter of fact, intentionally placing oneself in the role of a weaker person, a victim in essence, has been the method used by many women throughout generations not only to manipulate with men and thus achieve their plans, but also to humiliate them by accusations of aggressiveness, proving over and over again how the roles of victims and aggressors are often complexly intertwined in real life. Not only do feelings of victimization tend to precede aggressive acts, but wolfish aggression more often than not comes camouflaged in sheep's clothing. What is often forgotten, as we see, is that by participation in such fights for dominance by one or the other means, the vicious circle of friction that contributes to the raging battle between sexes in this case or any other confronted entities in general is perpetuated rather than harmonized and healed, as both manipulative or subservient stances in it become ever more reinforced thereby, stances that could be seen as one and the same when subjected to rigorous scrutiny and looked at closely with fine insight.

In fact, what is known in psychology as passive-aggressive behavior, by far the most common sadistic trait of inhabitants of the modern world, whereby one tends to exhibit disobedient resistance and aggressive hostility in interpersonal relationships can be seen as having its roots in one's submission to beliefs or norms imposed in some distant domains of one's experience, be it forbidden expression of feelings during childhood or having had one's wings of angelic enthusiasm systematically cut by any social entity one has helplessly depended on. After all, mixed feelings of the desire to exert control and be argumentatively authoritative and of an inability to act in any other way than to passively wait for things to happen and someone else to take one by the hand into some fabulous realms of existence, so

symptomatic of this psychological disorder, speak in favor of nothing other but a clash of masochistic and sadistic features within one's personality.

It is quite possible that this reciprocal sadomasochism in the Freudian sense of the word presents an extension of the predator-prey mutuality present in the animal kingdom which humans are uppermost members. Namely, practically whatever the species we randomly select in it, we would realize that it is a prey for one and a predator for some other species. Moreover, wild and ravenous animals are 'two parts rage, one part fear'¹¹³ and as such provide us with a perfect example that a fearful sense of imminent falling prey to predatory paws, imaginary or real, is the first step that leads irrational exhibitions of aggression. Correspondingly, many of us who feel victims of worldly circumstances tend to naturally respond as predators in specific social settings, quite often unreasonably attacking innocent people during eruptions of predatory energy. Conversely, a briefest psychological research of those who tend to act as oppressors on a daily basis would lead us to conclude that they are passive slaves of some other predatory powers to whom they are unresistingly submissive. Therefore, as soon as we begin to feel as if we are being taken advantage of by someone, we should know that that moment corresponds to a rise of a tyrant in us. For, with a little bit of insight, we would come to realize that greedy autocrats in this world, as a rule, have a tendency to accuse others to be thieves and invaders of their sovereignty, while micromanagers and other control freaks always tend to see those whom they wish to submit to their despotic governance as helplessly lost and in bad need of external control. Yet, as the highest members of the animal kingdom, evolving towards more enlightened and altruistic ways of being with every new day, humans have a chance to distance themselves from subjection to these inherently animalistic relationships. Hence, whenever we start to feel as victims of some injustices, we should know that it is the first step to our becoming a tormenter in our heart and in the eyes of the world, and such resentful feelings should be swiftly substituted with smiley satisfaction and sunshiny happiness. To make a pirouette while looking up into the glorious skies, where angels dance and goddesses send us soundless guidance, to vow in ecstasy that 'nothing's gonna change my world'¹¹⁴, thus creating an invisible barrier impermeable to the venomous arrows of hatred, is what we ought to do when faced with derision and aggressive shoves by the hasty packs of hyenas *en route* to the fool's gold. In contrast, if we were to respond to other people's malice with indignation and a sense of being victimized, a fire would be enkindled in us that would eventually produce equal hostilities as those directed toward us in the first place, and nothing would be solved thereby. For, war against the war would be just another war on the face of the planet and 'eye for an eye would soon make the whole world blind', as Mahatma Gandhi noticed, which is why only love and peace lucidly shone onto the world around us can lastingly heal the troubles of humanity and open passages to its evolution towards more enlightened states.

These two complex sets of behavioral traits, sadism and masochism, should be given a particular emphasis in our attempts to achieve the balance of the Way of Love. And when we do attain it, these two distracting imbalances simply vanish, just as the ideas of solipsism and objectivism become annihilated in the concept of co-creation of experiential qualities. They become blended into a higher-order form of expression. And note how this ladder of merging a variety of antagonistic polarities of an ever higher complexity into Middle Way concepts of an ever higher order extends beyond the visible horizons, depicting the endless character of evolution of human patterns of expression and impression. The prophetic Way of Love, as of today, might thus undoubtedly present only an obscure ideal for future generations. But it does not say that we should not be satisfied for providing essential bricks for edifying the lanterns of knowledge that some future bright eyes will observe the world from, even in only for a blink or two.

Should we become inclined to the realistic side of the Way of Love that makes us prone to exhibit masochistic traits, we would realize that our behavior has become uncontrollably adaptable to

external circumstances. People around us may realize that we routinely change the agility of our expressions in face of different persons and situations and rarely ever speak our mind, so to say. This neo-Lamarckian habit is certainly essential for the proper evolution of our beings, but in order to be so it has to be balanced with a dose of self-control, achievable by bringing our actions forth in harmony with the inner sources of creativity in which our thoughts, visions, wishes and emotions swirl. On the other hand, should we happen to diverge into the opposite, solipsistic side of the Way of Love, our behavior would start exhibiting sadistic traits in terms of neglecting others for the sake of prosperity of our self, and an opposite effect would take hold. Namely, many impressions of the outer world would not be able to penetrate to our inner world and enrich our cognitive landscapes. Then we would realize that the evolution of our being proceeds mainly from the inside, in a Darwinian manner, and that interactions with the neighboring beings and objects have a minimal effect on outlining this evolutionary path. Creatures of the world would thus be treated independently of their own worldviews, and our expressions would not be crafted to suit the intellectual and emotional predispositions of the surrounding beings, resulting in our perpetually being misunderstood by others. Of course, these two viewpoints on the evolution of life have been warped over time and made to appear more extreme than they originally were, given that even Charles Darwin believed in the essential role sublime social values play in guiding the evolution of the species¹¹⁵. Or, as pointed out by David Loye, ‘Repeatedly in *Descent*, for example, he stresses the importance of the fear of blame and the seeking of praise as a prime motivator in our evolution as a species’¹¹⁶. Moreover, although it has already been confirmed that psychological experiences of our ancestors could be encoded in the methylation pattern of our DNA¹¹⁷, which in turn affects the gene expression and therefore our phenotype, the most exciting potential discovery that the researchers roaming through the field of behavioral epigenetics could be led to is the conclusion that the epigenetic network of biomolecular interactions may be a mediator of the environmentally predisposed genetic mutations, which would be thus confirmed to be all but random, as it has been held by the premises of the neo-Darwinian theory of evolution. Although the traditional view held by the evolutionary biologists was that there could be no way for environmentally imposed mutations occurring somewhere in the body to be transmitted to the sperm or egg cells and thence to progenies¹¹⁸, numerous recent experiments have demonstrated the ability of children to inherit the acquired traits of their parents, including the case where mice taught to fear an odor by means of electric shocks passed on this phobia to their offspring¹¹⁹, the study where baby mice born to male parents fed a high-fat diet prior to mating had a greater chance to develop diabetes¹²⁰, or the one where stressed-out mice turned out to be more prone to have babies suffering from depression and anxiety¹²¹. Thus, what seemed unthinkable only a decade or so ago now appears almost inevitable: namely, Lamarckian and Darwinian worldviews are bound to share the same fate as that of the theories of light proposed by Huygens and Newton, as they could both be proven as correct from a specific angle. Similarly, both the geocentric and the heliocentric models of the Cosmos could yield stable and predictable planetary orbits, as calculated by Ptolemy in the 2nd Century and by Johannes Kepler in the 17th Century, respectively, showing us that whether we place our mind or Nature in the center of the coordinate system of being, the overall repercussions on the latter become negligible, which provides a strong argument in favor of the necessity to anchor our attention in the way between the two, as advised by the co-creational thesis and its beloved child, a.k.a. the Way of Love. Naturally, thus, if presented with respect to the traditional neo-Lamarckian and neo-Darwinian stances, the Way of Love, as usual, can be said to occupy the space in-between them. On one hand, we should change with the flow of the external circumstances, freely absorbing the chosen personality traits of beings dear to us and sympathetically shape our expressions so as to enrich their visions of the world. But at the same time, we should not abandon the inner voices of our being that stir our creative actions in the world. We should learn how to fruitfully reflect Nature in

our thoughts and visions, and yet live in accordance with the divine mission ingrained within the very foundations of our spirit. The words of very Charles Darwin point in the same direction: ‘The social animals are largely guided by special instincts in the aid which they give to the members of the same community. But they are likewise in part impelled by mutual love and sympathy’¹²².

If you walk through the Reina Sofia museum in Madrid, be it in your dreams or while awake, you might encounter Salvador Dali’s painting named ‘The Enigma of Hitler’ hanging on one of the walls. In it, a central place is occupied by an old telephone handle with its microphone bitten off and a tear hanging from its speaker. Clearly, a visual metaphor was employed to depict the desire to speak and command as having overcome the aspiration to listen and compassionately absorb in the deviant mind of this notorious dictator. Yet, there is always a risk that by trying to transcend the sadistic imbalance, such as the one depicted on Dali’s painting, we might fall into the abyss of the opposite, masochistic imbalance. If we have heard and learned a lot in life and carry treasures of thoughts and inspirational seas of emotions within ourselves, yet we lack courage to move on and strew the emotionally impoverished earthlings with them, we could be sure that the tear depicting the spiritual thirstiness of the world would appear this time not on the microphone, but on the speaker of this symbolic telephone handle.

A memorable moment from the movie ‘The Seven Samurai’, directed by Akira Kurosawa, is when one of the peasants of the village that the samurais are defending from robbers asks the samurai leader: ‘Sir, everything that we have done so far is clear to me, except for one thing. Why exactly did you decide to leave the northern side of the fortress open?’ The samurai leader straightly explained: ‘A fortress fortified in its entirety is not a good fortress. If we only defend, we never could win’. As much as the fundamental bio-physicochemical balance between the operational closeness and the thermodynamic openness is required for preservation of the metabolic patterns of life, its reflections at higher levels of organizational complexity of biological entities are equally essential too. It is the synchrony between deeply breathing in and breathing out, being impressed and impressing others, defending and attacking, being ‘masochistically’ chaste and amenable and ‘sadistically’ willful and domineering, giving in freely to the booms and the busts of natural mood swings, like in the cycles of free market economy, that hides the secrets of a fulfilled and inspirational personality.

Each living cell comprises a network of contractile microfilaments that exert tension and pull the cellular membrane and all the internal constituents towards the nucleus at the cellular core¹²³, somewhat similar to a burning star whose force of gravity pulls its atomic ingredients inwardly and fuses the light atoms into heavier ones, releasing thereby immense amounts of light. And still, like a star that can sustain itself only insofar as it equilibrates this inward pull of gravity with an outward explosion of energy that brings life to the surrounding planets, the cell is operationally closed, preserving its boundaries and integrity at all costs, but also thermodynamically open, incessantly exchanging matter and energy with its surrounding for the sake of sustaining itself and the neighboring biological entities alike. Healthy human beings and the whole Cosmos at each of their organizational levels reflect essentially the same balance between closeness and openness. By being too open, natural systems may disperse and lose their inherent integrity, whereas by being too rigidly closed and tight, the opportunities for progress and evolution would equally decline. For, it is only through an endless change that we preserve our constancy and increase the chances to survive, whereas it is only through an endless reference to that unchanging core of our being that we have the chance to steer the evolutionary wheels of our creativity.

There are numerous disharmonic states of mind that stand forth as signs that our attitude has deflected from the balance of the Way of Love. For example, whenever we realize that our sense of wonder has ceased to exist, we have to look for the deep reasons behind. One of them might be the

tendency to cease to live in concert with one's inner drives and succumb instead to the desire to please others and present oneself in an attractive light. Note how these tendencies are on one hand fundamentally masochistic because they originate from the need to satisfy others, but on the other hand they are sadistic as they are inherently related to our aspiration to manipulate with the opinions of others. Thus, the balance, under these circumstances, has become disrupted, and it takes some effort to get back to living according to the sense of wonder that, full of quietude, beats within our hearts, while never forgetting that we always ought to enjoy seeing the world from other people's eyes.

Something similar may be observed whenever we become not only slaves of other people's opinions, but of earthly pleasures, fortunes and comfort as well. If we let them become masters of our decisions, futile inertia will take over our spirit and a silent suffocation of the soft, prayerful music that naturally reverberates within our heart will occur. Allured by the charm of spirits and places, we may forget how to listen and follow the way of our heart and, thus, wreck our ships against the rocky shallow waters, after blindly tracing the sounds of their siren songs.

The co-creational thesis and its child christened hereby the Way of Love teach us the importance of keeping the right balance between introspective autonomy and interactive openness. For, in the end, having one without the other is impossible. To preserve self-identity, biological creatures need to constantly exchange matter and energy with their surrounding, whereas to enrich the environment through this informational exchange, they have to maintain autonomous integrity in relation to their surroundings to a certain degree. Permanent tendencies to preserve this balance mark the organization of biological systems at any scale. Cells are shielded with complex membranes that selectively transmit foreign entities into their interiors and cytoplasmic entities out of the cell. Any specialized tissue needs to maintain its unique functionality that complements and enables the survival of all the neighboring tissues in the organism, which implicitly means that it also has to reach a satisfying level of integrity within the body as a whole. The same balance could be observed at the level of complex organisms and their interactions. Individual human beings need to be deeply immersed in their thoughts in order to bring about profound decisions that would benefit their worlds and humanity as a whole. At the social level, we may witness an endless dance of people approaching each other in their openness and yet retreating away from others in their closeness. Sustainability of the human race inherently depends on human abilities to preserve the diversity of autonomous cultures in their interaction guided by a sense of wholeness. Even the planet Earth in its dance around the Sun approaches its precious source of light just to start retracting from it and then getting close to it again in its elliptical orbit.

Should a biological system become overly absorbed into its own autonomy, forgetting thereby to preserve its integrity in relation to its neighbors, it would withdraw the life-sustaining energy all to itself, which would eventually threaten the survival of both itself and the surrounding systems that depend on its existence. But if the system becomes overly obsessed with interacting with others, neglecting thereby the need to cultivate its inner organization and order, its life-sustaining energy would scatter and the creative core from which the actions of the system should ideally arise would become extinguished, similarly endangering the survival of both itself and its dependencies.

Sadism and masochism can be understood as nothing but the psychological deviations from this balance between autonomy and integrity. Sadistically raising one's autonomy over the attitude of respect of others, all until it transforms into an oppressive and tyrannical force is as harmful for both the self and the environment as masochistic running to satisfy the needs of others and thereby disregarding the need to defend one's autonomy and prevent its dissipation. Only a balance between a strong defense and an alacritous attack can bring about a winning soccer team. But even then, we ought to know that the key dance of movements occurs in the middle, where creative midfielders link the defenders and attackers and provide a sense of purposefulness for the whole team. As always, firmly anchored extreme points

are required to spread the guitar strings tightly, but it is their oscillations, taking place along the middle Ways, that give rise to the music of life.

A great wonder on the Way of Love

‘No man can serve two masters: for either he will hate the one, and love the other; or else he will hold to the one, and despise the other. Ye cannot serve God and mammon’

Matthew 6:24

‘He who rightly realizes, that all things follow from the necessity of the divine nature, and come to pass in accordance with the eternal laws and rules of nature, will not find anything worthy of hatred, derision, or contempt, nor will he bestow pity on anything, but to the utmost extent of human virtue he will endeavor to do well, as the saying is, and to rejoice. We may add that he, who is easily touched with compassion, and is moved by another's sorrow or tears, often does something which he afterwards regrets; partly because we can never be sure that an action caused by emotion is good, partly because we are easily deceived by false tears. I am in this place expressly speaking of a man living under the guidance of reason. He who is moved to help others neither by reason nor by compassion, is rightly styled inhuman, for he seems unlike a man’

Spinoza, *Ethics*

In spite of the seeming immaculateness of the proposed concept of the Way of Love, there is one essential question lurking underneath it. And that is the problem of the likelihood of its fertility.

To sum up, the Way of Love has sprung as an answer to the two fundamental existential questions that have incessantly buzzed around my head, that have kept me awake at night and urged me to gaze at the blanket of stars enfolding me like a giant cosmic dome instead of sleeping safely and soundly: I) how to respect others from the bottom of my heart and not be a submissive conformist, and II) how to be a unique soul, utterly true to myself, different from anything that is, a rebel *bona fide*, without diminishing the enlightening sense of empathy with all that there is. The answer I have found is none but to balance oneself on that thin line drawn between the poles of perfect empathy, of being wholly one with another, on one side, and of perfect meditative inwardness, of being one with oneself, in the truest manner possible, on the other, also known as the Way of Love. The fear has, however, been always present, ineradicable in essence, burning deep inside of me, that this middle ground may not be the most fertile, but rather the most futile one with respect to both sides converging on it. I feared that resting on it would make my spirit frozen in a seeming state of perfection, when falling alternately onto one and then onto another side would be the way to transform into a living emanation of the fulfillment of these two questions, the answers to which I searched and yearned to find with my whole ethereal being and beyond. Many dark hours I thus spent wondering if this desire to stand at the intersection of differing streams of thought and reach out to all of them, the desire that culminated in the middle ground philosophy of life that the Way of Love is, could have been sparked by my submissive tendencies to respect others and avoid any disagreements with them even at the cost of supporting their toxic points of view thereby as well as by my embracement of somewhat sterile fire of intellectualistic relativism, to which intense loathing of totalitarian ideologies, which the 20th Century served as a historic graveyard for, has added fuel in my head and heart and maintained it alive over the years. Whether the Way of Love is a realistic key to perfect being or it is akin to a utopian perfection, unattainable but in a form as sterile as a dance of the motionless, that is the question burning deep inside of me on this very day.

This wonder is tightly related to the premise that any perfect balance in life is perfectly ineffectual too. Take for example an ordinary linguistic argument placed in a social context. Could the opinions that precisely balance pro and con arguments relative to specific ideas or methods induce active and passionate subsequent engagements? No, you might say, while possibly recollecting that ‘the unification of opposites which characterizes the commercial and political style is one of the many ways in which discourse and communication make themselves immune against the expression of protest and refusal’¹²⁴, as Herbert Marcuse noticed. Remember Sergio Carmona Mendoyo, the protagonist of Tomás Gutiérrez Alea’s *Memories of Underdevelopment*, and his fading away into an unbearable sense of purposelessness and apathetic alienation as the result of finding himself on a middle ground between the ideals embodied by the revolutionaries and the ideals supported by the westernized bourgeoisie? His is a neat example of how perfect middle way stances lie at the heart of passive relativism, that plague that has haunted intellectual elites ever since, making them quieter than simpleminded philistines on the grand social scale and, as such, as pointed out by Bertrand Russell, indirectly responsible for pushing whole societies into existential abysses, comprising one of the biggest communicational issues of the modern times.

Having brought into the discussion the schizoid balance between big-fish-eat-small-fish commerce and alleged anti-capitalist attitudes that many of today’s chic businesses rest on, thus perpetuating the same inhumaneness that has typified callous capitalism over the centuries, we could recollect the way specialized stores, let alone small, family-owned ones, are rapidly going extinct in favor of retail chains where one could purchase everything, from diapers to automobiles, including the likes of Walmart, Target, Costco and Amazon, and then muse over the possible perilous social influence of the adoption of Middle Ways in multiple other domains of human being. One of these aspects was hinted at by five-year old Theo when we walked through a half-emptied toy store that had just run out of business and declared clearance of all its items because of the aforementioned reasons¹²⁵, and he, holding my hand tight, said, ‘Dada, happy plus sad equals bored’, a koan like only a child can coin, contradicting the famous ‘man down at the tracks’ from Television’s *Marquee Moon*, who advised juniors neither to be happy nor to be sad¹²⁶, and crushing my belief in the marvelous effect of combining all possible emotions and states of mind in us in an instant, although paving way for the fruitful analysis thereof by scholars over the next centuries, without ever getting, as it were, bored.

Of course, there could undoubtedly be circumstances under which pointing at the states of equilibrium would initiate actions towards it. But even then there needs to be a certain polarity between the resulting states of the world and the momentary states, as envisioned by the subject being. For, even a conceived state of a perfect balance presents a somewhat unbalanced state in a larger context. And this should not be accepted as a desperate situation, which predestines all our actions to have an undesired side effect, irrespective of the wonderful side of their underlying aspirations. It is, in fact, a necessary precondition for any natural evolution at all to occur. Namely, unbalanced situations, not perfect static equilibriums, present the driving forces that continually instigate the cognitive and informational evolutions of man and Nature, respectively and in parallel.

‘Living organisms work hard to avoid the equilibrium state’¹²⁷, stands written in a textbook on the physical chemistry of biological phenomena, referring, of course, to the thermodynamic equilibrium. For, the evolution of life with respect to the laws of thermodynamics could be seen as nothing but a constant run away from the equilibrium state and any time a permanent, static balance is reached in the physical realm, it is suggestive of a deathful monotony from the perspective of living systems. Even in the domain of inanimate matter, preservation of systems in non-equilibrium states is critical and such is the case, for example, with the geological substrate on which life is anchored; namely, if all silicates comprising the Earth’s crust were in equilibrium with their chemical environment, the entire surface of

our planet would be a uniform aqueous solution containing a homogenous clay precipitate as well as large amounts of dissolved clay minerals and oxides¹²⁸, not allowing life as we know it to arise atop it. When at the very end of the 121-word long opening sentence of Milton's *Paradise Lost*, the poet announces his 'advent'rous Song, that with no middle flight intends to soar above th'Aonian Mount, while it pursues things unattempted yet in Prose or Rhyme'¹²⁹, he distantly evokes a consonant feeling that no groundbreaking innovativeness could be given birth to so long as we safely and securely stick to the perfect balances of the middle ways and resist to courageously and adventurously step away from them. For, even Odysseus passing through the strait of Messina on his journey to Ithaca sailed closer to the monster of Scylla than to the whirlpool of Charybdis in what was one of the two most famous ancient Greek references to the necessity to follow middle Ways in life, the other one being the myth about Daedalus' escaping Minotaur's imprisonment on the island of Crete by soaring into the sky with self-made wings and flying the middle course between the Sun and the sea. His son, Icarus failed to follow the father's route: he approached the Sun too closely and had the wax on its wings melted by its heat.

Think, then, of the ruination of the cordiality of friendship under the conditions the dictate perfect reciprocity of favors. Namely, only when friends do favors without neither asking for nor wishing to receive anything in return do their hearts become filled with the enlightening feelings that only selfless devotion to another can give rise to. In contrast, when self-interest driven by the ceaseless reference to the law of reciprocity creeps into a friendly relationship, the hearts involved in it become ever more distanced from each other. In view of this, once again, we could conclude that tireless shifts away from the state of perfect balance mark arousals of genuinely convivial relationships between human hearts. Or, as every balance training during physical therapies implicitly demonstrates, the best way to master the art of balance maintenance is to continually lose balance, that is, to play around it by alternately falling onto one and then the other side and then all over again. In other words, to lose a balance seems to be the only way to be comfortable in keeping it in the long run, whereas clinging too tightly to it would equal becoming unbearably stiff, unable to hold onto it and eventually losing it for good. For, in the end, like Victor Pasmore, who moved from painting naturalistic landscapes to painting abstract art when he recognized that everything is to some extent the free construction of the mind, and then moved to painting 3D compositions when he came to conclusion that humans do not see in 2D and that paintings must be 3D objects if they are to conform to the visual experience, but then moved back to painting on 2D canvases when he realized that the idea of painting in 3D is too realistic, whereas the human mind is not realistic, so may we be destined to eternally fluctuate from the realistic to the idealistic ends of the co-creational balance and back in search of a stable ground, without ever finding it, always shifted somewhat back or somewhat forth in relation to 'the meeting point between objectivity and subjectivity'¹³⁰.

If falling off balance is indeed the only way to retain balance, whereas clutching it tightly is a sure way to lose it, it makes sense to wonder if maintaining a perfect inner balance would also make us unable to act in compassionate and impressive ways towards others. Maybe it is this perfect inner harmony that renders us to become mean in the real sense of the word. What is the point then at which moderateness actually turns into meanness and indifference? Maybe like Rick Blaine from *Casablanca*, we are bound to remain confined in a cynical, unsympathetic and utterly negative personality shell for as long as we strive to maintain neutrality with respect to the fundamental polarity represented by the Way of Love. In contrast, as the film tells us, only when we rediscover true love in our heart and become inclined to one of the sides in balance could we become a real hero and a luminous soul that lights up the way through the dark for others to follow. The same opinion would be shared by those who perceived the womanizer's, Tom Frank's onstage glare at Bill's guitar-playing attempt to pull off a hard

rock style before a country audience in a scene in Robert Altman's Nashville and contrast their taste to the farthest extreme as if it was saying, 'You fool, that is not the right way to play', before he, himself, alone, would begin to play 'I'm Easy', a song that impressed everyone in the audience because of being a fusion between a country song and a modern song, one of a kind in the film, appealing to the ears of those who were left and of those who were right, and then went on to conclude that 'twas the director's showing us the sign of immorality, promiscuity and conformism that following the middle road on the wings of a cunning wish to play everybody's song and satisfy everyone leads to – a logical response to the American conservatism of the early 1970s and, prophetically, the next step in the evolution of the American culture in Altman's cinematic eye. Could it be then that the middle way idealized by sages of the present and past is not so ideal at the end of the day and fluctuating from one extreme to another guided by the principle that 'no excess is absurd', as noticed by a friend of Jean Cocteau's Orpheus while browsing through a review in which every page was blank, is the proper key to keeping the creative core of our being vital and fully potent? Could it be that every time a middle way choice is being made, we become deprived of the vital force and miss an opportunity to exert an enlightening effect on the world, in which case we would be similar to a soccer player unable to decide in an instant whether to kick the ball into the net or make an assist and instead instinctively making a 'middle way' pass, in-between the post and the teammate, sending it out of field and missing a chance to bring the joy of scoring a goal to his team? Could it be that my innate habit to engage in violent mood swings and swing from one emotional extreme to another, which people in the western world often mark as displays of the archetypical Balkan syndrome and deem inappropriate, is not the type of behavior to avoid, but the one to nourish because it may be the key to explaining the creativity of a wild, untamed stallion that typifies the Balkan wizards in a number of disciplines, from science to sports? Visual subjects who have each one of their eyes focused on a different image, be it a cloud on one and a beach ball on another, never see a fusion of the two images, but, as if gazing at Rubin's vase and seeing either two faces facing each other or a vase but never both, they instead alternate between seeing one and then the other and all over again¹³¹. Hence, like the car driver alternately looking at the road and at the reflections in the rearview mirror, unable to get a glimpse of both at the same time, so may our cognitive apparatuses be tuned in such a way so that every balance that they adhere to is composed of fluctuations between the two extremes that are being balanced, though never really simultaneously grasping both. As a matter of fact, a myriad of studies on human attention have indicated that multitasking operations generally proceed by alternating the focus of attention back and forth between its multiple subjects. Since we cannot breathe in and out at the same time, maybe static balances are illusory in any segment of the dynamically evolving, biological systems, in which case the two poles comprising the Way of Love - (I) being meditatively immersed deep into oneself and introspectively digesting the divine nature of experience, and (II) expressing oneself empathetically, so as to provide food for digestion and spiritual strengthening of another - must manifest themselves alternately and never simultaneously, with the space between alternations being disputable and possibly variable, ranging anywhere from milliseconds to minutes to days. Shining stars, for example, the ultimate metaphors of the balance intrinsic to the Way of Love, do not reside permanently in the state of a static equilibrium between the giant inner pressure striving to sweep the world with the lifesaving light of one's insides and the introspective force of gravity trying to compact oneself and withdraw it from the world, but rather undergo a constant pulsation as pushing out explosively lowers the temperature of the core and reduces the light elements fusion rate and the gas pressure, allowing the gravity to push back in and start to increase the gas pressure and the fusion rate, causing the temperature to rise and push the physical limits of the star back out¹³²; the cycle repeats over and over again, for a whole infinity and beyond from an ordinary human being's point of view. From the Sun ornamenting the celestial sphere to stars adorning human eyes,

signs are everywhere that, lest our creativity end up being frozen, the balance between any two poles should involve embracing one and then the other, not dividing our attention between the two within each infinitesimally small time window, but rather occupying ourselves fully with one at a time, albeit shifting from one to another and back as time goes by. Folk wisdom, after all, says that whosoever sits on two chairs is bound to slump onto the floor, like Arnold Schoenberg when he wished to reconcile the disparate approaches to musical composition championed by Brahms and Wagner, as in his *Transfigured Night*, and got rejected by the heavily divided community of late 19th Century romanticists because of that, or like the protagonist of Živojin Pavlović and Ivan Potrč's *Red Wheat*, who tried to satisfy both the farming collective leaders and the peasants and whose adventure ended behind the prison bars and with the sullen view of the Sava river, prompting us to wonder whether the proper maintenance of the balance between the two poles of the Way of Love must involve alternation between occupying them exclusively and undividedly rather than the attempts to remain in the realm of both at the same time. Correspondingly, maybe it is not fearful and overly careful leaning as close as possible to those perfectly balanced states on the Way of Love that provides our actions with a truly inspiring character, but free and wide oscillations between those two poles: a deep immersion into the subjective core of our being and a sympathetic unison with how the world looks from the eyes of fellow beings. Thus, maybe occasionally being deeply immersed into ourselves and watching the world from some peaceful distance predisposes us to be giving our heart to others with a great zeal, whereby being dedicated to help others and live for them predisposes us to collect some wonderful insights into the essence of our own heart. For, as much as subjective/epistemological and objective/ontological spheres of existence - mentioned during the explanation of the concept of co-creation – augment each other, listening to one's own heart and mind does not suffocate, but reinforces our compassionate communication with others, and *vice versa*.

In view of this 'argument about arguments', could not we consider the Way of Love to possess the same attribute, namely, the one of an inability to induce any action upon its perfectly balanced character? Could this be that 'fatal flaw in the logic of love' of which James Mercer poetized¹³³, hinting here at falling off a balanced state as the sole route toward the preservation of a balanced state? Does Michael Stipe's verse, 'there's a splinter in your eye and it reads 'react', R-E-A-C-T'¹³⁴ apply well to one such inherently paradoxical nature of the Way of Love too, telling us that only from a fault on it can steps moving one across it spring to life? If this is true, then the Way of Love depicted as a classical equilibrium of two divergent forces should be rather considered a route to lukewarmth and sterility than to colossally potent expressiveness. Continuously residing on it would predispose one to more likely feel as deprived and burdened as Juliette from Godard's 2 or 3 Things I Know About Her in the famous galactic coffee scene, 'crushed by objectivity and expelled by subjectivity', than shiny like a star that intrinsically balances the inward pull of gravity with the outward pull of pressure. Maybe a continual sense of wonder about the nature of Love, like the one spontaneously exhibited by Socrates in the famous dialogue with Phaedrus, is required for its emanation and development, along with ceaseless fluctuations between the subjective and the objective poles of the Way of Love. Or, to quote Pascal, 'Let us then seek neither assurance nor stability; our reason is always deceived by the inconsistency of appearances; nothing can fix the finite between the two infinities which enclose and evade it'¹³⁵, the infinities, of course, being mind and Nature, the two nodes between which the whole infinity of strings of life is being stretched, bringing forth experiential appearances through the harmonies of their collective oscillations. On the other hand, note that the art of passivity and non-action famously stressed out by Lao-Tzu, of sleeping soundly nested in the center of truth and the absolute in spite of being surrounded by the unsteady waves of the ocean of relativism and uncertainty, could still be associated with this perfect inner balance of the Way of Love. Obviously, the entire dichotomy between Western and

Oriental cultures could be seen as arising from these intrinsic differences in their systemic attitude towards balances and imbalances, as we arrive at another crucial crossroad in our musings, yet another irresolvable source of wonder and ambiguity whose alternate tangling and untangling brings about vital evolutionary incentives.

Maybe it is, thereupon, the readiness to make and accept mistakes, and correspondingly learn from them that comprises that crucial difference between these two civilizations within humanity: the Western, known for its activity, mutually balanced hotheaded flaws and ponderous repentances that eventually led to a quicker progress, and Oriental, known for its passivity and moderateness that might have been caused by the cultivation of inner constraints towards making mistakes and stepping away from once achieved balances. In any case, Nature's instating the Way of Love before our feet, a road that leads us to the realm of sacred being, walking on which resembles the wobble of a drunkard, left and right and left and right and all over again, requiring incessant falls in the direction of the gutters to be walked on forward, may be tied to her abhorring arrogance, which standing firmly rooted in perfectly balanced states naturally leads to, and favoring instead hearts trembling in uncertainty, wondering with their entire souls and beyond, bearing thereby the attitude of angels who 'fear to tread where fools rush in'¹³⁶. It is for the same reason that Nature keeps us suspended in a state of constant doubt and perplexity by not giving us simple Yes or No answers to the most fundamental questions pertaining to our lives, knowing all the while that from this no man's land, a state of mind crucified between poles that define our philosophies, incentives for the most beautiful action and thought are being born. She knows that 'fact is a contrivance of the devil', as a saying from Qur'an goes, and teaches us to substitute claims, along with the bureaucratic lifelessness that their exposition evokes, with ideas and embrace uncertainty and the experimentative sense of wonder over it all as fuels for the mindset set to create miracles. Standing on the grounds which one moment seem absolutely infertile and another moment appear absolutely creative is thus the fate from which no farer on the Way of Love can escape. It is as if Nature's fosterage of ambiguousness by these means is Her way of telling us that plunging our spirit in the sea of uncertainties is necessary as it sustains wonder, keeps us awake and inclines us to move forward on the evolutionary path, onto which permanent blockages would have been placed had we only ceased to search under the impression that the stable grounds for our way of being and for our philosophies have been found once and for all.

This is why a true blessing in life is to find oneself neither in a state of balance nor in that of imbalance, but to levitate in-between instead, not knowing at times where one belongs anymore: nowhere or everywhere, having thence equal capacities to become a madman or a star. And if it is true that our creative incentives derive from disparities only and inevitably lead to new disharmonies that further drive the evolution of knowledge and life, then the art of balancing the states of balance and imbalance would present the highest and ultimate systemic art attainable. Put in the context of the balance between the introspective immersion and the expressive explosions of enlightening energy portrayed by the Way of Love, we could now fly on the wings of this insight straight to the Sun and boldly look it in the eye, with a wonder whether its path of perfect equilibrium between the inwardly pulling force of gravity and the outwardly dissipating outbursts of heat and light that bring life to the planet religiously circling around it, inspiring the present and the future devotees of the Way of Love, is a right one. What, indeed, if the Sun as such, autistic and withdrawn, never breaking this balance and never reaching out to the Earth with spills suggestive of listening too, merely spinning in darkness and sending light our way, untouched by our presence, is the reason why wars and famines rage all around us, coloring our existence with purgatorial, not paradisiacal nuances most of the time? If openness to the influence of another is analogous to the conscious crashing of the autopoietic balance within us, must we then be a relentless breaker of the balance if we are to live life at the interface between giving and

taking, between illuminating another and inspiring oneself, being the only standpoint wherefrom live could be lived harmoniously and prolifically? What if we must continuously fall off the balance if we aspire to maintain it in the long run in this circular, inherently paradoxical reality wherein the securest route to heavens is a downward one, taking us closer and closer to the earthly hearts and the dust laid over them, and wherein the fastest route to six feet under is the Icarus' one, soaring one higher than the world in presumptuousness and conceit.

Be that as it may, it is highly probable that continuous maintenance of balance predisposes one toward continuous stagnation, not a rapid forward stride. Therefore, rather than instructing my students to gravitate around the potentially infertile zones of balance, where every Yes is neutralized by a No and movements, in general, are prevented, I advise them to 'just do it' when an intersection is resided on and a choice is to be made. After all, whatever the choice is being made, that is, whether one opts for performing an act or abstaining from it, one will eventually regret it; it is just that, *summa summarum*, particularly towards the end of one's lifetime, the regret over the things not done, as a research study I came across long ago concluded, overwhelms the regret over the things done. Correspondingly, when the Serbian-American filmmaker, Peter Bogdanovich asked Frank Capra how he should cope with mental blocks on the movie set, the answer he received was, 'Just decide, right on the spot, in the blink of an eye; anyway you will be wrong 50 % of the time'¹³⁷. There are, of course, narrow frames, such as those of multiple choice tests on, say, standard operating procedures, where one could prove oneself right 100 % of the time, but when the frames are contextually broadened, one will verily be right no more than 50 % of the time, regardless of how much of an expert one is considered to be, which means that one should, simply, do whatever one intends to do, with the finest of feeling and the littlest of forethought. And that is exactly how I imagine moving forward along the Way of Love: 'tis a process involving wide swings from one extreme to another, so that, indeed, one half of the time one moves towards the balance and the other half of the time one moves away from it. The painting method developed by Andrew Wyeth was exactly such, combining technical refinement and studious balancing acts with the periods of deliberate destruction of anything refined and painstakingly equilibrated earlier; or, as the painter himself described it while analyzing his tempera, Brown Swiss, 'One evening just before dinner I mixed up a huge bowl of ochre color and raw sienna, very watery. Then I stepped back and threw it all over this huge painting, color dripping down. Then I rushed out. If I'd seen it drying all patchy, maybe, I'd have tampered with it - and doubted. The next morning I found I'd made it. I take terrible chances like that. Sometimes I miss and it's awful - chaos. But I'd rather miss sometimes and hit strong other times, than be an in-between person'¹³⁸. It is thus that I am taken to my daydreams about the perfect prelude and a prep for a night out to the sound of Classixx's debut LP a.k.a. Hanging Gardens, wherein all seems calm and balanced, painless, yet lifeless, as if in an insensate Shangri-la of a kind, and then it all changes with the very last tune, when the singer suddenly starts to sing about being tired of 'waiting on the borderline'¹³⁹, producing a milestone moment in which I envisage a jump off of the thin line of balance, whereon nothing is fertile and all is futile, and into life, dark, frightening, insecure, but life in the realest sense of the word, the only one that could take us by its scrawny hand to face the sun of divine spirit in us and merge with it, once and for all.

The book of Bhagavad-Gita provides one of the oldest metaphors of this need to step away from the state of perfect balance to open the door for the evolution of knowledge and life. In this poem, the main character, Arjuna, finds himself in the middle of a battlefield just before the battle was about to begin. He recognizes his friends, relatives and many of the dear ones on both sides and desperately looks at the whole situation. The Lord suddenly appears as a savior in the character of a chariot rider and takes Arjuna on the ride right through the middle of the battlefield. By looking left and right, Arjuna sees two

armies, and his desperation grows even stronger. And in the midst of it, the Lord starts to teach him the art of a brilliant and divine spirituality.

First of all, the confronted armies could be seen as reflections of the dialectical nature of any type of progress in life. But should a thesis and its antithesis be perfectly balanced, no fruitful syntheses could ever be arrived at. There needs to be a resulting imbalance upon the comparison of the two in order for their contrast to be productive and insightful. Thereupon, although Arjuna is in the beginning of the poem headed along the 'middle way' so as to carefully observe the nature of this polarity, he gets taught by the Lord to pick a side and fight for it. However, 'Arjuna cast aside his bow and arrows on the battlefield and sat down on the seat of the chariot, his mind overwhelmed with deep sorrow... I shall not fight, O Krishna, he said and became silent' (Gita 1:46...2:9).

Needless to say, any understanding of the combative character of this narrative as literal would go against the grain of the sublime qualities that religions of the world have embraced. Thus I love to say that if my spiritual progress could be measured by the book of Bhagavad-Gita, I would still be stuck somewhere at the end of the first chapter. For, I still have Arjuna's 'I shall not fight' line, alongside the story about the Christmas Truce of 1914 and armies that 'joined together and decided not to fight'¹⁴⁰, stream incessantly through my head, instilling pacifistic vibes from my head to my toe and halting any combative impulses before they sprout from their mental seeds. Yet, if understood correctly, that is, as an allegory, this story within the story of Bhagavad-Gita might be seen as an advice that that we ought to continue to strive to express our will-powered wish to wash the whole wide world with the light we have nurtured inside, notwithstanding the cost, but also that perfectly balanced situations in life exhibit a relatively weak potential of progress. Like a canoe paddler who advances forward by alternately deviating towards left and right from a perfectly straight path, life also needs to balance the states of balance and imbalance in all of its aspects in order to provide a fertile ground for its evolution.

In other words, only perfect imperfections can provide a path to a true perfectness. Thermodynamic and cybernetic viewpoints on progress in life clearly stress out that only entropy and randomness can provide ingredients necessary for human being and knowledge to evolve¹⁴¹. Likewise, the addition of noise to a neural network can prompt it to perform better at network generalization, a form of systemic thought, as it were¹⁴². To reject chaos and stochastics in our abstractions and physical expressions is to expel creativity from our being and slowly turn the sphere of sunshine that our spirit can be to a black hole of depression and vacuity. Decades of playing chess taught me that when sequences of moves are forced, there is no room for exhibiting creativity; likewise, whenever one is subjected to rigorous commands and orders, when doubts cede place to dogmas, when uncertainties and solecisms are banished like the plague, when laws are too many and freedom, entropy and chaos too little, creativity suffers and with it our ability to provide impetuses for the evolution of the human race toward horizons more blissful than it has ever seen. Concordantly, many Biblical narratives, including that about St. Paul's conversion on the road to Damascus, the book of Job, and the stories about the tower of Babel and the city of Enoch illustrate the need to have uncertainties instilled in every form of progressive knowledge, whereby. In fact, the complete structure of the Bible can be interpreted as a reflection of the evolution of human and natural creativity from that relying on and producing perfect balances (e.g., in the book of Genesis, God divides the world into perfectly mirroring poles, such as Heaven and Earth, day and night, etc.) to the one that gives in to perplexing interplays between balanced and unbalanced states (e.g., Psalm 137 and Jesus' sayings, such as 'suppose ye that I am come to give peace on earth? I tell you, Nay; but rather division' (Luke 12:51)) to the one instructing us and the world that whichever we choose, the evolution of ourselves and the world will proceed unstopably ('And whosoever will, let him take the water of life freely' (Revelation 22:17)). This is because imbalanced

states naturally increase the potential of returning back to balanced states, and *vice versa*. It is through these shifts between balances and imbalances that humanity and Nature keep on marching forward.

As far as the Way of Love is concerned, it seems that keeping in mind the balance of confronted opposites is required as much as creativity and bravery in alternate fallings to opposite sides: approaching our own heart and distancing from others on one side, and merging in sympathy with hearts and worldviews of others and partly giving away the voice of our heart on another. It may be required for the evolution of both ourselves and the world to jump occasionally from the cliffs of love into other people's arms. But it may be also required to occasionally withdraw ourselves from the world into silent contemplations – the ones through which our potential to give would be replenished and our heart rejuvenated. Of course, it may be that, like Marilyn Monroe in Terry Johnson's play *Insignificance*, one ends up 'feeling lonely with all the people', using dense social crowds as meditation sets and, in turn, replenishing the empathic ties with the society in the dark deep of the sea or a forest, fluctuating along way between the extremes of 'needing 1,000 people touching one all the time' and 'needing to be alone all the time' too, but in it lies the beauty of this diverse world, where no two grains of sand, let alone human minds, are the same.

How intensive or subtle in magnitude and time these alternate fallings should ideally be is another question of interest. If the time scale of these oscillations is fine and the magnitudes mild, it might even seem as if we are constantly in the state of a perfect balance. But if we intensively become inclined to one side or the other and spend considerable amounts of time in these unbalanced states, we would appear as if amply swinging across perfectly balanced states. Most inhabitants of coastal towns are aware that the magnitude of the difference between the high and low tides is directly proportional to the fishiness of the coast's smell, and could it be that such wide oscillations from one extreme to another, whereby the range of proximity to the state of balance is swiftly crossed, produce a similarly unpleasant vibe in the wake of our thoughts and acts? On the other hand, when the sea level does not change significantly throughout the day, little or no detectable fragrances tend to be released in the air, yielding practically no seaside scents to rouse the dreaming of quixotic silhouettes that longingly sit on the seashore, prompting us to wonder if maybe such constant preservations of the balance generate not clouds of magical stardust that touch the surrounding hearts and infuse the lifesaving gifts of wonder and love in them, but merely a lukewarm sterility, leaving the casual observers drowsy, dull and deflated of any airs of inspiration that could have potentially lifted their spirits high into heavens. One thing is certain, though: there is no recipe irrespective of the context of our existence to figure out which of the two ways is more ideal. The true art of this unbalanced balancing and balanced unbalancing may be lying in alternate shifts between wide and intensive swings, and mild and delicate ones, as in an exciting novel or a symphony. But I would not tell you the secret. And all that for the sake of your own wonder to flourish and benefit both yourself and the world.

Be that as it may, I am positive about a single thing: like a cyclist who cannot stop biking lest his balance is to be disrupted, our quest for love has to be like a moving train; always on the run, always on the quest, always in the state of wonder and amazing adventurousness. If our faith in the fulfillment of our divine mission on Earth is immense, and our fields of hope dancing with bright visions and ideas, and our love moving mountains and catching stars for the sky for the sake of enlightening the people of the world, we should not be afraid of falling from the cliffs of love. Any imbalance would be, sooner or later, with the proper attitude of ours restored to a perfectly balanced state, although only to be again disrupted and then restored. For, that is the only possible way for the evolution of life to occur. Therefore, 'O Arjuna, confident of success, rise up and fight' (Gita 2:37).

The logical extension of this perspective leads us to a stance from which we can observe that only by stepping away from certain loci can we recognize their value. The most idealized is, for this

reason, usually the least attainable and a total opposite of the common proverb, ‘out of sight, out of mind’, is at work here. This explains why I, with the mood like a pendulum, swinging from one extreme to another, going from 0 to 100 and then back, from the exaltation of a butterfly to the depression of a cocoon, have idealized the concept of the Middle Way, one I could never attain in real life. On top of this, how are we going to find the magnificent balance of the Way of Love unless we find ourselves slumped desperately into states that are wholly out of balance with respect to it and repentantly, with bright eyes whose dewy wonder lights up the universes above, rise up and fight to restore it again? These falls from its graceful locus are, of course, marked by either of the two: finding ourselves in the states in which every contact with others gets down to mere sensing what they expect from us and our trying to concordantly impress them, thus never coming even near the fulfillment of the divine potentials nested in us, or finding ourselves in the states in which others have long faded in our cognitive background and became mere shadows and silhouettes in the world of our imagination, incapable of providing an anchorage for the strings of empathy stretching out from the lute of our heart.

Mundaka Upanishad tells us a beautiful story about a bird experiencing bitter fruits of the tree it dwells on. After tasting each one of them, it feels the bitterness, and immediately regrets for ever trying them. In melancholic moments of lamentation and repentance it raises its view towards a solemn bird graciously sitting on the treetop. And lo, one day it realizes that through this endless cycle of mistakes and repentances not only has it become, but it has, in fact, always been that graceful bird. The same cycle of falling out of balance only to be succeeded by soul-cleaning tears and regret and our running to return back to the balanced road, may be the only one that leads us to the apex whereat the mastery of the Way of Love awaits us. Therefore, to allow ‘all these penances’¹⁴³ that periodically ‘come flaming around’ to engulf and swallow us in their blaze whenever the songs we compose that ‘brought us to our knees fail’ has been indeed ‘the hint of the century’ in this age of pervasive arrogance, toxic self-confidence and the lifting of the walls instead of monuments to the wretched gods and goddesses of love. It has hinted at the road consisting of a series of soars and slipups as the only one taking us to higher spiritual destinations. In view of this, we should perhaps not hesitate to either jump from the cliffs of love or to love the whole Cosmos from the ‘desolation row’ if we wish to attain this immaculate apex of the pyramid of Love one day. Until then, it is enough to know that all the roads along its sides or edges lead thereto. But only if our wish to get there is so great and moving that even the stars in the sky jiggle in response thereto.

In fact, whatever the skill that we ardently try to learn in life is, the road to success would always lead through alternate moments of satisfaction and desperation. On single days it would seem as if we are heading there along a straight line, and on other days it would appear as if the summit we have assigned as the target is too far and too high and the paths leading thereto are nowhere near. Just as with the real-life bird from Mundaka Upanishad, the moments filled with a bitter sense of backsliding and feelings of an ecstatic hilariousness then shift in us like the cloudy and sunny moods of all the brilliant minds. But it is essential to recognize that the greater the desire and passion to achieve our aims drifting within our being are, the more intensive these swings between the seeming successfulness and failure will be. And the more intensive this interplay between balanced and unbalanced states is, the greater the propulsion along the way of ours would be, as we could have realized by now. As a result, we can freely observe that, in the end, it is the deepest aspirations of ours that define our way forward. A true bravery lies in one’s courage to ceaselessly cultivate these wonderful, prayerful aspirations at the foundations of our hearts. For, in the end, what we wish, we truly become. Wishes concealed at the bottom of our heart draw the guiding stars to which our ways in life are leading.

What else the co-creational thesis tells us

‘And this is the record of John, when the Jews sent priests and Levites from Jerusalem to ask him, Who art thou? And he confessed, and denied not; but confessed, I am not the Christ. And they asked him, What then? Art thou Elias? And he saith, I am not. Art thou that prophet? And he answered, No. Then said they unto him, Who art thou? that we may give an answer to them that sent us. What sayest thou of thyself? He said, I am the voice of one crying in the wilderness, Make straight the way of the Lord’

John 1:19-23

‘For now we see through a glass, darkly; but then face to face: now I know in part; but then shall I know even as also I am known’

Corinthians I 13:12

In this section, some of the important cognitive and behavioral guidelines derived from the co-creational thesis will be piled up.

First of all, the co-creational thesis through its social manifestation in form of the Way of Love tells us that it is vital not only to live on the wings of the drive to fulfill one's own inner aims and visions, but to equally live for others too. The co-creational thesis indicates that a perfect relationship is the one in which the balance between the beings' orientation to their subjective cores and to each other is dynamically preserved in the course of their harmonious coevolution. It is, therefore, essential to cultivate inwardness, self-responsibility and meditation as much as to value devotion, empathy and humble diligence. It is, thus, not only important to find an oasis in the world that we will like, but equally important it is to find the place that will like us, so to say¹⁴⁴. Love and being loved; being active and being passive; being an enthusiastic leader, and yet a faithful follower; creatively expressing and carefully listening to the hidden teaching voice of Nature, immanent everywhere. And that is where the true art of loving and balancing the polarities of life comes forth.

Second, the co-creational thesis tells us that everything that we perceive and are aware of emanates from the dialogue between the spirit of our being and Nature. Upon setting the fundamental conceptual framework for describing physical measurements, according to which there could be no objective measurement without an interaction between a subject (a measuring device) and the object (the measured system), Werner Heisenberg observed that Nature could be no longer seen as independent of the observer's mind. Instead, the reality as we perceive it is an endless stream of answers to questions posed by the depths of the human mind. Not only could be Tarot cards and Yi-Jing combinations, therefore, taken as symbols for reading human destiny, but each perceptive moment and every game that we can conceive of provides us with answers of Nature (i.e., God) to the deepest questions that we carry within ourselves. We should never doubt that our destiny is written on stone ridges, tree barks, cloud figurines or shadowy silhouettes. It is the ability to read and interpret these subtle 'signs of the times' that renders us wise and prophetic. Trusting in the intrinsic dialogue between human spirit and God, the results of which are ingrained in each detail of the world, as the co-creational thesis itself indicates, sets the foundations of our faith upon which can the development of these marvelous capabilities readily take place.

The constructivist aspect of the co-creational thesis tells us that what we do to the world as we see it, we impose to ourselves as well. This is because it is us who partly construct the world by the very perceptive activity of ours. On the other hand, being good to our body and mind provides steps towards preservation of the world itself, while, at the same time, our daily actions that sustain the world as we know it somehow, mysteriously, become sustainable choices for our own being too. The objectivistic

element of the appearance of the world is also here to both strew us with endless evolutionary incentives and surprises on this way and to make sure that the world will somehow heal itself even when one does an intentional harm thereto.

The co-creational thesis tells us that beauty in the eye of beholder is reflected in beauty of the world as one sees it, and *vice versa*: the beauty of the world and its divine creative force are reflected in tiny sparkles of beauty that our eyes radiate with. Our deepest intentions outline the features of the world of our experience, whereby the traits of the encountered natural systems similarly influence our deepest cognitive patterns. This implies an everlasting communication between the impalpable and ineffable sources of human spirit and the nature of the world. All of this also points to the concept of interactive mutuality depicted by the symbolism of the Way as deeply ingrained in the very substrate of Nature and life. In it, what we start from we see reflected as the end results of our inquiries, so that the beginning and the end, the premises of our explorations and the final conclusions thereof merge into one. 'Where shall you seek beauty, and how shall you find her unless she herself be your way and your guide'¹⁴⁵, Kahlil Gibran wondered. That the immaculate beauty of living lies exactly on the Way between human spirit and Nature is what the co-creational thesis implicitly tells us.

Thus, whenever we are about to make a profound choice in life, we should never do it by referring solely to the benefits of our own that will come out of the chosen paths. Instead, we should always look for the ways that would benefit both ourselves and others, including entire Nature. All of my deepest wishes in life that miraculously came true were conceived with an underlying aspiration to enlighten not only myself, but others too, with the treasures found on the way wished to be walked on. Through such an approach, even the darkest and heaviest gates in life will soften up and open new spaces for us. For, if we do not do the things in life for the sake of bringing happiness to our self and others equally, the stable ground of ethics and the angels of grace that would have otherwise guided our being in the moments of confusion and perplexity would seem disappeared. Therefore, whenever I need to make big decisions, be it in the domain of my scientific research, philosophizing or private life, I withdraw myself and deeply ponder. But even then, I am not alone. Because I look for the ways that will bring cosmic joy, purity and enlightenment to both me and the whole world, it is I and Nature thinking together. Then, my mind is open to various metaphoric impetuses that come from the semi-dreamy and semi-awake observation of the experiential world, which is the exact mindset that triggers showers of analogical insights to start miraculously falling on one. After all, each detail in the world of our experience is a way on which mind and Nature walk hand-in-hand.

The co-creational thesis tells us that we should never aim towards gaining a perfect control over our lives. Planning everything, from our daily activities to career paths, without ceaselessly listening to Nature's voice and being ready to change the sailing course according to Her advice at any given moment of our existence, would eventually leave us unfulfilled. As if trying to stand perfectly still in a flowing river, our mind would become stressed out and ready to break apart under the huge force of the water stream. Hence, we need to let ourselves float and be carelessly carried by the water stream, with one part of our mind whispering to ourselves the sound of '*que sera, sera*'. At the same time, the other part of our mind is to get engaged in creative conceptualizations and careful planning of whether we are to succeed in making our living survivable and fruitful for the entire existence. For, floating on a river without consciously making moves that navigate us in the right direction would be equally unsustainable as trying to set oneself into an immobile position. Therefore, it is the balance of respecting the Way of Nature and living so as to bring forth our aspirations to the daylight of being that is inherent to the co-creational thesis. Only by living in accordance with both the pathways our heart opens for us and the ways Nature has predisposed us to follow would we be able to live in total bliss and happiness. And one day, miraculously, we might find out that both roads, the one flourishing in our heart and the one Nature

points at through its mysterious metaphors and ineffable siren songs, converge into one. Nature would be seen as residing in our heart, and our heart would be seen as dispersed everywhere, in each and every detail of the world as we know it, just as the co-creational thesis has indicated.

The co-creational thesis further tells us that we must dive to the deepest seabed of our spirit if we aspire to bring its sunken treasures to the surface and bedazzle the adjacent human hearts therewith. In a way, this bears resemblance to the way Bertie Russel's famous antinomy shattered the logicians' dreams of a perfectly consistent and logical system of thought based on the assumptions of devilish determinism and capable of proving any statement true or false with an absolute certainty and opened a way instead for the dawn of more humane, organic worldviews that accepted paradoxes, ambiguities, contradictions, intuitions and mysticism of the unknown and of the unknowing as innate creative forces complementing pure analytical reason in its immense power, culminating in Russell's most famous student's, Ludwig Wittgenstein's ending of his dissertation a.k.a. *Tractatus Logico-Philosophicus*, yielding an entrance to the spheres of mysticism and sorcery straight through the doors of the clearest logic conceivable: 'What we cannot speak of, we must pass on in silence'¹⁴⁶. Namely, this logical paradox, which is merely a twist of that hinted at by Eubulides of Miletus when he asked at one of the ancient Greek fora if a man who says that he is lying is speaking truth or lying, for if speaks truth he would be lying and if he lies he would be speaking truth, can arise only insofar as a system assumes a self-referential role; analogously, cracks in the pavement of our psyche open when we begin to refer to the epicenter of our being, wherefrom all our thoughts and actions originate, and these are the very same cracks through which the undying shine of the sun of our soul will be able to emerge to the surface. In other words, when we hide ourselves under the surface, the world does indeed tend to fold and close in on us, but when we look even deeper, toward the very core of what we are, the world begins to open and unfold its petals before our eyes.

Therefore, before we could spill the spiritual sunshine of a superman all over the face of the planet we must make our actions refer to the deepest and the most intimate centers around which our ideas and sensations orbit. 'Seek ye first the kingdom of God' (Matthew 6:33), the kingdom that is 'within you and it is outside you' (Thomas 3), the Christ instructed, while Francis Bacon concordantly observed the following: 'For it has ruined everything in the experimental field that right from the beginning men have continually aimed at Experiments of Fruit not ones of Light, and have devoted their energies entirely to producing some splendid work, not to revealing nature's oracles, which is the work of works and encompasses in itself all power'¹⁴⁷. The co-creational thesis is, in fact, all about marrying the two aspects of a balanced creation: revealing the wonders of Nature and revealing the intrinsic essence of the human mind. That is, an objectivistic discovery and a constructivist invention occurring at the same time¹⁴⁸. Man reveals Nature, while Nature reveals the man revealing Nature. For, it is their implicit communication in 'facing' each other that ultimately comprises the ontological essence of being and becoming. Consequently, 'every representation an abstraction and every abstraction a representation' is an essential self-made principle, somewhat impressionistic in nature, as some may notice, that the authentic co-creationist lives up to. Anything other than this would, in fact, comprise contravention of the basic premises of the co-creational thesis, according to which every idea of ours is built from realistic ingredients just about as much as the whole reality that we experience is an actively evolving invention of our imagination.

The co-creational thesis tells us that experience is a bit like the fortune-telling habit of looking into an empty cup holding solidified coffee trails. It teaches us how to recognize the divine messages to our own being in these mysterious landscapes. As we ascribe deliberate meaning to these solidified coffee shapes, we should know that what we see in them is partly determined by our inner aspirations, as in the famous Rorschach inkblot test. Though we still cannot negate that what we may recognize therein

is also partly predetermined by the object shapes that each one of us sees in the surrounding world. As has already been pointed out, man draws Nature, whereas Nature draws man. Objective and subjective features of what may be regarded as reality from the former and simply experience from the latter perspective are thus blended together in everything we are aware of. And we should, of course, know that every leaf, every cloud, flower or a piece of ground under our feet are composed of ridges and lines that can similarly be read like a book of Nature. With a bit of sagacious imaginativeness instilled into this observational act, one may discern in them wonderful meanings posed by Nature in front of us as a reply to our deepest thoughts and tendencies. Eventually, however, each one of them will inevitably be, just like each detail of the world of our experience is, partly a reflection of the deepest qualities and questions that reside within us and partly mysterious answers of Nature thereto. The world is thus as much a mirror to our soul as it is a canvas that we are welcome to adorn with the essence of our self.

The co-creational thesis tells us that features of the subject's inner, spiritual world are mirrored in every aspect and detail of the world he perceives as seemingly external to his being. In turn, as in a chemistry reaction wherein transformations in one direction are always coupled to transformations in the opposite direction, wherever a route opens for the influence of one entity over its polar opposite, we should be sure that the doors become opened somewhere for the reverse impact to occur too. Thus, according to the concept of co-creation, not only does Nature outline our spiritual qualities, but our spirits steer the ship of Nature on its sail from the earthly to the heavenly spheres of being. The co-creational thesis, as such, tells us that we are an active participant in guiding the evolution of the world even when we sit in a solitary confinement in a lotus position, perfectly still, moving not even the tips of our fingers. For, every observation, according to it, is akin to a quantum measurement: the observed object is inescapably changed during it. Thus, by merely perceiving our surroundings in a blissful light, by deliberately seeing goodness instead of vileness all throughout it, be it directly or through mental reflections, we have a chance to silently set the world on the way to salvation. One analogy comes from the Argentine documentary movie, *The Hour of the Furnaces*, whose watching was made illegal in the late 1960s: 'every comrade who attended such showings... was no longer a spectator; on the contrary, from the moment he decided to attend the showing, from the moment he lined himself up on this side by taking risks and contributing his living experience to the meeting, he became an actor, a more important protagonist than those who appeared in the films'¹⁴⁹. To watch the world with love and know that this godliest of all human qualities is thereupon being disseminated all across its fields and meadows, so as to inspire and guide the wretched worldly souls toward salvation, is thus one of the ultimate destinations of our deepening the idea of co-creation.

The co-creational thesis, furthermore, tells us that as much as we should strive to 'rejoice with them that do rejoice, and weep with them that weep' (Romans 12:15), we should aim toward bringing forth at least a part of our creative incentives in communication with others straight from the bottom of our being, from the seafloor of our heart where many treasures lie scattered. A well balanced behavior is partly a mirror of the world, but in part it also brings about a unique essence of the subject's spirit to the world. Mightily being different and modestly being the same; being lovingly compassionate and still being independent and unique; being others and being ourselves is a great mastery to be achieved.

The co-creational thesis and the Way of Love tell us that anytime we become too individual and original so that our ideas could not find a sympathetic mind in the world around us anymore, the angelic guidance of Nature will push us to blend with other people's worldviews, all until we restore the balance between being creatively unique and being compassionately the same. But also, once we become overly engaged in satisfying others, the divine ways of Nature will open up in front of us, graciously inviting us to follow their curved roads that lead straight to our own mind and heart. For, when we resist for a long time to get close to others with an open heart and a childlike sincerity, the creativity of our behavior and

thought would get diminished as much as it would deflate after spending too much time in a laidback communion with others without ever turning our attention to the voice of our heart, quietly beating with its divine music deep inside of us. We have to accept our humaneness as much as to be aware that a blueprint for our divine mission on the planet Earth is written in the depths of our being. To become humanly same as everyone else, but still to know that ‘it is written in the law, ye are Gods’ (John 10:34) is what the Way of Love teaches us.

The co-creational thesis and the Way of Love explain how come the times in which the power of the self was boosted and brought to light were the same ones in which the spirit of communality was hiked up. It also explains how come neither communism nor capitalism succeeded in producing genuine congeniality and staggering individuality, respectively. Rather, while communism bred socially awkward weirdos, capitalism has created self-obsessed zombies, both of which are utterly unhealthy embodiments of their original dreams. This is so because the divine self and the social consciousness develop strictly in parallel, as the Way of Love predicates. The San Francisco hippie culture of the mid-60s provides a paradigmatic example of the rise of the spirits of individualism and collectivity in parallel in the domain of recent cultural history, whereas Ellen Willis, in that context, noted the following: ‘The power of rock ‘n’ roll as a musical and social force has always been intimately connected with the paradoxical possibilities of mass freedom or collective individuality. For its detractors, the emergence of rock ‘n’ roll signaled the convergence of two nightmares – the totalitarian leveling mob, destroying all hierarchy, distinctions, and standards, and the unleashed libidinal, uncowed, and unsublimated self’¹⁵⁰. Upon this invocation of the hippy culture, it is worth remembering that its downfall as a cultural force coincided with their neglect of the social element, of lively connectedness with the heart of the neighbor; or, as Doris pointed out, ‘Dropping out isn’t going to solve anything; the hippies tried it and look at them now’¹⁵¹. Hence, if we ever realize that joining the crowd awakens individuality in us in the most positive and congenial of lights, whereas resisting to dive into the heart of a social scene and staying at its perimeter alienates us from the very self that we have wished to preserve, we should remember that the Way of Love and the co-creational foundations from which its pillars have risen hide the answer.

The game of chess has often been considered as emblematic of the game of life. Bobby Fischer’s proverb ‘chess is life’, Ingmar Bergman’s movie *The Seventh Seal* and Agent Cooper’s nemesis’, Windom Earle’s saying that ‘all of life could be found in patterns and conflicts on the chessboard’¹⁵² all illustrate this fundamental likeness. Multiple similarities between the two might also confirm that the game of chess could be reasonably identified with the game of life seen through the prism of co-creation. For example, while the feedback between the creativity of two opponents facing each other determines the course of the game of chess, mind and Nature in their incessant dialoguing, which is far subtler and more clandestine than that of two hush lovers out on a moonless midsummer night, produce every detail of the world of one’s experience. It is only in the very beginning of these games that our development can be vaguely accepted as more crucially defined by our innate tendencies than by the guiding force of Nature. For example, it has been evidenced that mammalian creatures learn to see while in the womb with their eyes closed. Inner waves of neural activity spreading between the retina and the visual cortex may even form internal images; if so, they would be independent of any external impulses because the womb is completely deprived of light. In any case, this point speaks strongly in favor of the still frequently neglected subjectively creative aspect of visual and every other form of perception alike.

But even before we become born, our eyes open and the first visual experiences in touch with the surrounding Nature, probably reminiscent of a marvelous starry sea of silence, arise, slowly preparing us for the subsequent fireworks of perceptive stimuli. Thus we slowly enter the late opening, overwhelmed with an endless number of options to develop and probe Nature. As we continue to open, that is, to educate ourselves about the proper interactions between ourselves and the surrounding world, we rely a

lot on the written rules, just like we, sooner or later, need to learn the opening rules if we are to become serious chess players. After that, some become more inclined to express an aggressive, energetic and attacking style, but some, like me, prefer a slow development and a positional play, letting the opponent expand its wings, hoping that a stable defense will tire his attacking efforts and prevail in the end. The victory, then, if achieved, will not come as the result of the opponent's blunders, which the cheap tricksters of this world keep their sly eyes on and exploit as readily as they are made, but through a slow-moving positional play that always makes sure to protect itself in the first place and only then to gradually limit the opponent's range of movements, all until the room for an ending combination is reached, perhaps involving a beautiful sacrifice of the material for the sake of the triumph of the spiritual.

Finally, although the most beautiful and worshipped games of chess end in the explosive firework of an exciting midgame, some of them reach the endgame, the stage where the display of a mathematical precision in making moves is needed to ensure a good result. As this last phase of the game is reached, the era of a dizzying creativity reigning in the midgame is over and we could once again rigidly rely on already written rules to bring the game to a successful end. Less pieces remain on the board and the range of both possible and correct moves is significantly diminished. And this is all corresponding to the constructivist aspect of the human perception employed in the co-creational thesis. Namely, the frequency of repetitions of *a priori* assimilations of perceptive forms into objects is in our young days still relatively low, permitting us to believe that cars may turn into spaceships around the bend and that the angels may all of a sudden descend on us with their lustrous grace. But as we get older and these perceptive assimilations that are necessary for the coordination of our movements become more frequently reinforced, rigidity of our construction of the experiential world becomes higher, leaving us with less options to spontaneously notice a variety of different things in details of the world that are seemingly the same and unchangeable, but, in fact, always drawn anew. Or, as put into words by Kevin Kriescher in the opening lines of his book *Geometric Guitar*, 'Your aural imagination is constructed and constricted by everything that you have ever heard because experience is a platform as well as a prison; in revealing what is possible, it defines it'¹⁵³. To possibly hint at the same idea that every perceptual structure limits the very same view of the world that it has provided in the first place, Jean-Luc Godard toyed with the etymological curiosity that the Russian word for 'camera' was derived from the word for 'prison' in his movie *Goodbye to Language*. This message reminds us that every perceptive or reflective process involves subjective drawing of boundaries (as in the spirit of the philosophy of constructivism), during which our knowledge has the potential to be enriched, while limits are simultaneously imposed on it. Following this enlightening observation, the words from Kahlil Gibran's *The Prophet*, to which we will come again shortly, may begin to echo within the space of our mind: 'Your freedom when it loses its fetters becomes itself the fetter of a greater freedom'¹⁵⁴.

The co-creational thesis and the Way of Love tell us, furthermore, that each game of chess we play in life should proceed with our bringing forth the fine balance between self-centered inclinations to win and selflessly desiring to produce a wonderful piece of art out of the game, paying no attention to who the winning side will be. Correlating this view on the art of playing chess with excellence in the sphere of education, I often come up with a concordant 'middle ground' concept, which is that the most successful teaching efforts are neither teacher-centered nor student-centered, but focused on enriching the way between them. Since this way takes the form of knowledge, it means that should the teaching goal be the use of classroom to collectively pile semantic treasures on top of the mountain of human knowledge that is greater than you or I, the diamond and pearls will trickle down from it spontaneously, with no effort at all, filling the cup of both the teacher's and the students' intellects. Similarly, when our goal in chess becomes the co-creation of a beautiful game, regardless of who the winner is, we should

know that we have reached a stance that is, indeed, something special. I, myself, have been naturally inclined to one such selfless style in both chess and soccer and one thing that has helped me in this was my getting rid of any competitive thirst to checkmate the opponent or score a goal and installing instead the focus on simply playing the best possible or the most creative move in each position. This frame of mind has naturally obliterated any self-centered desires to win and anchored my consciousness to the grounds of a more sublime, selfless objective of, simply, playing beautifully, regardless of whether I emerge as a winner or a loser at the end of the game. Of course, it would be illusory to assume that one such stance implies a disregard or disrespect of oneself and one's formal opponent, that is, the co-creator of the game. For, this illuminative stance could be achieved and maintained only by looking at the world from the eyes of our opponent and making our moves marked with wishes for his enlightenment as well. That is, loving others as much as we love ourselves. Once we develop one such truly masterful playing style that, in the spirit of the karma yogic teaching of Bhagavad-Gita, balances an intrinsic antagonism with the collaborative spirit best described by walking in togetherness toward a mystical sunrise, a symbol of the beautification of Nature's works and wonders as the ultimate aim of our endeavors, the majesty of the Way of Love would imperceptibly dawn on us.

The co-creational thesis tells us that we should lie below everyone else, humbly and modestly, akin to a sea into which all the rivers run, but at the same time be exalted and sublimely standing above all others, like a purified and impalpable cloud of thoughts. It tells us that we should 'hang on to our own ego', as Brian Wilson advised, and never hesitate to declare ourselves the Son of God or the 'King of the Jews', in spite of the persecutions that the social powers and mainstreaming mediocrities will try to impose on us then, just as they did on the Christ, and yet to empathically see life from 'the eyes of another', having lowered our spirit like a magic carpet in front of other people's feet and transformed ourselves into a sea into which all the rivers of hearts of people surrounding us flow, embracing the words of the Christ, the very Son of God, in all his stellar aspirations: 'None is good, save one, that is, God' (Luke 18:18-19). As such, the Way of Love impels us to always travel back and forth, meditatively becoming One with our own heart and its starry dreams, and yet passionately running to give that whole heart of ours to others and become One with them. Further, the Way of Love allows for a magical phase transition to occur, which is through one's being so focused on oneself to emerge on the other side, the side of absolute empathy and altruism. Likewise, since the Way of Love is a two-way street, so to speak, this allows one to fulfill the Delphic oracle and discover oneself and one's deepest secrets by uninhibitedly identifying with fellow human beings.

George Berkeley, the father of the philosophical school of idealism, claimed that the falling tree does not make a sound if there is no one to hear it. But the modern ideals of deep ecology, as originally proposed by Arne Næss, offer a thoroughly opposite perspective, and that is the one of intrinsic values that endow every being in Nature, the full respect of which presents one of the highest interactive qualities that humans can achieve. The truth would be, as the co-creational thesis tells us, somewhere in the middle, between the extremes of idealism and realism. Illumination of the infinite world inside us idealized in idealistic worldviews and striving to foster self-realization for all creatures deducible as the ultimate ideal of the realistic, deep ecology system are married and brought to an inextricable state of oneness in the framework of co-creation. For, the world does indeed develop in accordance with our deepest aspirations, impeccably mirroring our spiritual states and growth from grimy ashes to shiny stars. However, we are not alone. The very same world that we inhabit is filled with many equally magically wishful souls whose starry dreams are heading to be fulfilled, sometimes in harmony and sometimes in conflict with ideals and desires of others. And then there is that tiny voice of God, our Creator, concealed behind the veil of immediate experiential appearances. The hypothesis of the co-

creation of the world attempts to unite all these creative forces into a single framework of fundamental interactions that pervade and define the world as we see it and as it is.

Despite its multidisciplinary, systemic character and applicability to a variety of relationships in life, the co-creational thesis is, as it seems, larger than life. It can provide a precious guidance in solving many problems that we may face. It may teach us how to become open in relationships with others, but without losing our sanity and a continuous reference to the heart of our own being. It shows us how to become self-responsible and self-creative, and yet susceptible to the influence of others. It may point us to the Way of Love, in which both the attitudes of destructive egotistic selfishness and of masochistically fertile immersion into the authoritative voice and look of the worshipped ones would be transcended by these sacred encounters with our eyes looking inside as much as outside. 'When you make one out of two, and when you make inside as outside, and outside as inside, then you will enter the Kingdom of God' (Thomas 22), as the Christ taught according to the Gospel of Thomas. For, if we imagine ourselves being given two worlds, two crystal balls to hold in our hands and nothing else, we could be sure that our mission would be to bring them into lively, exciting and eternally evolving unison. Similarly, given our simultaneous existence in two worlds, an abstract and a sensate one, we could be certain that our task is to achieve a state of entwinement between the two, quite like that depicted in the Tai-Chi-Tu emblem, whereby one would flow into and fertilize the other and *vice versa*, all until we do not know anymore whether inside is outside or outside is in, whether the world as we perceive it is but a moving image of our soul or if all the internal impressions are segments of a premade movie played by Nature in our heads and hearts so as to elevate our spirits onto higher grounds.

In that sense, an imbalance pervading the modern society can be also recognized by noticing innumerable creatures overly craving to express themselves without much treasures lying strewn across the fields of their minds and hearts. No matter how loud and superficially impressive they may seem, however, their words would eventually be blown by the wind. On the other hand, countless others, including my mousy self, carry an immense richness within their heads and hearts, but hardly find enough drive and courage to bring it out to the daylight of their social surrounding. Sometimes I think that if all the visions I bring forth on the screen of my mind were to be able to go out and dance in their joyful grace in front of others, it would leave an astonishing effect on the spectators. Having learned that film is an authentically co-creational, collaborative art form in which one's exact visions have no chance of being projected to the movie screen with a perfect accuracy, I have turned first to music and then to writing as my primary means of communicating these inner treasures to others. And I somehow believe that in moving towards accomplishing my writing ideals, step by step, I have reached the balance between enriching myself through marvelous thinking, feeling and aspiring from the inside and enriching the world on the outside. In that sense, I do not think of my inner world as superior in its richness compared to those of others. I am only blessed for having enough will and strength to plunge deeply into the art of bridging the inside with the outside. That is, to productively express myself in enlightening ways and make sure to cultivate the soil of my spirit with the qualities described by religions of the world. In the end, I feel as if these two aspirations – to beautify the world by kind, optimistic and moving words and to harmonize the inner world of emotions, thoughts and ideals – are deeply connected. The more we aspire in one direction, the greater the potential for succeeding in both ways will be with us as well.

Hence, despite the temptation, we should make sure not to become overly immersed in our inner world of thoughts and visions, which at times may seem far more exciting and fulfilling than the sounds and images of the outer world. But we should also pay attention not to become devoid of any inner landscapes that our being in the creative state enchantingly draws on the canvases of the heart and mind. The Way of Love points to the precise balance between living inside and living outside. As such, it

opens up the way for absorbing the subtle beauties of the world straight into the essence of our being. Through the underlying concept of the dialogue between Nature and mind giving rise to every detail of the world of our experience, the Way of Love shows us how we can recognize divine meanings in seemingly banal and meaningless details of the world. But the Way of Love also opens the path for the transfer of the true virtue in the opposite direction: from the seat of our soul to the world of external circumstances. Hence, it brings up the way to reach the treasures of our spirit, concealed underneath the deepest layers of our thoughts and emotions, and delivers them to the social daylight, so that all the others can use them as sources of intellectual and emotional enrichment.

At another place in the Gospels, Jesus says: 'Let your light so shine before men, that they may see your good works, and glorify your Father which is in heaven' (Matthew 5:16). These words similarly direct us to an enchanting realization that the beauty of our deeds in life should not point only to the liveliness of spirit dwelling in our mind and heart, but also to the divine wonders concealed within the foundations of Nature. As the Christ neatly points out, 'If I honour myself, my honour is nothing: it is my Father that honoureth me; of whom ye say, that he is your God' (John 8:54). This point of view neatly corresponds to the basic tenets of the co-creational thesis. According to it, our beings should ideally, with every action performed, implicitly point not only to the beauty lying in their own hearts, but also to the beauty of the world around. The purpose of these deeds should be an internal and external beautification at the same time, playing the role of the subtlest, yet the most powerful evolutionary drive imaginable.

Accordingly, the co-creational thesis also tells us that impression and expression, the inner and the outer enrichment ought to take place in parallel. Therefore, true healers, impressive speakers and masterful actors never forget about the importance of listening and absorbing the signs shed by the surrounding souls in synchrony with their pulling gorgeous acts. Arrogant attitudes through which one implicitly lets others know that there is nothing he could learn from them extinguish the compassionate pole of the Way of Love and, as such, could never lead to truly enchanting and enlightening acts. A constant receptiveness to novel ideas and worldviews infused with a childlike drive to learn and wonder over it all are prerequisites for progressive acting. The Way of Love teaches us how to become masters in both expressing our ideas in intelligible and inspiring manners and patiently and sanely listening, absorbing the environmental influences and using them as bricks for edifying the spiritual richness of our knowledge and being. 'Healer, heal thyself' (Luke 4:23) was proclaimed in the Bible; hence, not complemented with the attitude of learning, absorbing and feeling the benefits of encounters with others, our eagerness to help people would not be that fertile in reality. But the same argument is valid in the opposite direction as well. Namely, without nurturing the divine yearning to spiritually enrich others with every step we make, our attitude of building ourselves from the inside would be left to wither in the absence of the fertile ground of compassion and empathy. Wisdom requires compassion and care to flourish, whereas a truly blossoming empathy similarly requires the pillars of wisdom to support it at its foundations.

The co-creational thesis tells us that every quality in Nature is the product of a coupled creativity of two sides. For instance, every detail in the world of experience is our own inner creation as much as it is the creation of physical factors that could be approximated as independent of our own being. Every trace and sparkle of beauty that we ascribe to natural systems is intrinsically present in them as much as it is in the eye of beholder. Every quality measured within a scientific experiment presents a reflection of both the qualities of the measured system and the qualities of the measuring apparatus. Every scientific explanation reflects both the physical nature of the tackled phenomenon and presuppositions within the given conceptual system of reasoning. And so on. This also means that if two beings are involved in a creative act, whatever one of them expresses, no matter how intrinsically good or bad it may be, there is

always enough space for the other side to turn it into a beautifully orchestrated and harmonious whole by means of its own creative expressions. For example, if you sing a melody and I play an instrument in the background, no matter how dissatisfied you are with your performance, it is only a test for my imagination to find a fitting background that would give an aesthetic meaning to the way you have sung.

The co-creational thesis tells us that every human creature is like a stone. Take a pebble in your hands and you will see why. The origins of its shape, feel, color and all the tiny ridges and stripes on it are equally determined by its own crystal structure and by the effects of its environment. To explain them, we need to invoke neither more nor less than the interplay between these two sources of final properties, inner and outer. Likewise, human beings are equally shaped by the external circumstances and by their own nature. The systemic appropriateness of the co-creational thesis can thus be confirmed on innumerable examples and be said to cover practically all natural systems, from inanimate to animate matter, including numerous levels of cognition of the latter: perception, abstraction and reasoning. Within every aspect of our being and knowledge we are equally shaped by the environment and by our own nature. Only where Mind and Nature meet and coalesce does something that can be regarded as information by that very mind arise. Thereupon, the seemingly helpless nature of humans to become spontaneously shaped by the external conditions for growth and development is not something to be sad about, but something that should be profoundly appreciated. For, the harmony between being a faithful follower and a passionate leader, that is, between being passively adaptable and self-improving hides the key to a sustainable evolution that is an evolving sustainability. In the end, having one without the other cannot be imagined. The path of Love thus carries us through the fields of entwinement of self-withdrawn individuality and endearing and adorable looking at the world from the eyes of another.

The co-creational thesis tells us that the pathways of human destiny are outlined by our own aspirations and strewn with our wishes as much as they are determined by the Way of Nature. And just as the subjective and objective features of any experiential quality could not be discerned by any means, the same can be said for this interrelation of the way we would like our world to look like and the way Nature wants it. To illustrate this, I will refer to a game I have used to play ever since I was a kid. Namely, I would go to a basketball court and, just before taking a shot, with the ball in my hands, ask myself – and Nature, as it were - a question. The question could be about some of the qualities concealed within myself and directly invisible to me. But it could also be about the similarly invisible pathways of destiny or where the world as a whole was heading. As already stressed out, these two invisible wells – the epistemological, residing within the subject, and the ontological, residing in the objective nature of the world – can be named spirit and God. They can be imagined as two nodes between which we can stretch the strings of being that will come to vibrate with the beautiful qualities of life. Most important of all, they are inseparable. Both the subjective features of the observer and the objective features of the observed are intermingled within each and even the most elementary qualities in the world of our experience. As one of them grows in intensity and shining grace, so does the other. Hence, whatever the outcome of this questioning play, I can never be sure if the answer came from her majesty Nature, herself, or it was my sub-consciousness that guided my hand to shoot better or worse by means of its deepest anticipations and cravings. Likewise, whenever we hear a song that stuns us with a striking relevance and meaningfulness, the roots of which we are unable to explain, we are similarly incapable of precisely demarcating the extent up to which this meaning springs from our inner predispositions and attitudes from the extent up to which it is derived by Nature's gently placing this song on the way of our personal progress. These banal examples present, however, nothing but reflections of a basic situation in life wherein we can never untangle our inner assumptions about the evolution of our experience from the all-encompassing guiding force of Nature. For, our mind and Nature are inextricably entwined in every tiny detail of our experience.

The art of balanced soccer play in which one calmly pays attention to oneself and yet simultaneously moves in accordance with the actions and intentions of the surrounding players has been previously mentioned. The same is with basketball. We have to constantly maintain the composure, as if being on a practice, all alone with a ball and the basket. But if we were to do this while disregarding the presence of the opponent, we would be easily ramped or have the ball stolen. I have been, however, always inclined to exhibit the opposite imbalance. Namely, I would play quite satisfyingly while alone, but once my rival would show up in front of me, I would become blinded by his presence and the inner focus and calm would vanish. As a result, all my shots would be drastically less precise during the game than while practicing alone. And no doubt that this inclination of mine towards an extreme respect of others, entailing the loss of the inner silence and sanity, could have told me much about my tendencies to deviate from the balance of the Way of Love in many other situations in life. It indeed used to be my general problem that I exhibited too much respect towards others when facing them, often complying with their ideas and opinions without really meaning it. It all led the qualities of my performance of truly anything to greatly diminish in a social setting compared to what I was able to achieve in the moments of solitude, surrounded by the sense of a perfect intimacy between myself and the world. Therefore, we are free to say that it is balancing this inner calmness and sanity on one side with respecting others and choosing our moves in a constant feedback with the surrounding creatures on the other that presents the key to achieving not only the mastery in basketball, but in many other arts as well, including, of course, the greatest one of them all, the art of living. Needless to add, the balance that these thoughts about the Way of Love explicate could be applied in mastering any skill envisaged.

To get back to my questioning game of basketball played in solitude, I realized I would never be quite sure whether the answer I received by scoring or missing the basket came from Nature or it was my hand, guided by my subconscious intentions, as secretly as it can be, that felt inclined to shoot better or worse depending on my deepest aspirations in relation to the question asked. As is the case with the scientific descriptions too, where it is impossible to discern where the reflections of tautologies and assumptions end and where the reflections of objective features of the probed physical reality begin, the same applies in this and any other conceivable exploration of reality by means of human wonder. The creative forces of our assumptions and aspirations on one side and the nature of the physical reality *per se* on another are inextricably intermingled within each interpretation of ours. So is it with every sign on the path of our lives intuitively assigned by ourselves as amusing and essential. It may have happened to us to suddenly awake a sense of awe and mystery in front of particular experiential details, almost knowing that they present something enormously important and something that has to be remembered. As if intuitively sensing that they are the ones that will help us find the right way at a distant crossroad in life. But when we do come across these impressions afterwards, we could never resolve whether it was us that spontaneously conducted actions in order to make these impressions appear again or it was them that back then revealed the future paths of our destiny. Once again, where the subjective power of directing the natural events in accordance with our deepest wishes and desires ends and where the objective signs placed by the divine hand of Nature begin is impossible to resolve. Objectivity and subjectivity cannot be untangled. Each one of them is like Kant's thing-in-itself or the silent sound of one hand clapping.

Finally, the co-creational thesis and the Way of Love have shown us the way to dissolve all fears in both losing ourselves meditatively in the depths of our being and losing ourselves empathically in the eyes of another. One sign of our being estranged from the balance of the Way of Love is not being able to find tranquility, satisfaction and that quiet happiness in the lone moments of reflection and meditation. In spite of this, the Way of Love clearly tells us that we need to constantly nurture the glow of spiritual brilliancy inside ourselves in order to be able to bring light to the world around. Another sign

of our fall from grace of the balance of the Way of Love is becoming afraid of looking into eyes of other people. For a long time, I felt as if my innately humane tendency to spontaneously reflect emotions expressed by others made me uncontrollably change myself in face of varying external circumstances, as if I was a chameleon of a kind. And then, all of a sudden, an enlightening insight dawned on me. I realized that the only way to learn about myself is to empathically become one with other people. That is, to imagine the way the world looks from their minds. Which is exactly where the paradoxical beauty of the Way of Love lies: in the fact that losing ourselves in the moments of compassion and empathy with others makes us truly meet our own being, whereas being deeply immersed into our own unique core of existence from which all the creative acts of ours arise reflects the real compassion. For, only by being partly distanced from others is how we can give rise to inspiring acts that do not passively reflect others in self-losing moments of empathy, but make others evolve instead.

Paradoxically but true, the Way of Love tells us that by partially distancing ourselves from others we show signs of true love for them, whereas by making others the centers of the purpose of our own existence we truly look after our own being. To lose oneself is to become whole, but to make others whole we need to maintain the sane sense of oneness with the core of our being. The Way of Love is all about walking along the thin line that connects the desolate rows of meditative withdrawnness with the cliffs of a shining empathy. On one side of the Way of Love we are being constantly drawn to the inner essence of our own being, whereas on its other side we are being compassionately attracted to the treasures concealed within the hearts of others. Such a dichotomy has been marvelously depicted by the symbol of the crucified Christ with his hands stretched wide towards opposite sides. He has ever since been showing us the way to be one with the glowing heart of our self and yet to give that blazing heart wholly to others. This is how we set two nodes in place, between which the strings of the music of life can start reverberating with divine harmonies.

This combination of our surfing steadily on the waves of the silent music of our own heart and opening ourselves to the worldly flows of energy that guide us towards becoming one with all the details and creatures of the world predisposes us to shine forth with a phenomenal and irresistibly charming wisdom, childlike in nature and arising directly from the fertile blend of Wonder and Love that this entire book has implicitly talked about. Prayerful closeness of the winged hands of our heart, symbolizing the inner withdrawnness of our being and our constant reference to the depths of our mind and heart, enables us to explore the objects and beings of the world with the unassailable charms of pure Wonder. But an open spread of these same wings, symbolizing our readiness to give the carefully catered treasures concealed with the inner spheres of our emotions and thoughts to others, enables us to swathe the world with the blessing of the waves of Love. For, the concoction of Wonder and Love has ever since been the ultimate fuel for the spin of the majestic wheel of the evolution of knowledge and life.

Life as a meeting

‘They showed me their trees, and I could not understand the intense love with which they looked at them; it was as though they were talking with creatures like themselves. And perhaps I shall not be mistaken if I say that they conversed with them. Yes, they had found their language, and I am convinced that the trees understood them. They looked at all Nature like that - at the animals who lived in peace with them and did not attack them, but loved them, conquered by their love. They pointed to the stars and told me something about them which I could not understand, but I am convinced that they were somehow in touch with the stars, not only in thought, but by some living channel’

'When you walk through a storm
Keep your chin up high,
And don't be afraid of the dark.
At the end of the storm
Is a golden sky
And the sweet silver song of a lark.
Walk on through the wind,
Walk on through the rain,
Though your dreams be tossed and blown.
Walk on, walk on
With hope in your heart
And you'll never walk alone,
You'll never walk alone'

Rodgers & Hammerstein, *Carousel*

Perfectly consistent with the co-creative metaphor of the Way is Martin Buber's ultimate philosophy in which true religiousness is represented through the metaphor of meeting. The concept of co-creation suggests that all experiences occur at the intersection of subjective and objective existential spheres, implying that all valuable and inspiring social qualities similarly arise at the cognitive boundaries that unite/separate individual beings. Setting oneself into relationship, opening one's heart and mind towards others whilst being carefully immersed into oneself presents, therefore, a most genuine religious attitude that a being can adopt. This is so because neither being immersed in one's inner world nor being carried away by the streams of thought and emotion flowing through another, but communicating equilaterally, plucking the strings that connect our hearts, moving back and forth along them, from the high tones to the low and back, being alternately one with one and one with another, is the way to heal and harmonize our ailing spirits. The conditions of dialogue and facing each other are, correspondingly, the wheels of the evolution of human spirit.

After all, as I have claimed on innumerable occasions, all the insights required to bring us enlightenment are derivable from the interaction between I and Thou, if I were to use the polarity proposed by Martin Buber. Everything that we need to learn in this life rests in the tiny threads that link our heart right here, right now, with the creatures that are nearest to us. It is following these threads and plucking them gently that will transform us into an angel on Earth, a starry-eyed silhouette that leaves the trail of stardust of inspiration and beauty in the wake of the subtlest of its moves. It is for this reason that I, an aspiring authentic anarchist, walking in the footsteps of Lao-Tzu, having no wish to rule over anything or anyone, once gave myself a vow never to think or talk about politics, economy or any other discipline that involves governance of social entities. I have not discussed religion in a casual conversation either practically my whole life, but for a whole different reason, that is, because I find the crudest spiritual components of our beings more intimate than even the most intimate physical aspects of our lives and, therefore, consider questioning one's sexual life, for example, more appropriate than questioning one's religious beliefs. However, this abhorrence of nurturing worldviews that are intrinsically about governing over someone or something stems from a whole different corner of my mind, the one that worships political anarchism and mistrusts anyone who associates success with the manipulation of social wholes or sees an individual as a reflection of a nation, a class, a caste or any other social group. For this reason, if I had to pick one single reason why the worldly souls suffer so much today on the psychological level, it would be their focus on the social systems that they are a part of on the account of the neglect of the immediately available interactions with the adjacent creatures. I would not be surprised if our ignorance of the infinite beauty creatable at this most personal interactive

level even stands at the root of our collective fall from grace described in the Bible (Galatians 5:4). For, should these interactions be harmonious, the positive influence would spontaneously spread from us to higher and more complex organizational levels, without our even trying to make a change thereon for better. On the other hand, we could spend a lifetime believing that we would be better off if this or that way of social governance was implemented and only grow into a resentful conspiracy theorist or an irrational labeler of others with invisible stickers carrying names of various social groups, without ever discovering the secrets of our heart and the hearts of those dearest to us, squandering this precious thing called life instead of celebrating the wonder and love that it awakens in us with each passing moment. I have supported this principle in my head by the realness I ascribed to the idea of love and by the elusiveness I recognized in the notion of altruism. Namely, if we let ourselves be guided by the deeply personal and directly interactive idea of love, our life would indeed turn into a wonderful fairytale, even though we may be completely ignorant of the political forces that co-direct our destiny in the play of life. But should we let the notion of altruism impose itself as a guiding star on the paths of our thinking and acting, we would almost certainly become a feigned and ultimately dissatisfied persona that always needs a reflection, not a natural impulse or emotion, to act contently, something that never yields a good result from the perspective of behavioral aesthetics. To refocus our creative attention from the distant domains that may nevertheless be out of our reach and onto flourishing of our bodies and spirits by erupting with joy, beauty and other stellar energies as we come across others is thus the lifesaving path I envisage for humanity in my clairvoyant daydreams.

From this perspective, the way in which one approaches others in communication mirrors one's core level of religious progress. However, although one's eyes, feet, facial gestures, voice and the rest of the body language present viable external cues that enable us to judge about the latter, we should always keep in mind that an inner sense of devotion to another is so powerful as to be able to fully eclipse what may appear to an outside observer as a disinterested encounter of one with another and an exceedingly low level of engagement in a social interaction. After all, if behaviorism fell flat on its face in one of its aspects, it is certainly the one which presupposed the ability of an external observer to perfectly precisely judge about the internal states of the observed persons based on their behavioral cues. Hence, we should never cease to believe that body language holds vital signs that reveal the extent to which one lives up to Buber's ideals of supreme religiousness, always turned to face gods in creatures closest to us, while an inner luminosity that only the subject being can experience and know of presents an equally vital aspect of the given ideal. For, whatever the object of our inquiry is, the co-creational thesis dictates that it is always both insides and outsides that our attention ought to be paid to.

A short exercise can be performed with the purpose of learning how to find and maintain the cognitive attitude that positions us exactly at the middle of the 'way' which extends between ourselves and the beings we communicate with. Try, for instance, to pay attention to your senses only. Be aware of your eyes, your breathing, heartbeat and correct posture. Do not let anything else deflect your attention. After keeping this self-oriented attitude for a while, you might notice how everything that is not merely you, so to say, starts to fade into perceptual background. This is when the right balance of the perfect meeting stance and the Way of Love is exceedingly shifted to the subjective side. In that state, one is more prone to exhibit manipulative attitudes towards others at the cost of reducing one's predisposition for empathy and spiritual unison.

Now, watch carefully what will happen when you shift your attention to someone else in your surroundings. You may easily completely forget about paying attention to yourself only, and become immersed into their actions. That is not inherently bad and undesirable, however. In fact, it demonstrates the basic need of human beings to spontaneously become empathic and compassionate in face of another being. However, an undesirable side of this innate emotive and cognitively connecting predisposition of

ours is that we can easily become slaves of other people's intentions at the cost of neglecting the inner voice and mission of our own being. And when we find ourselves in this pliable state, we may know that the balance of the Way of Love has now shifted towards the other extreme, that is, the objective side and the heart of intentions of others.

In order to find the right balance, the best way is to start from the meditative orientation towards oneself as in the beginning of this exercise, and then to slowly shift our attention until we reach the middle of an imaginable 'bridge' that connects our self with the essence of the encountered being. Leaning onto a suggestive mantra, following the rhythm of our breathing with the music of *so-hum*, or playing a melody that enchants our heart and harmoniously guides the flow of our thoughts may present a few out of many possible ways to firmly anchor a part of our attention to the inner domain of our being and thus prevent its complete dissipation once we get to face another being. And when we find this 'middle way' attitude, we may notice that we retain our introspective focus and sane control of behavior, but are also able to carefully and intimately observe and listen to the needs of the faced beings. Jean-Luc Godard found figures in Édouard Manet's paintings so mesmerizing because he thought that from Manet ceased the era of figures, including da Vinci's lady with an ermine, Vermeer's girl with a pearl earring and Corot's woman with a pink shawl, that are 'me, firstly me, then the world... because the inner truth remained more subtle than the cosmos' and began the era of figures that 'think... because the world, finally, the inner world joined the cosmos'¹⁵⁵; when we find ourselves resting on this paradisiacal middle way, our thoughts would indeed be halfway between the depths of our soul and the Universe as a whole, thus mysteriously enrapturing anyone in sight. As for our moves, they would flow with captivating integrity through space, but would also give off the spirit of reaching out to another, leaving no soul in our proximity indifferent. As such, they would neither drag the viewers into the whirlpools of one's inner world with a sole focus on oneself nor would they flatter the nearby egos affectedly and awkwardly had they been submissively oriented towards others only. For, in this state of mind we are neither solipsistic ignorers of emotions and desires of others nor passive copycats of behavioral and intentional attitudes of the faced beings. Moreover, by residing in this state, we are bound to appear to others as mystically remote, untouchable in essence, yet strikingly intimate, as if every gesture of ours arises from unfathomable cosmic depths, but is directed to them and them only, unlocking the deepest gates inside of their hearts with no effort on our behalf. In such a manner, these nearby souls would be spontaneously impelled to levitate above this terra nullius that stretches between I and Thou, the termini of our attention, being the middle ground wherefrom all the creative fireworks of our beings originate.

In the beginning, our attention would spontaneously shift to one or the other side, but after being persistent and devoted to achieving and maintaining this balance, it may become a natural reference point for our being, spontaneously adoptable on all occasions. Initially, the balance would be easier to achieve while we remain in a static and observational posture. In turn, it would often dissipate as soon as we engage in any movement or action, in a similar way as the transcendental awareness of a Yogi novice gets attained in an *asana*, but then gets lost quickly as one begins to drift through the world. However, as we become more skilled over time, we would realize that this balance comes natural to us even when we are in a dynamic state of motion and that it does not get dispersed as we interact with others. We could subsequently attempt practicing this art of warm and respectfully sane meetings not only with humans, but with other living or nonliving objects: starry skies, porcelain cups, flaming marquees, cockatoo birds, juniper trees, jasmine flowers, crimson lampposts, tranquil seas, Monet's paintings, Cocteau Twins' songs, and, in fact, everything else in this infinite Cosmos. That is because as many things we could learn from living things, we could learn from inanimate matter too. The world is filled with mysterious messages that whisper to us the deepest secrets about our self and our spiritual ways.

As we fluctuate from one to the other extreme, like a wobbly acrobat on the wire, we would notice that, one moment, as we begin to fall toward the side of the self, everybody around us starts to appear as if being promoted into a puppet attached by strings to the puppeteer of our ego, leaving us stranded in the state of non-empathic iciness and social disconnect, but then another moment, as we approach the fellow humans too closely, we become a puppet, ourselves, ‘sewn into submission’¹⁵⁶, feeling as if we ‘walked into a scene that is somebody else’s dream’¹⁵⁷, wholly passivized and drained of the drives to express in illuminative ways. In both cases, a sense of imbalance will start to collect, like a cumulonimbus cloud, over our head, calling, like pain responding to an affliction imposed on a body, for its remediation and restoration of the balance between leaning toward oneself and leaning toward another, upon which the skies of our mind will regain transparency and a clear view of the sun and other stars, only ephemerally overcast by the cirri of light thoughts.

And finally, be aware that hopelessly falling to either one of these two sides does not present a dire practice in itself. In doing so, we are really like babies learning to walk. They need to fall flat on their noses every now and then before they eventually learn how to maintain balance during walking. And just observe them carefully. They never lose patience after these falls; a loss of faith and hope in their eventual success never become written on the lively walls of their faces. They brightly look forward, sensing and believing that someday, sooner or later, they will achieve this balance and show the world the divineness lying dormant within them. For, all those fallings to the opposite sides of the Way of Love, in the end, increase the value of the balance itself, just as pain and suffering that are the parts of life magnify its greatness, so that, when finally attained, the balance would be significantly more fulfilling and meaningful to the balancer. It would shine forth with the fullness of both sides merged in this perfect encounter between the self and the fellow soul.

‘All actual life is encounter’¹⁵⁸, Martin Buber proclaimed in an attempt to sum up the heart of genuine religiousness in a handful of simple words. Or, as pointed out by the Polish theatre director, Jerzy Grotowski, ‘If I say life, I mean others, other people’¹⁵⁹, calling not only for an utterly altruistic perspective on life from which otherworldly surges of creativity are free to materialize, but also for the ceaseless performance of the act of reaching out to another and to another beyond that another and so on, for only in such a way can the one reaching out and those reached out to spiritually grow. And indeed, so long as we believe in the importance of our sincere and profound encounters with others, our desire to live and learn will be preserved. ‘Face things’¹⁶⁰ was thus a lifelong motto of the French pianist, Marguerite Long, a verbal substantiation of the drive to overcome the timid tendencies of ours to cocoon our spirits away with standing bravely before another with a bursting heart and engaging in an exchange of creative impulses whereby the enrichment of one another through equality suggested by the Way of Love is achieved. Keith Jarrett’s *Facing You* was also an ode to the art of standing face-to-face with the divinity that another soul is, whereas Marina Abramović’s memorable exhibition at the New York Museum of Modern Arts, involving her sitting for three months and wordlessly facing one human creature at a time seated across her, served the same purpose of highlighting the philosophy of life as a meeting. According to it, the most mellisonant words are only words and the holiest deeds are only deeds, whereas the ultimate goal is to build a spirit shining like a sun as it stands before another, always turned toward a fellow soul and eager to meet it and face it with love, in all the magic that these moments bring. From this perspective, not only the genuine lust for life, its fountainhead and source of energy, but also the true religiousness of our beings could be identified with our faith in endless sources of enrichment that lurk in the surrounding human beings. ‘The mysterious is man, the long irrational lines of spiritual life, love, salvation... man is not only a social being; he is also divine’¹⁶¹, says Federico Fellini, and if we approach the encounters with fellow humans with one such awareness only sky will be the limit in terms of our being washed by the sunshine of the infinitely beautiful spirit hiding underneath

the mechanical tics, the thorny briars and the barbed wire fences of their parsimonious surface. Even though humans can behave in predetermined and fake manners, it is only a matter of how one is going to initiate the process of unlocking their behavioral codes and making their heart shine honestly to the world. For, as pointed out by the British film director and actor, Amber Sealey, ‘Almost every human being is fascinating and if you find the right buttons to push, they’ll open up and give you something nice’¹⁶². The complexity of this grand endeavor of unleashing life concealed behind the dams of conventional behavior and various timidities underlying it, however, becomes most obvious when we realize that our sending out the tidal waves of life toward a person locked in such rigid behavioral modes is most likely to provoke a ‘fight or flight’ response just as well as assuming a stance of complete closeness will have no effect either. In reality, there is no recipe on how to set life free from within such creatures who ‘lock up their spirits, drill holes in themselves and live for their secrets’¹⁶³ except to tread the moderate path that speaks that language of the creatures in question and invokes sympathy from them, but also surprises them with the mind-blowing energy of life erupting from us. This path, needless to say, is one out of many extensions of the Way of Love.

This process of liberating the genie of divine spiritedness from the bottle of their selves, a mere teardrop from the ocean of spirit that enfolds us all, is analogous to the dissipation of all the rigidities that intrinsically insincere adulthood has collected in them and the restoration of the spontaneity of a child dormant somewhere deep inside of the hub of their hearts. Speaking of children, we should remember that looking at any given child for long enough would bring us to conclusion that our seeking of the middle way that the Way of Love is starts from our earliest age. No parents would disagree that their babies typically face away when they are being smooched, cuddled and talked to from the closest proximity, whereas they openly crave their attention when they are being left alone in a room or played peek-a-boo with from the distance. It is as if becoming symbiotically united with their guardian even for a second or so immediately gives rise to an impulse to restore individuality and set on an adventurous exploration of reality, all alone, while finding oneself alone, in turn, turns the sails of their spirits towards the winds that would push them back to a state of unity with the creatures that they have bonded with. Therefore, no matter what, we should know that our deepest insides have been fine-tuned to search for this delicate balance whereby our attention would be focused on our self and on another to the same extent, enabling the transfer of impressions and expressions to and fro with ease and grace.

Countless are, therefore, ways by which we could practice the art of settling our attention upon the middle Way between the essence of our self and others. Another practice worth mentioning may be carried out even in the moments spent alone. Whether we sit in a restaurant or walk in the open air, instead of being drowsily immersed in our thoughts with our head bowed, we can always imagine a lighted and divinely graceful being sitting in front of us or walking with us, similar to what Jimmy Stewart had seen in his imagined rabbit-friend Harvey. To highlight the aesthetic benefits of having an imaginary friend by oneself on a solitary walk, Audrey Hepburn, asked what the secret of her beauty is, said the following: ‘External beauty is the reflection of the beauty inside. To have beautiful eyes, see goodness in others; to have beautiful lips, utter only kindness; for beautiful stature, walk aware that you are never alone’. And when this imaginary companion that we walk with, talk with and keep in sight of the eye of our heart at all times is God himself, that is, our vision of the uttermost goodness and the most sublime beauty, then we can expect all our acts to begin to radiate with unexplainably captivating aesthetics. This may be the reason why the prophet Mohammad claimed that the way to attain *ihsan*, one of the three most essential Koranic qualities, known also as ‘doing the beautiful’, is to ‘worship God as if you see him’¹⁶⁴. And if we recall that not only does the most monstrous and destructive human behavior arise from a sense of social exclusion, but the oppressive spirit of aloneness of the modern age also feeds insolence and bitterness in us, producing an epidemics of unhappiness albeit overabundance

of things, the end to the benefits of having an imaginary friend, be it an image of god, a beloved being treasured in our memory or a white rabbit, will be nowhere near to be glimpsed.

Facing someone presents an essential aspect of human experience, and when our focus becomes divided to paying attention not only to ourselves, but to another being as well - even if not real - we approach this great cognitive balance that spontaneously radiates with harmony, creativity and love with giant leaps. Furthermore, in light and purity in which we imagine this other being, we are beautifying and purifying our own being as well. And conversely, the darkening of our being and the befalling of great ills upon it begins the moment we helplessly begin to see nothing but vileness and corruptness in the fellow humans. For, the wiser we are in knowing the essence of our being, the more productive we would be in acting for the benefit of others, and *vice versa*: the larger the extent to which our heart is filled with devotion to help and sanctify others, the brighter would be the path that leads us towards knowing our self. Antoine Saint de Exupery realized that 'Love does not consist in gazing at each other (one perfect sunrise gazing at another!) but in looking together in the same direction'. Yet, I believe that it is the balance between facing each other and looking outwardly in the same direction that presents the mirror of a healthy relationship. More important than anything, this is not to say that we should ever stop facing the depths of our soul, neither when facing others nor when watching these beautiful sunsets with hand in hand. To support some splendid palaces of being and knowledge, the pillars need to be positioned at a precise distance between each other, neither standing too close nor too apart.

Maybe Jovan Dučić, whom I regard as the finest Serbian poet, would object to this perspective, reminding us of his dichotomy of two types of ultimate cognitive fulfillments in life: cosmic joy and humane happiness. Whereas the former could be associated with the prime wonder in face of the mystery of life, and as such to the genuine communication with Nature and God, the latter is something that arises in form of satisfactions brought about solely by human-to-human interactions. However, if we inspect this division more closely, we may come to their fundamental entwinement. To do that, we may simply refresh our memory of the Christ's two major commandments: loving God and loving our neighbors (Mark 12:29-31). As the Way of Love propounded herein suggests, they seem to reinforce and not suffocate each other. If we devote our lives to following the path of incessantly drawing the patterns of eternal beauty in front of our eyes, sooner or later we would realize that only through our deep ethical desires to live for the sake of helping others could our ideals be attained. But certainly, the argument could go the other way around as well, as truly making people around us happy is possible only if we constantly cultivate the core of divine aesthetics within us. As Ludwig Wittgenstein observed long time ago, 'ethics and aesthetics, they are one and the same'¹⁶⁵. For, an aesthetic appreciation of works of humanity and Nature alike depends on the values we cultivate at the depths of our being, which are, ultimately speaking, of ethical nature, and which are, furthermore, subject to change with our being open to profound and intensive aesthetic experiences. In that sense, ethical and aesthetical facets of our beings are inextricably looped. The way towards the summits of heavenly goodness is paved by the recognition and creation of heavenly grace and beauty in our worlds, and *vice versa*.

But still, recall that the former was proclaimed as the first and the latter as the second commandment, as was in accordance with the theological roots of Christianity. This asynchrony, just like any other in Nature, could be a wonderful topic for enriching conversations and contemplations.

For, indeed, oftentimes in life we see that a balance needs to be tipped and a perfectly straight line between two points skewed to accommodate a third one if the conditions that favor its prosperity are to be reached or maintained. For example, to explain the low content of iron in rocks collected from the Moon, the origin of this astral body in a collision between the early Earth and another planet, nowadays known colloquially as the Big Whack, was proposed. But had this crash happened head-on, the Earth would have been smashed to pieces. Thus, this primordial clash is expected to have occurred at an angle

and that is how the Moon, our only natural satellite, which has provided a crucial gravitational counterbalance, stabilizing the axis of the Earth's spinning and preventing cataclysmic climate changes in the past, came to being. Needless to add, even if the Big Bang distributed all the cosmic matter as we know it without breaking the symmetry of a perfect sphere, no coalescence of hydrogen atoms would have taken place and neither stars nor galaxies, let alone habitable planets sustained by the starry light, would have formed.

Soccer fans and enthusiasts may tell us now that the revitalization and rebirth of the Brazilian soccer school and its sudden ascent to the top of the world began when Flávio Costa, the coach of Flamengo in the early 1940s slightly rotated the inner square of the then popular W-M formation and made a parallelogram out of it, disrupting the perfect reflection symmetry in favor of a slightly more offensive left side and a slightly more defensive right side, as if he was guided by the division of our brains into their analytical and expressive left hemispheres and more enigmatic and introverted right ones¹⁶⁶, or the fact that the most attractive faces are typified by a high degree of bilateral asymmetry. Correspondingly, he instructed the Argentine right half, Volante, to stay back, the role which he played so well that his name is nowadays in many parts of South America synonymous with 'a defensive midfielder'. In contrast, Costa pushed a bit forward the left back, Jayme, and applied the same principle to the two inside-forwards, making the right one, Zizinho, play from the deep and the left one, Perácio, cutting infield from the wide¹⁶⁷. Although this idea was elegantly exploited by the Uruguayan side in the decisive game of the 1950 World Cup, with the left half-back, Danilo having been pushed forward more than Bauer on the right side, leaving too much space behind him and making the left full-back, Bigode unable to cope with the right-wing bolts from legendary Ghiggia, preventing Brazil, then coached by Flávio Costa, from winning the tournament on its own soil, despite being the downright favorite, it presented the turning point for the Brazilian soccer, the darkest hour before its dawn and that magical moment that makes one's heart burst in tears, triggering the onset of a renaissance in its hub. For, only eight years later this idea proved fruitful by earning Brazil the Jules Rimet Trophy sought since 1930, soon after which it established itself as a mainstream element of the national team's concept of play. Thus, from the Brazil national squad of the late 1950s, whose placing on an imaginary scale would make it topple to the left because of Pelé, to the one of the early 1960s, with Garrincha on the right wing playing far ahead of Zagallo on the left, to the one of the 1980s, whose attacking efforts usually leaned to the right, the side to which Eder on the left wing, Socrates in the centerfield and Zico as the inside-forward all gravitated, to those of the late 1990s and 2000s, with the backs, Kafu and Maicon on the right being ahead of Roberto Carlos and Michel Bastos on the left, respectively, this breaking of mirror-image symmetry has been an integral aspect of the Brazilian soccer school. Now, some may say that this scheme has been successfully applied on numerous prior and posterior occasions, with the examples including the Arsenal team of the 1930s, Wolverhampton Wanderers and the England national team of the late 1940s, Arrigo Sacchi's Italy at the 1994 World Cup, with four offensive midfielders in 4-1-4-1 consisting of Berti and Dino Baggio playing on the right flank behind Donadoni and Roberto Baggio on the left¹⁶⁸, and the Man United squad that won the Champions League title for the season 1998/99 in a thriller against Bayern Munich I watched in an Arabian hookah parlor in the Hague, having David Beckham, not so fast but with a superior passing ability, playing on the right flank, far deeper than shorter, lighter and more agile Ryan Giggs on the left. Nine years later, when this club became the European Champion once again, Sir Alex Ferguson gave Giggs a more central, playmaking role, this time on the right wing, and placed more penetrative Cristiano Ronaldo ahead of him on the left. Another prominent example in my head includes a victorious virtual team of all times I conceived of in 2010s, having Lilian Thuram in the back and Johan Cruyff ahead of him pushed forward on the right side more than the left back, Claudio Gentile and the left inside-forward, Gary Lineker on the opposite side of the

pitch, allowing Thuram to adopt a more offensive role, like the one he exploited in Juventus and the French national team and Gentile to take on the role of a skipper to a greater extent, while also allowing Cruyff and Lineker to be false 9 and 10, respectively, switching positions on the pitch and confusing the opponents as such. Finally, the extent to which deviations from the perfect bilateral symmetry is common to team formations on the soccer pitch comes from the fact that even in the most classical 4-4-2 lineup one would expect the Beckenbauerian number 5 to play a more central role than its partner in the central defense, the number 4, the number 11 on the left flank to be pushed a bit more forward than the number 7 on the right, the creative number 8 to sit ahead of the more defensive number 6 and, of course, the number 10 as a true *trequartista* to play deeper than the classical striker, number 9. Modern soccer schools have overwhelmingly accepted the benefits of these asymmetric formations, having understood that the mirror-image symmetries on the pitch lack variations in the attack and are also defensively rigid¹⁶⁹, susceptible to allow the balls to pass through the defensive lines whenever these lines resist to be broken and dynamically shifted in response to the movement of the ball and the players of the opposite team. One recent example of this formational asymmetry comes from the Ajax squad that demolished by surprise Real Madrid 4-1 at Santiago Bernabéu in the Champions League quarterfinal game in 2019, with the Serbian forward, Dušan Tadić, albeit the central of the three attacker, sliding to the left so as to attract defenders to him and thus permit the Argentinian left fullback, Nicolás Tagliafico, to move forward when in possession of the ball. To compensate for this imbalance, the Danish midfielder, Lasse Schöne would provide a counterweight on the deep right side of the midfield, thus forming a diagonal stretching from him on the right, through Donny van de Beek in the middle and all the way to Tadić on the left¹⁷⁰. The reason why this dynamic breaking of the mirror symmetry has the potential to make the opposing team more susceptible to attacking combinations likely ties to the concepts of the overload and the underload, so heavily used in modern soccer. To overload one flank by having the players of one team outnumber those of the other team so as to create gaps on the other flank and exploit them via fast ball transfers is, thus, one of the essential tactical principles on the repertoire of today's soccer coaches, particularly those who believe in extended possession. In fact, a number of sports science studies have come to conclusion that training sessions involving unbalanced situation, where one side, for example, has more or less players on the field than the other, create more opportunities for learning and stimulate the development of kinematic intelligence better than their balanced counterparts, and coaches in team sports resort to them regularly in their practice¹⁷¹. In any case, with this subtle tweak of the mirror-image symmetry, the slow process of divorce of the Brazilian soccer school from its British and Danubian heritages began and after a series of underachieving results, grounds were finally found for the proliferation of fantasy, ingenuity and individual freedoms that nowadays traditionally adorn it, leading to an array of triumphant performances at the World Cup stage too. Like all prolific grounds in life, a middle ground this was between the two extremes: (a) the inherent distrust of teamwork and the unrestrained freedom and flair to which the Brazilians were naturally predisposed and (b) the traditional English insistence on servitude to the tactical demands to such an extent that 'players, rather than being treated as individuals whose tactical responsibilities were to be negotiated within a basic framework, were rammed into pre-designated holes'¹⁷². For, when we push the sterilely ordered things in life out of balance in an attempt to restore their creative potency, we should remember not to go too far because the right blends of symmetry and asymmetry are always the keys to producing winning streaks in life.

This musing on the benefits of tactical asymmetries on the soccer field can be topped with what creative central midfielders have known very well: namely, the best place to anchor oneself if one wishes to pass the ball forward and assist in a goal is not on that mirror line that extends from the center of one goal to another, but just a bit off of it and toward the flank, being yet another example of the

benefits entailing the deviation from the state of perfect symmetry. In general, from the offense perspective, the midfielder player receiving a pass is ideally positioned neither in the center of the field nor wide on the wing, but in the half-space in-between because this is where the balance between the obscured field of vision and the proximity to the zone of play is thought to be ideal¹⁷³. A player positioned excessively centrally usually receives the ball facing backward, which does give him a solid position to shield the ball from the defender pressing him, but on the contrary, it also limits his field of vision and makes a forward pass difficult to achieve¹⁷⁴. For this reason, positioning in the space between the mirror plane of the field and the sideline, neither too deep nor too wide, is considered ideal for making a blindside run and receiving the ball facing forward, with a better body position, with a forward momentum and with many more progressive options possible. If we now remember that dribblers rushing with the ball directly toward the opposing defender always move diagonally from him, whereas the defenders, themselves, know that the best way to tackle the ball from the opposing attacker is to approach him at an angle, not facing forward, it would yield yet another incentive to move sideways, away from the central line of balance if we are to be fruitful in most things we do, as well as to look sideways, not only straight ahead of us, if we are to collect the most precious sensual stimuli and prevent them from falling through the bottomless well of inattention inside our psyche and into eternal oblivion. Besides, if Maradona scored the so-called goal of the century in the game between Argentina and England at the 1986 World Cup by making 44 steps and 12 touches with the ball, all with one foot, his left, running, as expected, through that space lying halfway between the mirror plane and the touchline, there is no need to doubt that we could accomplish similarly fantastic feats in countless other domains of life by renouncing the imperative of symmetry and pursuing the oblique, one-sided path, to which equilibrium is as foreign as Jupiter's and Saturn's rains of diamonds.

In fact, if we pay careful attention to the way we see, we might recognize that usually one eye of ours has the dominant role in our vision, while the other one is merely following. This slight imbalance can also be correlated with the dichotomy between the two brain hemispheres, one preoccupied with analytical processing, and the other one devoted to intuitive attentiveness and aesthetically pleasing recognitions. But do you remember how we could determine the dominant eye in our vision¹⁷⁵? It is easy. Simply find an angle in your surrounding; say, the corner of a room, for instance. Look at it, and while looking, cover first one and then the other eye with the palm of your hand. One eye will keep looking at the angle, but the other will not. The former would be your dominant eye. The point is that whatever the object we focus onto, only one of our eyes looks straight at it. What the other eye does is best summed by Paul Klee's adage: 'One eye sees, the other feels'. By not looking straight at the object in focus, this other eye actually improves our focusing abilities, which sounds relatively counterintuitive at first. Likewise, the same subtle, but perfectly functional imbalance could be regarded as occurring in the prior example and as inherent to the Way of Love in general. Something that distracts attention of the poles involved in perfectly balanced facing one another thus presents an opportunity for the dynamic evolution of their interaction. This is why Socrates paraphrased Homer's adage, 'When two go together, one sees before the other', in an attempt to tell us that philosophy is evolvable only through a dialectical dialogue; 'for all men are then more resourceful in action, statement and thought'¹⁷⁶. Lao-Tzu meant the same when he stupefyingly asserted that 'one gives birth to two, two gives birth to three, and three gives birth to all things' (Tao-Te-Ching 42). The disruption of the state of perfect symmetry of two agents mirroring each other and provision of the conditions for the arrival of the third, such as that marking the transition from hydrogen molecule, the most primitive one in the Universe, to water molecule, whose fascinating properties spring from its pyramidal shape and the corresponding electric charge polarity, is thus an obligatory act to perform on behalf of all creative spirits. This point of view in favor of tipping reflections out of their state of sterile perfection might also reflect the astonishment that developmental

biologists feel in face of the phenomenon of gastrulation, that is, the moment at which an embryo is reorganized to give rise to three separate germ layers – ectoderm, endoderm and mesoderm - from which all tissues and organs will form. This astonishment is neatly captured in the words of Lewis Wolpert: ‘It is not birth, marriage, or death, but gastrulation, which is truly the most important time in your life’. This is also the key to understanding the mystical secret of the geometric forms of triangle and pyramid, including all the complications that they induce with their prime emergence during a rise in geometrical complexity. Also, two points on a circle’s circumference are not enough to define it unequivocally, but three are. This means that only after we place three connection points on the surface of the ball, such as this blue planet where life thrives is, we may visualize its profile in space. Speaking of life, the reasons behind the incredible versatility in properties that water molecules exhibit and which are responsible for conditioning the existence of the very life on this planet may be associated with their pyramidal dipolar structure. Communicational trio presents a basis for an inexhaustible source of enriching progressions in communication. Or, as Andy Warhol once observed, ‘two’s a company, three’s a party’. And indeed, scientific analyses are frequently getting pervaded with unsolvable complexities upon the addition of a third entity to a ‘party’ of two. For example, the three-body problem relates to analytically insolvable nonlinear equations that describe the interactions of three bodies in an interaction field, such as gravity. Then, psychiatrists focused on bringing harmony into romantic relationships are aware how their cases get enormously more complicated and often impossible to resolve once a child is introduced into a relationship of two. Also, many ancient geometrical problems are connected to triangular forms, and the sensitivity of the systems of three is oftentimes greater than that of systems composed of more or less units, as exemplified by the case of tritium, an atom with the most sensitive nucleon in the magnetic field. So we see that number three occupies a special place in the evolution of physical reality, exhibiting its magic nature at all scales, from the cosmic vastnesses to human hearts to the dance of atoms in and around us.

An example from the field of chemistry can be offered in support of the idea that asymmetry is crucial in producing fruitful balances. This example is also here to remind us how wonderful metaphors may be found in scientific descriptions and how the systemic character of knowledge keeps the crucial explanatory principles of all sciences alike under its magical hat. Namely, if you have ever tried to titrate a strong acid with a strong base, you have probably noticed a practical impossibility of reaching the neutral conditions that would correspond to their stoichiometric balance. These titration curves thus produce sigmoidal shapes, implying that minimal changes in concentrations in the vicinity of the stoichiometric balance produce large effects that tend to shift the system far onto the side of either an excessive acidity or an excessive alkalinity. At the onset of titration, there are practically no changes in pH; however, after certain amount of the base is added, the system would suddenly jump to the far alkaline side and become similarly insensitive to the further addition of the base as at the beginning of the titration. Now, if we were to titrate a weak acid with a strong base, the balanced range around pK_a value of the given acid would be much wider and more easily attainable. In this area, the system acts as a buffer, resisting the pH change by exchanging protons between the acid and its conjugate base in accordance with Le Châtelier’s principle. It is owing to the internal presence of chemical buffers, including phosphate, carbonate and protein types, that living species possess the ability to adapt to sudden changes in their environments. Hence, by providing conditions of perfect symmetry and equality in the event comprised of two entities facing each other, their balance would be extremely unstable and functionless. But once we introduce an asymmetry into the interaction of a pair of entities, the possibility for reaching a state of functional balance becomes wide open. Thus, weaknesses, imperfections and slowness in response are qualities that act as guardians on our ways towards magnifying the wondrous complexities of life.

Another example from the field of chemistry is to remind us that atomic oscillations in crystals are anharmonic by nature, meaning that there is an asymmetry in the distancing and approaching lengths in the system composed of two longitudinally oscillating entities. By falsely assuming the harmonic and symmetric approximation in this subtle music produced by atoms in a solid body, numerous physical phenomena, including the finite thermal conductance and thermal expansion, could not be explained. As far as living systems are concerned, we could bring to mind the image of a cell membrane. Though habitually it has been depicted in textbooks and in popular press as composed of two identical layers of fatty acids with polar heads oriented outwardly and nonpolar tails touching in the center of this 6 – 10 nm thick bilayer structure, the truth is that the two faces of the membrane, the one facing the cytoplasm and the other one facing the extracellular matrix, are always different and the loss of this asymmetry unambiguously means that the cell is approaching the apoptotic state¹⁷⁷. With the two monolayers being different in structure and not mirror images of one another at all, perhaps a similar asymmetry is to be introduced between the inward and the outward face of our interface with the world. Then, the mitosis of pluripotent, stem cells, whose number in the body drops from one in ten thousand in the newborns to thirty times less than that in the adults, is known to proceed asymmetrically, so that one daughter cell becomes displaced from the stem cell niche and differentiates into a new cell type, whereas the other daughter cell remains within the niche and continues to carry the pluripotent phenotype^{178,179}. If this asymmetry happened to be effaced, the ability of the stem cells to differentiate and repair damaged tissues would be greatly impaired and possibly even thoroughly lost. Furthermore, we should also be reminded that, thermodynamically speaking, biological processes occur in far-from-equilibrium conditions. In order to transcend the spontaneous thermodynamic tendency of matter to reach the perfect equilibrium of pure lifelessness, colloquially known as death, the organism needs to be continuously engaged in the act of balancing, although while dwelling in metastable states, far from the inanimate abysses permeated with a perfect equilibrium. For example, one half of the energy used by a neuron to fire an impulse by raising its electrical potential from the resting value of circa - 50 – - 70 mV to the action value of circa + 50 mV is required to merely maintain its resting potential, which is neatly illustrative of the immense work done by living systems to merely preserve their ground, steady states, the states which are, of course, as ground as a cave in the Himalayas is compared to the bottom of the Mariana Trench and as steady as a flow of water along the edge of the Niagara Falls. This is why a shift away from the state of perfect, static equilibrium can be regarded as a step towards life. However, one that is making these evolutionary steps ought to be aware that, in the end, it is always a harmony between symmetry and asymmetry that sustains life in all of its aspects. In that sense, one should make sure not to prematurely and hurryingly step away from the perfectly mirroring balance during what were supposed to be evolutionary shifts. A warmhearted understanding that patience is required to make our surroundings evolve in parallel with our mental and emotional spheres is there to productively slow us down and prevent our becoming too strange and incomprehensible to others. Compassionately facing each other, but without being intimidated to make a move that will in its difference break the perfect symmetry, should be, thus, our ideal in every meeting in life. Being the same and being unique is what needs to be precisely balanced in order to reach a true mastery in this genuine art of meeting.

Be that as it may, from the co-creational perspective the whole world could be imagined as a never-ending dialogue between the epistemological core of our beings and the hidden ontological foundations of Nature. The impalpable beauty that arises delicately from our gestures reflects exactly the majestic faith in this relationship between our being and the hidden ontological Sun behind the veil of our immediate perception. Once we start seeing a divine Sun permeating everything and hiding quaintly behind every detail of the world of our experience, the sea over which the sailboats of our eyes sway would become truly enlightened. For, each utterly blissful act and thought can be thought of arising

directly from the subtle swing of the unobservable, transcendent thread that connects the core of our being with the divine Sun, a source of the light of the soul that we could always imagine existing in front of us and guiding us on our strange ways. 'Stars are beautiful because of a flower that a man cannot see', will be an every now and then mentioned thought of the Little Prince in the course of every discourse on the nature of being and knowledge conducted by me, the scope of which this book falls in too. In this context, it reminds us that the subtle beauty and sublimity of the details of the world of our experience lie in the beauty of the interrelation of our deeds, thoughts and creative intentions with a distant and secret Sun of the hidden ontological reality, the reality that wholly lives up to Heraclitus' premise that 'Nature loves to hide'¹⁸⁰.

The art of dialoging is something that cannot be learned quickly and in a straightforward fashion. It takes a lifetime to be learned properly. Many spiritual thinkers who radiate with know-it-all attitudes, precluding the other sides in communication to express their hearts honestly as such, reflect deviations from the path of a perfect dialogue. Whoever states that our faith should be as firm as a stone brings forth an incomplete picture, for our faith should also be as flexible as a wave of water or a flower in the wind. There needs to be a room for indeterminacy left, lest our philosophies be turned into lifeless, insipid and intrinsically arrogant sets of ideas. Whether we cultivate purely solipsistic ideals, according to which the appearance of the world is a faithful reflection of the goodness of our intentions, albeit refuted by the parable presented in the Biblical story of the Book of Job, or we adopt strictly objectivistic stances, according to which the evolution of the world proceeds absolutely independently of the influence of the voice of the human heart and its mysterious dialogue with Nature, albeit refuted by the overall message of Christianity, the outcome would be the same: firm and rigid worldviews deaf to the guidance strewn like petite stars by the angelic voices nested all around us. The space between these two extremes, however, is filled with the potential for canceling out these arrogant attitudes and transforming them into something fluid and flexible, like the sea, whereon the waves of faith can freely flow. For, without this indeterminacy, there could be no spiritual waters gliding elegantly and gracefully to sustain the flowers of faith, hope and love that blossom in human hearts.

Instead of the principles of autocratic, unilateral and essentially monological management, the necessity and fertility of dialogues in all progressive pathways become understandable from the co-creational perspective. Co-evolution and dialogues are the ones that give rise to novel pathways of being and understanding. Whereas the image of sinking through vacuum, with our actions not being able to induce any response from the surrounding world, leaving us to hopelessly and inertly float down the dark cosmic vastness, could be identified with the monological reality, the feeling of safety depicted by the sense of the Earth below our feet, giving continual feedback responses to our walking thrusts, could be equalized with the effectiveness of dialogues. To be always open to change and to humbly accept the opinions of others, using them to fecundate the sterile seeds of exciting new thoughts and ways of being in us, is, thus, how we must be. But we should also be prepared to find a way to creatively respond to this change, right from the subjective core of our being, avoiding robotic responses dictated by rigid social norms and expectations in doing so. For, in the end, it is the synchrony of reflecting and yielding, detecting and constructing, giving and taking, being open and being close, adsorbing and shining that is inherent to the co-creational thesis and the Way of Love.

Implicitly embedded in the co-creational thesis and the Way of Love is the argument that the world needs to be divided to the observer and the observed in order for the charms of life to be given rise to. Only when two nodes are sufficiently distant from each other can a string vibrating with sound be stretched between them. Thus, to produce the awareness of unity and appreciation of Love in human beings, they need to be separated. Consequently, all the beautiful things that unities in life yield could not exist without their complements in terms of individuality and separateness. If only unity existed, the

world would be transformed into a shapeless and perfectly static singularity. All would turn into a permanent blind spot. For, only dynamic signals, moving relative to the referential points set by our sensory organs, can be perceptible. But with the first desire to separate and individualize from this state of an all-encompassing unity, the dance of life would begin. Sooner or later, however, an enduring run after individuality would cease through one's enlightening insights into the meaning and beauty of wholeness and unity, making the evolution of the whole wide world an incessant dance between separations and unifications, just as the Way of Love suggests.

Symbolically, pathways for the evolution of the world can be, therefore, imagined as sunrays radiating from a pair of opposites engaged in mutual reflections. Exert an influence on one pole and you will affect its opposite. Make your heart and mind a gracious home for the feeling and thought, and the world will become a better place. Or add some beauty to the patterns of the world, and human hearts would simultaneously become enlightened. This is why informational and spiritual evolutions are taking place in parallel, mutually supporting and reinforcing each other, as it is expected from and consistent with the co-creational thesis. Landscapes of the subject's heart and landscapes of the world are getting more beautiful, more graceful and more charming in parallel in the course of their mutual evolution.

All in all, Martin Buber spent a considerable portion of his creative time convincing the world in the aesthetic richness of the concept of encounter, of sacrificing one's actual goals for the sake of making a stop, then turning to face and graciously touch and/or open one's heart to another. At the same time, he implicitly pointed at the vulgarity of the attitude that minds one's own business at all times and never, ever, lets oneself be distracted by the longing to bring one's linearly projected journeys to a temporary standstill so as to look deep into the eyes of another. After all, when Nicole Miglis of Hundred Waters opens a beautiful birthday song with 'I wish you, I wish you, I wish you, I wish you...' ¹⁸¹ and when everyone thought that she would turn it into the logical 'I wish you a happy birthday', she said 'I wish you would see what I see', a powerful hint it was as to what the most glorious birthday gift one could receive is: the gift of seeing life through the eyes of a fellow human soul. And if there is one thing that holding Theo throughout many starry nights taught me, it is that the newborns' attentiveness and curiosity are sparked best not by holding them up high and letting them face the world that lies ahead, but by allowing them to face the carrying parent or guardian. That is when their attention becomes magically captured, when their uncontrollably roaming eyes turn into precisely coordinated orbits of planets and stars, and when one can sense the sunrays of empathy, of seeing the world through the eyes of another human being begin to spill all over this dreamlike space and time. On one hand, this has proven to me the correctness of Buber's, and later Piaget's, observation that all in the child's universe is subdued to the establishment of the relations between (I) *I* of the deepest center of the child's consciousness, something which will be most probably, sadly, substituted with the voice of peers and authorities later in life, serving as a grand cause of the child's fall from grace, paradoxically paralleling the process of entering adulthood, and (II) sacred *Thou* that others and Nature as a whole are to naturally and ideally represent to one. On the other hand, this has shown me that Love, symbolically reflected in the act of watching each other, and Wonder, the two elemental qualities that I mentioned at the end of the previous subchapter and that I will return to over and over again in the course of this book, ignite and accentuate one another, the reason for which in my dreams I see them as two columns on which the whole Cosmos stands supported, together with each individual evolutionary cog spinning on them. It is therefore also that I see the heart of science, the realm in which Wonder is crowned more than any other quality of the human psyche, being made up of Love and Love only.

Science seen from the pedestal of the co-creational thesis: Atoms and molecules seen as human inventions as much as the signs of an objective divinity

‘Physical concepts are free creations of the human mind, and are not, however it may seem, uniquely determined by the external world... The object of all science, whether natural science or psychology, is to coordinate our experiences and to bring them into a logical system’

Albert Einstein

The co-creational thesis and its concept of an all-pervasive dialogue between human spirit and Nature can be advocated as a neat basis for all sciences, natural and social. It might provide convenient fundamentals from which the false objectivism of scientific arguments could be overcome until a precise balance between the influence of man and the influence of Nature would be acknowledged in each perceptive and experimental event. Unlike the idea of constructivism that offers potential for falling into the opposite unbalanced state of extreme, solipsistic individualism and its anarchistic consequences in the social domain, the idea of co-creation seems to be perfect for producing a harmonious balance at the level of fundamental understanding of sciences and technologies.

Because every subject partially defines the qualities of perceived physical objects in accordance with his biological and cognitive predispositions and states, all seemingly objective representations of the reality should be considered only as metaphors. Human assumptions about the nature of the reality are thus reflected in the nature of scientific models as much as in the features of our experiential realities.

The largely neglected voices of anthropologists who insisted that observing and reasoning about foreign cultures implies observing and reasoning about the reflections of our own culture could now become crystal clear. Namely, crafting judgments that highlight primitivism of customs existent in aboriginal societies on top of the assumption of superiority of the judges’ native culture always carries a seal of ignorance with it. Those who are aware that contexts define qualities of human acts to a large extent are less prone to find themselves on this slippery slope of opinionated ignorance. Those who are not aware of this basic systemic principle, however, tend to exhibit sheer ignorance by ascribing contextually defined traits to social transplants, that is, people found within a social milieu that feels foreign to them, but domestic to their judges. I personally experienced such warped judging of my behavior as I moved from my Southeastern European places of origin to the US, as people regularly misunderstood the elements of body language that my tradition instilled in me. Passion and focus were thus, for example, oftentimes mistaken for madness and arrogance, whereas although my personality was typified as awkward and antisocial in my native ground, in the US it was seen as very open, social and affectionate. A different intonation of the voice, an integral addition to the body language, also played a pivotal role in this systematic misunderstanding of intentions that I experienced on these foreign grounds. ‘Use the wrong intonation and people won’t understand you, or they will misunderstand your intentions. The Indian language is very staccato; English can sound flat when spoken with this accent. Speak English with an Iranian accent and listeners may think you’re being sarcastic or angry’¹⁸², says Lisa Mojsin, a tutor in accent reduction, and due to steams of passion and determination emerging from the train of intonations inherent in my native Belgrade accent, there is no doubt that intentions concealed behind my words have similarly been misjudged on a regular basis and mistaken for fuming and impetuous. Relentlessly experiencing such misconceptions of the essences of my expressions taught me that, should one wish a correct message to be conveyed across this intercultural wall, one would need to readjust one’s naturally different body language style, the reason for which, for example, the Syrian-American filmmaker, Moustapha Akkad decided not to merely dub the English version of his movie about the prophet Mohammad in Arabic for the Arabic-speaking audience, but to use wholly

different casts as well as insist on different intonation, gesticulation and the acting style, while not changing the screenplay and the camera angle by even an iota, an approach that would in real life, however, demand an expressional duplicity on our behalf and smother the sincerity of our articulations. Moreover, lest the diversity of our civilization be threatened and its potential to sustain itself together with it, the solution to this problem ought to be tied to reeducating the interpreters instead of pulling the heart out of the foreign expressers by demanding the readjustment of their expressions to the local style. In fact, if people were trained from an early age to grasp the systemic inevitability of interpreters' own outlining of qualities of observed systems based on their prejudices and assumptions, such profoundly incorrect judgments could largely be prevented from occurring. Similarly, an inescapable influence of the measurement devices and experimentalists' expectations from the results of scientific experimentation would be acknowledged and not anymore kept hidden behind insincere expressions of thought, such as what we witness in typical scientific presentations. And the whole subjectivism introduced into the frameworks of science would not serve the purpose of devastating the empirical base for development and transfer of knowledge, but would be present for the sake of understanding what the science is fundamentally about in much clearer terms.

In that sense, let us repeat once and for all the following truism, which ought to be one of the first and most fundamental assumptions pointed out to young scholars. There are no truths, facts or any relationships of the world independent of the subjective nature of the observer. Hence, atoms and molecules and the entire imagery of scientific descriptions are in no way truly existing entities and events, but only explanatory models applied for the purpose of mutual coordination of human experiences. As Socrates once proclaimed, 'There are few who, going to the images, behold in them the realities'¹⁸³.

Map is not the territory, and name is not the thing named – that is what we must have known by now. Whenever we name an object or an experiential phenomenon, we open the way toward the conceptualization thereof, but our hearts and souls, at the same time, make a step away from it. Besides, a repetitious referral to a person by his or her name distances the speaker from the person named, as anyone familiar with the basics of daily communication can attest to. To name, therefore, is to have the soul of the named slip through the web of our mental schemes and drift into the unknown and unseen. Yet, a step even higher in our ascent towards the divinest dharma about this world is being made when we come to realization that a thing observed is never the thing observed, so to speak, and that every model of reality is always a partial analogy co-created by a collection of observers comprising the human race and that mysterious another hidden behind the veil of our experience, which we might represent as the Creator, God, Mother Nature or a sundry of other concepts, but which we could conclude of only by indirect means, that is, by looking 'through a glass, darkly' and not 'face to face' (Corinthians I 13:12). At best, atoms and molecules can be thought of as concepts derived from the responses that this mysterious intelligence pervading all things gives to our premises, our anticipations, our emotional stances, our cognitive capacities and our biological predispositions, alongside the explicit inquiries of ours, the sum of all of which yields the ineffable question, as grandiose as the cosmos itself, that our beings send out into the air, silently, with each and every instant of their existence, observationally active *per se*.

Experiential features represented by them are, therefore, neither solely objectively existing entities as positivistic scientific worldviews hold, nor sole human inventions as constructivist philosophies state. They emerge as higher-order forms through the intersection of these, objectivistic and constructivist creative spheres. The idea of perceptively co-created experiential features is somewhat related to the ancient Platonic view of the set of knowledge arising at the intersection of the subsets named Truth and Belief. Discarding any of these two poles of knowledge is bound to derail us

from the optimal path, turning us into passive reproducers, dull dogmatists and submissive conformists if we were to get inclined to the side of Truth more than to that of Belief, as is the case with the adopters of the approach pursued by objectivistic science, and into solipsistic lunatics unable to communicate any of the treasures hidden deep inside our souls if we were to neglect Truth on the account of overly embracing the coast of Belief, as is the case with many ill-starred artists lining up the gutters of the society.

Every aspect and detail of human knowledge could be accordingly seen as an exciting encounter between human beliefs and the true order of things behind the veil of our experience. Human knowledge is neither a sole reflection of the basic epistemological presuppositions as some of the radical modern constructivist philosophies maintain nor a reflection of an observer-independent reality as some of the fallacious objectivistic schools claim. Rather, it can be seen as one out of many possible perspectives at the physical reality from the pedestal of our beliefs, wherein we never can discern Belief from Truth. Because, in order for any knowledge to arise, the grounds on which the trees of knowledge will grow need to be seeded with sets of basic assumptions, albeit unverifiable and unprovable by the fruits and the lush of these trees stemming from them. To ignore this fact, as the mainstream, objectivistic science of the modern day does in its being overly focused on ontological questions while ignoring the epistemological ones and overlooking the fact that every ontology rests on epistemological premises and *vice versa*, is to head straight to the abyss in a blind and inherently defective quest for knowledge.

But one of the most fascinating things is that this Truth is not passive and unchangeable. Instead, it is of dynamic nature, yielding ever changing answers to the questions posed by means of our beliefs and methods employed in the explorations thereof. One of the reasons behind is that the very physical reality that surrounds us is subject to change with the evolution of human knowledge. The way the face of the planet and the amount of information that each one of us is able to absorb and release at any given moment is the best evidence for this mutual evolution of epistemological and ontological aspects of being. In fact, when I look back to the deepest ideals and driving forces behind my writing, I come to the same inextricable mutuality of my dreams (the way in which I would like the evolution of the world and myself to be heading to) and an innate tendency to write not for the sake of satisfying anyone else's criteria, but for the sake of touching the Truth. Though as I said, one without the other, that is, beliefs without the truth or the other way around could not be ever had. Each sign of truth we may come up to is always an answer to the questions posed within the deepest conscious spheres of our being, whereas every insight into the nature of these deepest beliefs could be traced to the reflections of the world around us. And this incessant dialogue between our Beliefs and Truth, both of which are directly palpable, lies at the heart of the co-creational thesis.

Thus, young student, do not foolishly observe anymore how atoms and molecules are things that objectively comprise experiential appearances. They are models used for the pragmatic coordination of human experiences. Every time Nature presents you with the image of discreet, atomistic units as the most fundamental ingredients of your experiential reality, be aware that it is an answer Nature gives to questions implicit in your experimental probing of this reality. And when particularity is intrinsic to our worldviews, arising most profoundly from the distinction between I and another, then it should come as no surprise that our models of the world at its finest scales reflect a similarly particulate nature.

Imagining atoms as tiny spheres of tightly packed nucleons around which electrons orbit is nowadays normally taken as sign of scientific infancy or even illiteracy, depending on whether we are old enough for the scholarly circles or not. Physical systems at the atomic level obey quantum rules of particle/wave duality, and as such resist any depictions thereof in terms of classical objects. Many scientific attributes, if literally understood, may lead our intuition in a completely opposite direction. Such is the case with the scientific concept of chaos, defined as the extreme sensitivity of determinate systems to their initial conditions. According to this definition, natural systems become increasingly

chaotic as they become more organized. Complex organisms are thus unprecedentedly chaotic systems, as one could hardly predict how their inner physical processes will develop depending on the limiting conditions imposed. The notion of chaos in science can, thus, carry a completely counterintuitive connotation to an unfamiliar mind. The same is with the concept of protein folding, used to describe the transition of a protein to its native, biologically functional tertiary structure. Namely, volume occupied by a single protein molecule is by default higher in its folded state compared to the unfolded structure, so that the notion of folding clearly presents one more misnomer in the regular scientific terminology. Examples like these may be indeed many, and the best cure for not falling into traps of counterintuitive visualizations is to acknowledge from the very start that natural systems on a fine scale can be hardly reduced to ordinary human conceptions of objects in interaction in accordance with Newton's laws of motion.

Einstein's general theory of relativity shocked the world when it introduced a more sophisticated and precise scheme of Cosmos in which mass curves space and time, previously unified within a single four-dimensional continuum. People were amazed by this picturesque representation, but mostly philosophers recognized that it is only one among an infinite number of ways to represent the physical/experiential reality. Like myself today, saddened by the objectivistic disillusionment of the scientific community by the linear vision of science, where ideas supposedly ceded place to facts set in stone, promoting people to robotically reproduce rather than develop and expound their own versions of scientific worldviews, philosophers of the early 20th Century, who were not as isolated and marginalized as those of the modern day in this age of STEM and virtual eradication of any humanistic thought from hard science curricula, recognized the pragmatic point that each scientific model rests of the bed on unverifiable premises and is one out an innumerable potential models to equally or even more exactly describe the physical phenomena in a given domain. Having been made aware that scientific deductions always stem from the grounds partially composed of nonscientific premises, they were quick to notice that all these fancy scientific portrayals of reality are more correctly to be treated as convenient ways of organizing our experience on the bases of the presumptions applied in the deduction process than as reflections of a true order of things. For, directly implicit in the rather shocking statement that atoms and molecules do not exist in reality is but a gentle reminder that scientific imagery does not rest only on the premises of scientific thought, but also, more importantly, on the glacial orders raised by our ethical and aesthetical values, our ontological beliefs and, all in all, the most profound existential propositions that govern our psyches.

As we build picturesque scientific models upon the complex interplay between experimental adumbrations and our assumptions, which appear at both the levels of perception and abstract reasoning, the images of the world that science provides us with are bound to continue to be the signs of an objective divinity that underlies the experiential reality as much as the reflections of our own initial assumptions about the nature of the world. Thus, science, indeed, develops as a fairytale as much as it presents a realistic novel. Stanley Kubrick's team of scriptwriters for the 2001 Hollywood blockbuster, *A. I.*, one of many recent allegorical spinoffs on the story of Gospels coming from this highly industrialized and clichéd moviemaking provenance, can be thus said to have spoken no nonsense when they arranged that the supercomputer's answer to the android boy's question, illuminating the road that would lead him to meet the blue fairy who would transform him into a real boy of flesh and blood, lay at the intersection between flat fact and fairytale categories. Anything that we conceive of in the scientific or any other domain of our knowledge similarly arises from a mutually fecundating encounter between objective and subjective creative elements of reality, the former of which can be considered as remote and factual at times, proceeding reticently like a river, independent of the elegiac stories of our lives, while the latter of which is fantastic and whimsical, tightly related to the deepest wishing wells of

our dreams. Such a blend of factuality and fantasy stands forth as one of the most beautiful reflections of the human mind in its quest for the secret treasures of Nature.

In that way, atoms and molecules and extensive scientific models are basically not different from any religious or mythological conceptions, conspiracy hypotheses or indignant football fans' beliefs that all sporting events are fixed in advance. All these explanatory models may provide useful paradigms for a correct prediction of physical events. It is true that scientific depictions are unsurpassed in terms of their predictability, but it does not mean that some unforeseen future schemes of calculation and thought would not prove to be far better and more convenient ones. This renouncement of the criterion of truth as the one scientific theories are obligated to satisfy logically leads to the adoption of an authentically pragmatic philosophical position, according to which the role of every theory is to coordinate human experiences toward some blissful horizons rather than to wage war against competitive theories in an attempt to earn the exclusive privilege of occupying a patch on this deceptive territory of truth. Mutual exclusiveness of differing points of view reigning in a world based on objectivistic premises thus becomes substituted with a more organic and open-minded perspective wherefrom the acceptance of even worldviews and beliefs that are obviously at odds with those that we have come to hold becomes possible. An important corollary of this standpoint is the openness of science not only to alternative models of physical reality, but also to alternative modelers and alternative approaches to modeling it. In other words, the objectivistic science based on the premise that the current atomistic and Euclidean models used to explain physical phenomena are the only valid ones breeds a similarly totalitarian, almost fascistic homogeneity at the level of the scientific profession, approving of one model of the scientist only, typically a corporate, prostituted personality obsessed with conforming to the mainstream values, and straightforwardly discarding any alternatives to it. In contrast, the pervasion of the awareness that scientific models are ones among an infinite number of potential ways of representing the physical reality and predicting its evolution would naturally bring the attention to the value of anyone holding either slightly or significantly different worldviews than the mainstream, including myself, a scientist who has perpetually viewed the objects of research through the lens of lyricism and aesthetics and who has allowed this intrinsic poetry of physics to feed his scientific ideas and creativity. One such person, destined to be perceived as an intruder in today's science and have countless doors on his advancement in academic career shut by these enforcers of fake homogenies, would become perceived as gemlike in value in a more ideal scientific world, where diversity would be disseminated at the deepest, epistemological levels rather than at the surface, the level of the skin, as it is the case today.

This observation presents, believe it or not, the starting point for the hypermodern unification of science and religion. Thinking about both as sets of metaphors and pointers to the dialogue between human mind and Nature could erase the traditional gap between them. As a magnificent bridge, this co-creational thesis would join many hands and prevent many harmful confrontations. Seen through such a metaphoric perspective, religion would be considered as both theistic and atheistic, whereas science would not be considered anymore as the ultimate and absolutely privileged approach to revealing the mysteries of Nature. With this transition, 'the modern science would give up the mysteries of Nature only to shift its interests to the mysteries of man'¹⁸⁴, as Alexandre Koyre observed, all until the balance between subjectivism and objectivism describable by the language of the co-creational thesis becomes firmly established as the one underlying all empirically researchable phenomena. At the same time, the paradoxical state of affairs whereby the closer the focus of human research of reality is to the heart of man, the less religious the scientists are, would be healed. Hence, physicists, mathematicians and astronomers, traditionally more religious than biologists and social scientists, would be brought to realization that their models and observations are greatly influenced by the very observer and his cognitive constitution, while the latter, traditionally more atheistic scientists would be prompted to

recognize the sources of divinity within the systems that are subjects of their research. No longer would we be farther from God, the closer we approach the heart of man, but quite the opposite: the more lean our ears on human hearts with an empathic curiosity and open our arms to embrace them and sow seeds of the stardust of divine feeling and thought all over them, the more we would find ourselves face-to-face with the genuine image of God. For, social and natural sciences would be blended to such an extent that whatever science we engage our creativity in, we would be led to realize that Nature/God 'hath made every thing beautiful in his time: also he hath set the world in their heart' (Ecclesiastes 3:11), while the heart of man is what stands enrooted within the foundations of each science, irrespective of the extent to which it may erroneously claim its objectivistic supremacy in the realm of human knowledge. Scientific models and narratives of religions and arts would be thus shown as supporting the foundations of each other, as essential human qualities enlightened by means of religions and arts can be said to imperceptibly guide the scientific conduct, while scientific inventions multiply the wonders of the world and thereby stimulate the glow of spirituality within religious minds. In essence, they would both point to the dialogue conducted between the cognitive core of human mind and divine Nature, and their complementary understanding would be acknowledged as the one promoting both thriving scientific creativity and an incessant revitalization of the religious thought, humanizing the former and preventing the latter from falling into abysses of obsolescence in the eyes of the modern man.

Both science and religion comprise signs that should not be used, erroneously as it were, to reflect the objective character of being and Nature, but should be regarded as metaphoric pointers applied for the sake of mutual co-orientation of human experiences towards some wonderful daylight of both human spirit and God. This is because when human spirit soars, God flies too, and *vice versa*.

This pragmatic feature of science and religion implies the second point. It is that besides an implicit dialogue between human mind and Nature, scientific descriptions are inherently related to human-to-human communications enwrapped with benevolent and caring purposefulness. As such, science can be seen as another manifestation of the two elementary Christian commandments (Mark 12:29-31). The intrinsic dialogue between mind and Nature in each fundamental scientific description is related to the first commandment that describes the love of God, whereas the pragmatic purposefulness of scientific expressions points to the second commandment that mentions the love of thy neighbor. Who can now say that science and religion contradict each other?

The fundamentals of scientific research lie in the domain of untouchable and invisible human qualities involved in social communication, including love, care and benevolence. The pragmatic character of scientific activity clearly speaks in favor of this point. On the other hand, each scientific description is at the same time a mysterious sign that points to the metaphysical and, I am free to say, theological dialogue between human mind and Nature. Jovan Dučić's concepts of cosmic joy and humane happiness thus become blended into one. For, science is a dialogue with both God and men.

The way through which science could partly become faith and religion could become scientific again is thus pointed to. All the unpleasant hostilities that arise from the unilateral pursuance of the two approaches to co-creation of knowledge about physical and metaphysical realities that are home to our spirits would vanish in these newly found forms of their prolific entwinement.

In fact, my whole life I have found myself in-between the worlds of sciences and arts, unable to perfectly fit into any of them without pining for the other. Artistic circles have almost always seemed permeated with too much imagination and too little of intellectual rigor, whereas it was the opposite in the scientific social milieus. Yet, imagination without rigor is schizophrenic, while rigor without imagination is robotic, as we all know¹⁸⁵. Therefore, I have always tried to complement my scientific activities with an artistic attitude, knowing that wishing so much to succeed in our endeavors, doing our work for the sake of enlightening the planet, presents the inner pedestal from which our creativity in any

domain should spring. On the other hand, I have continuously attempted to introduce a dose of intellectual conceptualization into doing arts, although knowing that similar praying immersion into oneself is required to come up with brilliant pieces of art. And I have always seen narrative religions posed as a sort of a golden bridge connecting scientific and artistic attitudes of mind. For, like sciences, religions are predisposed to explain the order of the surrounding world, and like arts, they present narrative metaphors that aim to enlighten the ethics and aesthetics of human thinking and behavior.

Despite the current trend of animosities between scientific and religious worldviews, there are a number of commonalities that pervade the both, and which, if acknowledged as such, could present neat bridges for crossing the gap between science and religion. For one, both scientific descriptions and religious scriptures are sets of metaphors. As such, they do not satisfy the criterion of truthfulness, but serve merely as pragmatic pointers in the social communication of meanings that help us understand the world in clearer light and be more productive in our creative endeavors at the social levels.

Second, although science, religion and arts share many similar features, reflections of initial assumptions on observation outcomes and conclusions of one's studies presents one of the most striking and delimitative of them. It would be difficult to find a province of human knowledge in which the effects of subjectivity on the derivation of new knowledge and, in turn, the frequency of invoking the effects of observable phenomena on the experiences of the subject are as pronounced as in these three. Heinz von Foerster thus noticed that 'the observers in action primarily look into themselves'¹⁸⁶ and only then into the eyes of Nature. This observation can be, strictly speaking, taken as equally relevant to all the conceivable fields of human inquiry about Nature and life.

Third, both science and religion are preoccupied with explaining the invisible features of the world. One could argue that just like the eye that sees the world does not reveal itself to the observer nor are the basic premises of our reasoning readily explicable in the language of its inferences, so could we be sure that the most essential qualities of life must remain hidden from our sight and other senses and that quests after them present the natural aim of the most sacred and sublime fields of human inquiry about the nature of reality, including, most notably, science and religion. Therefore, while religion deals with the most profound of human qualities, all of which are intangible, as a rule, science depicts physical interactions in terms of similarly invisible qualities, such as energy, momentum, symmetry, wave function, etc. Moreover, now we know that probing unobservable phenomena to explain and perfect the observable was what set us, humans, apart from chimpanzees and other close relatives sitting next to us on the mammalian branch of the evolutionary tree of life¹⁸⁷. In other words, digging deeper into the invisible causal roots of things with every question Why we ask is an essential attribute of our creativity and the most critical evolutionary drive that stems from the psychological plane of our beings. What this means is that science, theology and all other past, present and future arts of asking this single most important question in the Universe and thereby subtly probing the hidden connections that guide the evolution of our realities are here to stay if we wish to see humanity continuing to journey along the path of progress.

And fourth, both scientific research and the study of religious scriptures help us remain children in our spirit for the whole of our lives.

When we were young, the whole world seemed as if it was filled with enchanting mysteries hidden behind every corner of our perception. As we grow up, however, these enchanting feelings tend to dissipate away. But if we accept the co-creational thesis that tells us that the whole world of our experience arises from the interplay between the mystical foundations of Nature and the cognitive foundations of our own beings, which engrain our values, emotions and aspirations, we have the chance to maintain a truly sacred relationship with Nature as a whole and thereby preserve the childlike wonder, humbleness and divine gentleness in spirit. And we could thus remain heavenly children in our spirit for

the rest of our lives. Whether we are immersed in the scientific or theological mysteries of life, the role of parents is then substituted with the omnipresent image of God.

In the end, what the ideal of the Way of Love points us to is nothing complicated. It is a reminder of the quotation with which Ludwig Wittgenstein started his famous treatise in which he essentially annihilated the whole body of logic and left us standing free-minded underneath the majestic mystery of the starry sky: 'Everything that a man has ever said and everything that is not mere rumbling and roaring can be said in three words'. From the co-creational perspective, this Holy Trinity is composed of Mind, Nature and the Way - two nodes and the string stretched between them that continuously changes the perspectives and thus fluctuates and creates the music of life.

The essence of the fundamental ethico-aesthetical perspective of the co-creational thesis, perpetuated in the Way of Love, is thus identical to the pair of major Christian commandments (Mark 12:29-31). They tell us that we should anchor our awareness firmly to the depths of the endless sea of our mind and heart and read from there on the paths of our destiny and mission in life, and yet never cease to love the beings of the world as much as ourselves. In the end, the idea is simple. The aim is neither to sadistically love ourselves at the cost of neglecting others nor to masochistically satisfy the desires of others and humiliate one's own being, but to love, all and everyone. After all, 'to love another is to see the face of God', as it is sung solemnly at the very end of *Les Misérables*, which is the point at which these two fundamental commandments merge into one another, showing us that remaining mysteriously remote and distant from the world, like the stars of the Universe, preconditions the undying shining of our lights thereto, whereas giving away oneself to leap in compassion deep into the heart of another is the perfect and perhaps the only way to truly find oneself in this intrinsically paradoxical reality that disobeys the principles of classical logic with each and every flap of its angelical wings.

It would be silly if the answer were not to be simple. As a classical Taoist proverb goes, 'The secret is so simple that, were it revealed, all would burst into laughter'¹⁸⁸. The answer, thus, has to be one that can be reached by everyone, with any intellectual skills, at any given moment of their existence. For, everyone has the potential to become a star of spirit in this life. Thus, the answer is Love. And as we shall see, all the other chapters in this book will reflect a similar thread. As is the case with every other aspect of human knowledge, their progress will have arisen with the sunrise of human Wonder and will have ended with the returns to the miracles of Love. From Wonder to Love and back is the cycle that underlies the evolution of humanity at its deepest foundations.

On balancing many things: rigidity and flexibility, periodicity and novelty, order and freedom, unison and diversification, looking up and looking down, being in balance and being out of balance

Introduction

'The heart is great which shows moderation in the midst of prosperity'

Lucius Annaeus Seneca

Ever since the ancient Greeks observed that moderateness presents the key to human welfare, it has been a cliché of wise reasoning to look for the ways not to maximize or minimize, but to balance, optimize and harmonize. However, people still tend to forget these standard guidelines of behavior and

thought, and become blinded by simple algorithms that aim for growing more, better, bigger and faster. Despite that, all the brilliant solutions to the perplexities of the world seem to lie in accepting a wide array of the proposed lines of progress and uniting them into common and mutually supporting schemes.

When asked by a disciple about the supposedly unprecedented enormousness of his master's, Confucius' knowledge, the master himself replied: 'No, no, I do not know much. All that I know is like one thread. But that thread connects all the others'. This general, all-encompassing knowledge may have been the same one that typified the hedgehog who 'knew one big thing' and thus outwitted the fox who knew 'many things' in the ancient Archilochus' fable¹⁸⁹. Thus, by knowing, for example, one big systemic secret in terms of the importance of the balance between rigidity and flexibility for all systems in Nature, one could teach people the art of successful economic, political and thought management. One could teach people how to perceive and act in harmonious and inspiring ways. One could teach scientists and artists alike the working performance of maximized creativity. One could teach soccer players how to kick the ball proficiently, infusing softness to their stiff feet. One could instruct a Tai Chi practitioner how to assume proper postures, which are always such that tension and relaxation in them are properly balanced. In short, if the posture is too tight, one ought to loosen it up so that life could be breathed into it, but if too loose, one ought to tighten it up so energies can stream from the toe to the head to the toe and back. Further, one could teach samurais the art of fencing. In it, the sword is held like a bird: neither too tight so that the bird suffocates nor too loose so that it flies away. Hence, Sun-Tzu proposed the following strategy as the key to his Art of War: 'The situation gives rise to measurements; measurements give rise to estimates; estimates give rise to analysis; analysis gives rise to balancing; balance gives rise to triumph'. Systemic thinking is all about finding general balancing principles dormant in any given subject of our examinations of the world and then wisely reapplying them everywhere. Henceforth, whenever we are stricken by the feeling of awe upon coming across a statement that opens glimpses of profound depths all around us, we should know that we have come face-to-face with a touching systemic assertion applicable on innumerable occasions and under millions of different circumstances. For, 'deep' is nothing but a colloquial synonym for 'systemic', an attribute attachable to relationships whose scope of relevance is so broad that it can fit the entire Cosmos, in all of its scales, from quarks to galaxies, under its lucid umbrella.

In the spirit of Confucius' and Sun-Tzu's thoughts, Chuang-Tzu observed once that 'hundreds of doctrines head forward, instead of looking back, condemned never to unite'. An enlightened mindset can be said to be exactly such: never leaving anything or anyone behind, but rather embracing everything and everyone under the sunshade of a worldview as ample as the cosmos itself. Aware of the fact that one such breadth can be achieved only insofar as diametrical opposites, regardless of how incompatible and hostile to each other they may seem on the surface, are being welcomed side by side in the home of one's mental microcosm, it wholly lives up to the premise put forth by Blaise Pascal in *Pensées*: 'It is deserting humanity to desert the middle way. The greatness of the human soul lies in knowing how to keep this course'¹⁹⁰. Correspondingly, the concept of middle Ways, already implicitly touched by the proposed co-creational origin of experiences at all the levels of their complexity, will be the subject of this section.

On the balance between steadiness and change

'Through changing, the world as One sustains'
Heraclitus

'We join spokes together in a wheel, but it is the
center hole that makes the wagon move'

Out of many systemic balances that we could mention, the one between rigidity/order/periodicity and flexibility/freedom/novelty seems to possess a special place in the pantheon of systemic knowledge. This is because the proper balance between repetition of old habits and openness towards learning and implementing new patterns of behavior seems to pervade all the creative and harmonious evolutionary pathways.

For example, the growing contemporary worries over the unsustainable environmental features of the planet make it perfectly clear that the further evolution is possible only through cultivation of sustainable actions, and *vice versa*: that change is the essence of harmonious living, in concert with the ideal proposed by the father of the metalogical, second-order cybernetics, Heinz von Foerster: 'If you yearn to find yourself, go change!' It is known that phenomena of adaptation and evolution interrelate with each other during each co-evolutionary biological growth. An absolute stability is, therefore, reachable only under the conditions of a continual change, while, on the other hand, the center of every spinning wheel is still, as Lao-Tzu noticed (*Tao-Te-Ching* 11), reminding us not only that the search for a perfect static approach necessitates the devisal of a proper dynamic strategy, but also of the need to enroot our spirit in the sea of static stillness as we begin to revolve the wings of the windmill of our being, grind the wheat of sunshiny impressions, memories, ideas and emotions, and strew flowery dust that will feed many all over the world.

Static and dynamic elements thus seem to be well balanced and in support of each other in every healthily developing natural system. For example, ancient tribal music mostly consisted of periodic and predictable beats played with the purpose of awakening a sense of recognition, confidence and security throughout the times of ever changing life cycles and uncertain existential dependence on the volatile patterns of weather and climate. In contrast, the classical European music consisted of never-ending ramifications of themes, signifying the desire for adventure throughout the times of spirits settled in the habitual rhythms of existence. The succession of dominant musical schools, from renaissance to baroque to classicism to romanticism, has thus corresponded to substitution of dotted rhythmical patterns with an ever lesser accentuation of the beat and ever greater harmonic involutions, all until a stage was reached where any ostinatos, any repetitions of any musical element, began to be considered as utterly tasteless. Thus I can imagine any of the classical composers hearing the artiest of today's pop tunes and making the same comment to their repetitive segments that Giorgio Giugiaro made when he was shown a model of Triumph that, expectedly, had both sides painted exactly the same: 'Oh no. They did the same here as well'¹⁹¹. The same line of thought must have passed through Archie Green's head when he realized that the carpenters working on a Marin County structure thought that the modernist blueprint he had handed them was wrong and turned the asymmetrical façade symmetrical¹⁹². In fact, the traditional European renouncement of drumbeat as an unappealing musical element can be traced back to ancient Greece and the widespread aversion to percussions that was pervasive in this culture which cradled Western civilization in many respects. Or, as pointed out by historians of music, 'The brave Lacedaemonians march to battle to the accompaniment of flutes, the Cretans to the accompaniment of lyres, the Lydians to that of panpipes and flutes, and when the Getae conducted negotiations, they did so to the soothing sounds of the kithara'¹⁹³. Such was an aesthetic sense of repulsion from drumming among Europeans over centuries that the following words of the American composers and music therapists, Paul Nordoff and Clive Robbins neatly describe a subconscious train of thought that must have ridden through the heads of many musicians and music critics during the times of increasing infusion of the beat element to 'the music of the white man', from waltzes to polkas to ragtime to jazz to swing to rock: 'We had to justify the use of the drum, for we encountered a prejudice against drumbeating: it was held to be a primitive, barbaric activity capable of expressing only blind or obsessive impulses of a low order'¹⁹⁴. As

the European classical music evolved toward ever greater rhythmical sophistication, from renaissance to baroque to classicism to romanticism, when it underwent the most significant phase transition, so was the reliance not only on drumbeat, but on the steady beat of any kind considered a regressive threat. Ravel's Bolero, with its blatant beat and melodic repetitiousness, for example, prompted even its composer, Maurice Ravel, to shun it as a 'masterpiece with no music in it'¹⁹⁵ and the consortia of clinical and musical experts to subsequently conclude that composing the piece must have been a sure sign of the impact of neurological disease¹⁹⁶. Now, there are definite, rather dire costs to this systematic neglect and occasionally even open abhorrence of repetitive rhythmical patterns that went on for centuries on the European soil, as exemplified by Theodor Adorno's essays, in which he associated the default reliance of modern music on repetitive phrases as psychotic, infantile, fetishistic, regressive and manipulative¹⁹⁷, ignoring all the while the fact that the earliest periods of our lives, the time spent in the mother's womb, were accompanied with the steady beat of the mother's heart. One of those costs comes in the form of the obsolete appearance of innumerable, if not all, classical masterpieces, save a few, such as Beethoven's Pastoral symphony, Rimsky-Korsakov's Scheherazade or Strauss' Don Quixote, to the new generations. In spite of the rhythmically complex works of many composers of the 20th Century, from the rhythmic ostinatos of Janáček's Sinfonietta to the syncopated patterns of Copland and Gershwin to the Fairy's Kiss and countless other works, predominantly ballets, by Igor Stravinsky, a composer who recognized that the oncoming musical revolution would belong not to the richness of harmonies, but to that of rhythm and timbre, the reliance on melodic wilderness to convey the 'beatific', elatedly dance-like nature of life has been pervasive among the classical composers of all ages and currently stands forth as a trait of their works that sounds most foreign to the youngsters' ears, presenting the greatest obstacle to their acquainting this rather old-fashioned approach to musical expression and preventing its slipping away into oblivion. Paradoxically, any music containing no repetitions in its composition would be classified today and in the medieval era as experimental, just as the experimentations with ostensibly repetitive phrases during the eras of classicism and romanticism, as by Beethoven in his late string quartets, Brahms toward the end of his last symphony or Schubert in his songs and late symphonies, were worthy of the same label. From today's perspective, encounters of opposites and their stylish blending within pieces of art, that is, of monotonous drumbeat and adventurous melodic flows in this case, can be said to be the recipe for ensuring the immenseness of their inspirational potentials. Every song played on the radio can thus be traced back to a grand confluence of the thirst for rhythm that once arrived with slave boats from Africa to the Mississippi Delta on one side and European cravings for tonal melodies to lull the human spirit with their soft embrace on the other. If you have ever wondered why the Beatles caused a havoc in the musical realm and charmingly caught millions of minds all over the globe by surprise with their sound, the key lies in their harmonic enrichment of the overly rough sound of rock 'n' roll of their times with boyish gentleness, very whitey and European in a sense. By doing so, they defined a balance between rhythm and harmony, a middle Way that would set norms of musical expression for generations of musicians to follow. Also, nothing other but a cosmopolitan embracement of diverse aesthetic viewpoints established by different musical traditions has led to new forms of artistic expression made unprecedentedly popular at the global scale in the recent decades. It would be an endless story to start a discourse on potentials and beauties arisen out of the juxtaposition of the two, the melody and the rhythm, in the limelight of the modern musical arenas, but its scope unfortunately extends beyond the limits of the current discourse.

It is, nonetheless, fascinating to realize that these tendencies towards freedom and towards constraining oneself are inevitably complementary. For example, Isaiah Berlin warned that 'total liberty for wolves is certain death to the lambs'¹⁹⁸ and lest we allow this ominous maxim to come true in a real-life system, we must make sure that any excessive freedoms in it become balanced with sensibly

administered regulations. Hence, whenever one gets pleased by the signs of freedom in any system that produces common good, one has to be sure that some fundamental constraints exist in it as well. If we continue to analyze musical expressions throughout the history of music, we would come to modern pop compositions that are significantly limited in their form compared to the trends towards rejecting any form in expression exhibited in free jazz or the works of some 20th Century composers. And in parallel with the adoration of these constrained and highly rhythmical and predictable forms of artistic expression, which turn into monotonous and minimalistic techno beats in their most extreme contemporary form, proceeds an unprecedented growth in freedom of thought and behavior in the history of human race. This may also explain why I consider jazz musical forms with their intrinsic simultaneity of predetermined harmonies and free improvisations as perfect reflections of the balance between order and freedom in the sphere of music. One demerit of jazz, though, has lain in its fear of descending deep into whirlpools of harmonies evocative of dark, Romanticist passions and in its excessive insistence on joviality, which may sound superficial at times, but if its future forms begin to live up to the Pericles' norm spoken by a protagonist of Béla Tarr's *Sátántangó*, 'Order and freedom are linked by passion', its resurrection from the underworld, which it fell into at the end of the freeness flirtation era in the 1970s, may be expected. If the forthcoming forms of such musical expressions furthermore get rid of the harmonic limitations and embrace chords atypical for the classical jazz sounds, altogether with employing naturalness and spontaneity of the performance and recording, we would, I believe, reach a most prosperous and advanced direction in exhibiting musical creativity¹⁹⁹.

I have also seen the desire for adventure and that inner sense of wonder that prevents one from sinking deep into habitual forms of existence as the innate essence of the white man. Even when this exhibition of an adventurous character is not readily visible, it may still lie deep within one's mind and heart. And note that this adventurous essence of the white man is the source of happiness and glow of spirit in the miraculous moments of discovery as much as it is the source of aimless wandering of the soul, alongside the sense of dissatisfaction and sulkiness that it naturally bears, resembling a beast that is feeble when born and fiery when fully grown, as in the parallel posed by Meša Selimović²⁰⁰, more often than not sowing seeds of destruction all over our patiently built worlds.

The story told by Carl Gustav Jung about him traveling across the United States and coming across the chief of Pueblo Indians, whose *raison d'être* was to help the Sun every single day make the journey across the sky, from East to West, nicely illustrates this. On the day of their meeting, the chief of the tribe, Oshiwai Bianco, offered a concordant opinion regarding the innate traits of Caucasian people: 'See how white men appear austere and cruel. Their lips thin, noses sharp, faces wrinkled. Always having overwrought expressions; always pining for something. White men always crave something; always being insecure and unsettled. We do not know what it is that they want. We do not understand them. We think that they are crazy'. 'Why do you think that they are crazy', Jung asked. 'They say that they think with their own heads', said the chief. 'Of course, what would you expect one to think with', Jung inquired again. 'We think with this', the chief said while pointing at his heart²⁰¹, apparently sharing the ancient Egyptians' view of the locus of thought resting in thy heart.

It is also particularly interesting to see how the adventure of the human mind and spirit that takes place inside of one and the adventure of the human body occurring amid external circumstances normally exclude and complement each other. Many creative people that had been tireless travelers in their youthful days turned out to become inexhaustible thinkers later in life, after they settled into more habitual forms of existence. Often, the more we travel within, across the seas of our thoughts and aspirations, the less appealing the adventures in the outer world seem to us, and *vice versa*. This explains why the blind theology professor from Majid Majidi's movie *The Willow Tree* thoroughly lost his ability to immerse himself in an internal monologue from which creative insights popped like balloons

after he regained sight. The visual stimuli suddenly became so overwhelming to him that the richness of his reflections dwindled and he gradually lost any interest to continue to lead the life of an intellectual and an academician, being a natural corollary of this thesis that ignorance of the external is required for the thriving of the internal and *vice versa*. Or, as noticed in a letter from good man Morteza, a most central character of the movie despite its brief and breezy appearance, after he crossed the opposite path from the professor's and went slowly blind, 'Tell me what's worth seeing and I'll tell you what's not worth seeing. Ever since I've practiced not seeing, I've seen many wonderful things'. Every step taken on our inward journey, through the mind, is thus a step untaken on our journey through life, and *vice versa*. Capture yourself in the moment of an illuminating reflection, thence, and you will realize that the expression on your face is most probably all but exciting. On the other hand, if you find a split second to reflect on your thoughts in the midst of a dancing act, as your body is swinging left and right, the chance is that you will find your mind deprived of sparkles of exciting thoughts, such as those flashing in your head in the moments of stillness, when your gestures, however, tend to appear more dull than enthralling and moving to a casual observer.

As already noted, one of the consequences of the discussed complementary relationship between rigidity and flexibility is that each freedom conceals some implicit restrictions, and *vice versa*: each set of rules leaves space for freedoms and 'escape', so to say. Immanuel Kant recognized this when he stated in the preface to his Critique of Practical Reason that 'the moral law is the condition under which we can first become conscious of freedom... freedom is the ratio essendi of the moral law, while the moral law is the ratio cognoscendi of freedom'²⁰². Implicitly conforming to the idea that truly profound freedoms are impossible to attain without the imposition of rigorous limitations thereto, Ernst von Glasersfeld defined cybernetics as 'the art of creating equilibrium in a world of possibilities and constraints'²⁰³. Kahlil Gibran, on the other hand, noticed how 'your freedom when it loses its fetters becomes itself the fetter of a greater freedom'²⁰⁴, and some art historians nowadays interpret Hubert Robert's drawing a prison underneath a bridge with red chalk not only as a contrast to the freeness, the openness and interactivity that bridges symbolize, but also as a warning as to what comes out of an unfettered flow²⁰⁵. Namely, it spills its content across its boundaries and becomes a part of the parched, solid and congested banks that held it in place and allowed the flow to maintain its form and integrity. For, certainly striking it is to realize that a hypothetically perfect freedom that cut ties with every single constraint to which it had been bound once turns out to be not a freely flying bird of spirit, but a shriveled singularity of being, able to have purpose only as a pole to attach the strings and kites of some new freedoms to. 'Freedom is conceivable only as the result of a movement from *I* to *you*'²⁰⁶, thus says the German poet, Durs Grünbein, accordingly evoking the image of freedom as a freely wavering wire stoutly fixed at its ends. 'All holds so long as strings are stretched to the breaking point', an anonymous actor noticed once, reminding us of the vitality of stresses in life, without which no flexible waving of the strings of which the divine instruments of our physical beings are made could be made possible, alongside the music that emanates from them. Echoing the musings of Leonardo da Vinci, according to which 'art lives from constraints and dies from freedom'²⁰⁷, the musician Peter Gabriel correspondingly argued that 'giving an artist total freedom is castrating... we need an obstruction, in a way'²⁰⁸, specifically pointing at the inevitability of dissipation of the creative powers in us under the conditions that impose absolutely no restraints on the deployment of these very creative powers. These ruminations also shed a fresh new light on the inscription that has decorated a dark wing of the Korean War Memorial in Washington, DC: 'Freedom is not free'. For, every flow of freedom is limited by boundaries and every movement always possesses a room for stillness concealed somewhere deep within it, and *vice versa*. The theory of relativity could thus have been with every reason named the theory of absolutism as well, which is an insight often overlooked by even the most experienced physicists. This is so because the relativity of

spatial and time coordinates depending on the relative movements between various frames of reference is derived from the postulated absolute validness of the fundamental physical constants and laws independently of any relative movements of the actual systems in question. This fundamental physical point of view serves as an excellent pointer at the fact that every freedom has to base itself on a set of constraints within, and *vice versa*.

Just like chess pieces are seen only as carved little sculptures before we introduce rules and restrictions in their movement and interaction²⁰⁹, the nature of life would similarly become meaningless and void without the internal and external constraints imposed on our thinking and behavior. In one of his latest sketches²¹⁰, thus, Ludwig Wittgenstein recognized that perfect doubt, that is, doubt freed from any solid presuppositions, is impossible and that questions can be asked only on the basis of premises, which are, in fact, presupposed answers to some other questions. In other words, one must confine oneself to a box in order to question some other boxes and think outside them. That is, one must agree to limits to push some other limits or else limits will begin to unbearably press on one should one only attempt to erase and eliminate every last trace of them. Or, as pointed out by Cindy Crabb in her beautiful zine, ‘punk opened the world up, but created so many possibilities, that the possibilities started closing on me’²¹¹. This is the same problem that was hinted at by Pablo Picasso when he discussed the modern artist’s disconnection from history and the demand to create one’s own language, from scratch and from A to Z: ‘We don’t believe in rigid standards any longer. In a certain sense, that’s a liberation but at the same time it’s an enormous limitation, because when the individuality of the artist begins to express itself, what the artist gains in the way of liberty he loses in the way of order, and when you’re no longer able to attach yourself to an order, basically that’s very bad’²¹². Hence, it can be said that only through limiting an endless possibility of choices and a boundless freedom of being do the conditions for exhibiting meaningful free choices appear. To vibrate with sounds that carry on elating messages through the air, guitar strings need to be tightly hooked, proving that, as Pythagoras put it, ‘limits are what gives shape to the limitless’. Similarly, gentle and inspirational river flows can exist only insofar as they are limited by firm and stringent river banks. The abovementioned Bosnian novelist, Meša Selimović thus stood on a vista that overlooked the river Drina and thought of how he would have always rejoiced at the view of its overcoming the boundaries imposed on it by the bank and flooding the valley with its gorgeous flow, while being aware all the while that only tamed and directed onto millwheels can it grind the wheat and be pragmatically utilized²¹³. Although I, as a materials scientist and physical chemist of the solid state, spend most of my time immersed in crystal structures, where I observe first-hand the benefit for humanity that comes from atoms’ conceding their kinetic freedoms and getting locked up in crystalline spaces, I still bring to mind Meša’s metaphor anytime I come face-to-face with laws and order that do not steal the soul out of things bound by them, but are instead imposed onto unconstrained flows of fancy to make them expedient and eminent. Constantin Stanislavski observed that while singers tend to pay more attention to vowels than to consonants in the words pronounced, it is the opposite for diction teachers who overemphasize consonants on the account of neglecting the tonal quality of vowels, and the ideal posed before actors that strive to reach expressional perfection is that of S. M. Volkovski: to make vowels rivers and consonants their banks²¹⁴. Similarly, while poetic souls, the worshippers of freedoms and the flights of fancy, have an incessant tendency to value rivers over their banks and the prosaic ones, inclined to order and symmetry, to value banks over the rivers, neither could rivers exist had there been no banks to limit and direct their flows nor would there be lush vegetation and thriving human settlements of the watersides without the river flows to feed them, lest they turn into dry and deserted lands. Likewise, we ought to always keep in mind that every freedom is sustained on sets of stable rules whose sustainability is, on the other hand, conditioned by their unceasing interface with revitalizing freedoms.

The evolution of jazz, in fact, illustrates the necessity for keeping our freedoms within the limits defined by specific constraint if we wish to maintain conditions for their thriving. Namely, that jazz, as of today, is a dead direction in music is no secret, but what exactly killed it is a question that will have amused generations of music historians and sociologists. For, what really did put it to sleep and made passé to the current generation? Was it the desire of bebop whizzes to transmute the danceable swing forms into something thoroughly uninviting to dance to? Was it additionally their stripping most jazz tunes off vocal performances and making them impossible to sing to that could be blamed too? Did they transform jazz into something too cerebral to be embraced by the masses? Or its deprivation of the spirit of mystery, which all magnificent arts embody, is the reason for the decline of jazz as, conceptually, the most advanced musical form that has ever evolved on this planet? Could it be that jazz was not minimal enough for the oldest baby-boomers and the subsequent generations, who went on to embrace more minimal genres, such as rock 'n' roll, rhythm & blues, heavy metal, punk, house, trance and techno? Or is it because the very insistence of rhythm that gave it life, that distanced it from classical music and made it the first subsequent musical genre to be taught in music conservatories all over the world that killed it in the end when syncopated drums became too much for the heart yearning a simple beat, just like its own? Or was it because it became marginalized by hip-hop, yet another major African-American musical genre, whose decline was neatly described in the forty-one seconds of fading music and three words comprising DJ Shadow's tune Why Hip Hop Sucks in '96: 'It's the money'? Jazz musicians have been traditionally earning peanuts from the record companies and jazz club owners and had to be driven by genuine love for music in their musical endeavors, which instilled a whole lot of purity in the latter. In contrast, rich hip-hop moguls owning mansions in Malibu have financially succeeded because of offering vulgarities that the philistine audiences want rather than cordially trying to enlighten them, demonstrating how money-centeredness cannot yield advancements in art and culture. Or is it, as I have come to believe, because the apex of its evolution was reached with its free jazz format pioneered by the likes of Ornette Coleman, John Coltrane, Eric Dolphy, Cecil Taylor, Albert Ayler, Roscoe Mitchell and others, a format in which everything became doable and no themes or standards to impose limitations on one's improvisations were left to exist? For, how could anything evolve from within a system in which all rules are abolished and perfect freedom announces its sovereign reign?

If this question hints at an affirmative answer, then it could be inferred that jazz may have died because of the overstatement of freedom and a total neglect of order. If so, this would instruct us that neither sole orderliness nor sole freedoms are the basis for sustainable actions and that these two must be mingled in equal measures in all that we do if we are to bedazzle the world with our deeds and with our very being. On one hand, the classical music could be said to have had the fate drastically different from that of jazz and that it went into hibernation because of its stiffening insistence on the specificities of a form, alongside its harmonic insatiability, intense institutionalization, 'the rite of passage' demands conditioning creative involvement and, all in all, too much order present in it. On the other hand, however, definite parallels could be drawn between the histories of both of these musical genres. For one, just like the popular interest in jazz started winding down when it evolved into a completely free form devoid of any canons to conform to and structures to lean on to, if not when it stopped being music to dance to²¹⁵, the classical music stopped resonating with the common, nonacademic listeners the moment it entered its atonal stage in the early 20th Century and when all the forms that it had used to embrace became erased for good. The road to getting there was long, of course, having taken many generations and an intense evolution of human aesthetic senses, if not auditory apparatuses, along the way, serving as a testimony to the fact that the quality of music is self-constructed rather than dormant in the music *per se*. Thus we could see the constant expansion of the range of tonality through the successive embracement of tones that seemed dissonant at first, irking the mainstream ears, and only

generations later becoming accepted as consonances pleasing to the ear. For example, the tonality in medieval music was very narrow and even the major third of the diatonic scale was considered dissonant, not to mention the perfect fourth and the dominant seventh, which were deemed dissonant during Renaissance. By the time Baroque became the dominant sound in Europe, the major third became accepted as consonant, although, to complicate the matter, the parallel fifth, which was common in medieval music, started being heard as dissonant. Nevertheless, the expansion continued and by the dawn of the Romantic era, all of these prior dissonances turned consonant. Then came Richard Wagner, in the days when Romanticism began to mature, and demolished the tonal palette with his chromatic acrobatics, continuous modulations, consecutive tritons and delayed cadences for eternities at a time, as in the Love-Death scene from *Tristan and Isolde*, thus paving way for Debussy's modular, open-ended chordal style freed from the need for intervallic resolutions and other impressionists' explorations of atonality, which subsequently, through the work of Schoenberg, Webern, Berg and other members of the second Viennese school of music, evolved to pure atonality, and then to microtonality and pantonality. Albeit achieved with a noble goal in mind, namely that of providing the listener with an opportunity to exercise the auditory senses to recognize beauty in the intrinsically cacophonous and atonal music of Nature and allow one to find the twitter of the sparrows, the splashes of the sea waves or the fallings of the autumn leaves as musically enriching as Beethoven's symphonies, this complete liberation of music from the limits of tonality coincided with the grand downfall in its popularity, reiterating the same question that the fate of jazz has led to: is too much freedom and too little of order equally damaging to the potential for creative expression as too much order and too little of freedom? Is the obliteration of all limits and the attainment of perfect freedom, which the libertines all the world over have craved with all their hearts, one of those things in life whose coming true we come to regret in the end?

Focus of attention is another concept that conceals an instructive insight regarding the necessity of the balance between order and freedom. Namely, imaginable as a tunnel that directs and limits the dissipation of cognitive rays emanating from our intellect, focus of attention, being the basis for creative observing and reasoning, is inextricably tied to self-imposed mental limitations. A terrible confusion would have arisen in our minds had we become deprived of it and had to think every time about each minor decision inherent in our daily actions. Accepting a certain dose of both externally and internally imposed limitations saves us from this cognitive confusion and leaves enough space for our mind to freely roam along more creative pathways. Albeit seemingly a paradox, the fact is that accepting limitations on many occasions equals giving rise to a wonderful freedom of thought and expression. In the end, creativity is all about the balance between spontaneously going with the flow determined by the circumstances and investing efforts to move in opposition to inert streams in which we are immersed. Not a single thought that has been written down in this book or any other valuable work comprising the philosophical heritage of humanity would have been formed had it not been for a combination of one's drifting downstream, driven by the desire to trustfully build upon the tradition of preexisting knowledge, and one's effortful swimming upstream, in the direction of uniqueness and originality. Creativity is also entirely about the balance between our active involvement in consciously bringing about choices in life and trustfully accepting choices previously set forth by others. Needless to say, one such balance is in harmony with the simultaneous exhibition of subjective uniqueness and compassionate conformism that has previously been shown as inherent to the Way of Love.

Henceforth, accepting the ethical rules of conduct in accordance with the ancient principles established in religious traditions of the world does not limit our freedom and creativity, but directs it in prosperous ways. In view of divine ethics as a set of spiritually guiding rules that give rise to enchanting flights of imagination, G. K. Chesterton argued the following: 'The outer ring of Christianity is a rigid guard of ethical abnegations and professional priests; but inside that inhuman guard you will find the old

human life dancing like children, and drinking wine like men; for Christianity is the only frame for pagan freedom. But in the modern philosophy the case is opposite; it is its outer ring that is obviously artistic and emancipated; its despair is within²¹⁶. Without relying on a set of marvelous and spiritually edifying ethical rules, we would appear as if left standing on sandy foundations that ceaselessly crumble beneath our feet as we are vainly trying to build stable towers for comprehensive philosophical views of the world. We would be reminiscent of the aforementioned vain attempts to build a house of windows without ensuring stable foundations first. Whenever we try to raise our glances up high, the sand below our feet will topple down, and the beautiful horizons spreading in front of us will be lost out of sight. Hence, in order to achieve a miraculously creative flexibility in our action and thought, we need to establish the firm foundations of love and respect underneath the epistemological towers on top of which we observe the world.

If we were to substitute these constraining rock bottoms of love and care for the creatures of the world with more freedom, we may easily find ourselves uncontrollably flying away, never to return, like the kite set to glide across the sky without being tied to a solid base on the ground. In that sense, we would resemble Goethe's doctor Faust in his selling his soul to the devil, i.e., substituting his tendency to be peaceful and wise but less attractive to people with an ability to exhibit an enchanting freedom of behavior, thereby sacrificing an eternal salvation for earthly happiness²¹⁷. Yet, it is the balance between drifting freely in the wind, carried but by our desire to attain perfect, divine freedom, and autonomously imposing limits on our freedom of expression through love, respect and compassion for others that makes the kite of our being fly across the skies of humanity in all its subtle charms and beauties.

A major significance of Christianity and other religions of the world lies in their inconspicuous building of profound and stable ethical and aesthetical foundations that set boundary conditions for the exhibitions of our creativity. These ethical bases help in focusing our creative powers so as to maximize the benevolence of their effects and prevent their scattering in little prolific directions. The ultimate meaning of adopting and carefully cultivating these divine ethical foundations lies in the fact that only on top of them are we able to attain an angelic freedom of being that makes our spirit spread its wings and soar into the skies of sublime feeling and thought. Also, once we stabilize these ethical bases of aspiration and thought within our being, anything that we think or do would carry a sprout of divine inspiration in it. Hence, we are free to do whatever we desire for as long as we stand firmly upon these stony foundations of thinking, feeling and acting celebrated in numerous religious traditions of the world.

This is not to say that we should live without constantly revisiting these foundations of thinking and behavior. Quite contrarily, a healthy mind is engaged in a ceaseless dance between faithful acceptance and doubtful examination of anything it thinks of. This is the way to overcome the rigid behavioral outcomes of one's dogmatic devotion to religious norms implicit in Chesterton's saying mentioned earlier. But it is also the way to make the playfully childish hearts of the modern times shine with wisdom and faith. Adopting the divine ethical norms down to the deepest core of our being, yet giving in to the inclinations towards adventurous and playful explorations of it all is the key to awakening the cognitive and behavioral starriness in us. In other words, austerity and freedom ought to be intermingled in both the inner world of our impressions and the outer world of our expressions if we are to become a bearer of divine grace at any age, from now until the eternity knocks on our door. Whatever the case, we must set out now and stretch the strings of our mind and spirit tightly, yet still leave enough room for their flexible wavering in order for the enlightening harmonies that arise inside of us to be released to the world.

The balance of rigidity and flexibility

‘Separate Earth from Fire, the subtle from the gross, gently and with great ingenuity. It rises from Earth to Heaven and descends again to Earth, thereby receiving the force of both things superior and inferior. In this way, you shall obtain the glory of the whole world and thereby all obscurity shall fly away from you. This is a force, strong with all forces, for it overcomes every subtle thing and penetrates every solid thing. In this way the world was created’

Hermes Trismegistus, The Emerald Table

All healthy and sustainable systems in Nature exhibit a dynamic equilibrium between their inherent degrees of rigidity and flexibility. Deviations from this balance between tension and relaxation are responsible for many physical and psychological ailments present in the modern world. One example of disproportionate rigidity and flexibility comes from human vision. Namely, nearsightedness is thought to be associated with an 'eye afraid', an eye that overstrains itself during visual observation and, as such, does not want to see things farther from a certain distance, whereas farsightedness is tied with a so-called 'dull eye', an eye that is overly relaxed and fails to notice important things in its close surrounding. Later in the text I will elaborate the balance between rigidity and flexibility in the dance of our eyes in more detail.

Next, the health problems of collapsing joints and chronic stiffness can be seen as caused by too much strength accumulated in constantly strained muscles. Hence, weak persons suffering from stiffness or physically strong ones being prone to atrophy are relatively rare phenomena. It is the balance of strength and flexibility that makes us really fit. St. Paul the Apostle once said, ‘When I am weak, I am strong’ (Corinthians II 12:10), and we could easily add that a *vice versa* argument is valid as well. Too much strength is, in fact, as undesirable as too little of it. Which is why Yoga stretches and cardio exercises, such as swimming or running, ought to present complementary elements of one’s daily physical training.

In fact, whoever has practiced Ujjayi Yoga breathing with its characteristic hissing sound hearable upon exhalation must be familiar with the integration and focusing of physical and cognitive energy streams induced by it, rendering us more alert, attentive and determined in our daily endeavors. On the other hand, Hatha Yoga exercises, sporting activities and dancing can all stimulate flexibility of our minds and bodies. And we should know that tight focus and flexible openness acting in synchrony are essential for spurring our creativity, regardless of the area in which it is being exercised. Whereas the former has the role of integrating and focusing us around the implosive creative essence of our being, the role of the latter is to dissipate and release the creative bursts of our being and launch us thereby to the very stars, so to speak. After years of following this fine line of balance within ourselves, we are bound to realize that stiffening strength and energetic elasticity, in fact, support each other and that fostering one naturally craves for the inflow of the other. Hence, one of the profoundest aims in life ought to be their precise balancing in every creative task that we get involved in.

Therefore, as researchers, which, ultimately, in the context of experience as a whole, all of us, sentient beings, are, we need to be willfully determined when it comes to immersing ourselves deep into the objects of our research, though at the same time we should maintain a flexible openness towards influences that do not come directly from our specific fields of inquiry, be they professional in nature of solely curiosity-driven. Just like some of the most valuable musical pieces manifest an underlying musicians’ openness to a variety of musical trends, streams and sounds and yet manage to provide an original contribution to their own musical genre, we should always keep one eye of our curiosity on the subjects of our expertise, whereas the other eye of ours should inquiringly follow distant birds of

thought and expression, and gather their flights of spirit around the columnar bases of our creativity. Once placed there, these seemingly distant and irrelevant insights may enkindle the glow of inspiration of our creative acts and sometimes we could even lucidly and metaphorically utilize them for the sake of edifying these very foundations of our special fields of inquiry.

From this perspective, stress can be seen as an ambivalent phenomenon. On one hand, it can induce a collapse of any natural structure, but, on the other hand, we may bear in mind that guitar strings can produce music only insofar as they are relatively firmly attached and tensed. Likewise, any creative state of being always arises from the right balance between tenseness and plasticity. Even love, the feeling that pervades the godliest state of mind of them all, can be said to be sustained on comparatively tense cognitive strings²¹⁸. This is so because it embodies not only loose openness that can be quite passive in its sole receptivity, but a sense of centeredness as well, from which creative expressions radiate outwardly like incisive sunrays of a blissful spirit. Note also that, from the thermodynamic point of view, the evolution of any system towards information-enriched states can be achieved only as the result of constructive accumulation of stress. In other words, to maintain flexibility, we need to be slightly tensed, and *vice versa*: to be rigid enough and, thus, maintain the ability to act as a good information carrier, analogous to a rigid iron bar that transmit stress in sound waves from one end to another with an extreme efficiency, we must remain somewhat loosened up too, allowing our elements to jiggle freely and leave their equilibria positions under even the slightest of pressures. As a former US president remarkably proclaimed, ‘In order to preserve freedom, we must be diligent’, an idea that Eugene Delacroix - who portrayed Freedom in his painting titled Liberty Leading the People as a goddess not passive, enlightened and peaceful, but rather proactive, combative and, as it were, laborious in years that indeed coincided with the end of the Age of Enlightenment and the dawn of Romanticism - would have surely agreed with. But in order to be diligent we also need to preserve freedom. ain’t it so? Or else, in general, governments and any other social structures, should they only defy the balance between anarchy and despotism postulated by the esoteric 19th Century Polish mathematician, Józef Hoene-Wroński²¹⁹, would become inoperative and devoid of their functionality.

A cockerel weather vane perking from a rooftop displays a distinct form of rigidity by always pointing in the windward direction, yet it could be easily concluded that this rigidity is sustained by the rooster’s flexibility, that is, its ability to point whichever way the wind blows. As a matter of fact, if we were to dig deep enough into the nature of any rigidity, we would realize that there are flexibilities lying at its core. This can, however, create an illusion that freedoms and chaos are more fundamental to the fabric of reality than laws and order. One such perspective naturally makes way for the contemporary, westernized strivings to always react in a gentle, relaxed and loosen-up manner, as if carelessly floating in time and space, even though the outcomes of one such attitude are destined for futility without a balancing dose of rigidity, which would make the propagation of more spiritually energizing waves possible. Transparent creatures that momentarily express all the impressions building inside them hardly ever become fruitful artists. To succeed in becoming so, one has to place dams upon the creative waters of pure impression flowing inside one’s mind and heart. Once again, thus, we could turn to Meša Selimović’s musing on the nature of rivers: ‘The river resembles me: sometimes turbulent and foaming, more often calm and inaudible. I was sorry when they dammed it up below the tekke and diverted it into a trench to make it obedient and useful, so it would run through a trough and drive a mill wheel. And I was happy when it swelled, destroyed the dam, and flowed free. I knew all the while that only tamed waters can mill wheat’²²⁰. These words echo the balance between disciplined stances and the inspiring flow of emotions and abstractions through which the artistic spirit and major creative potentials in one get arisen from dust.

Having evoked a turbulent river in our musings once again, it is time to recognize that a prerequisite for the existence of every wave in Nature is the right balance between flexibility and rigidity of the medium through which the wave passes. Had water possessed the rigidity of a solid substance or the diffusivity of a gaseous one, no acoustic waves on the surface of the sea would be visible. Had air had a different density, the sound of music traveling through it would appear quite different to our ears. Talking with lungs filled with helium, a gas whose density is seven times lower than that of nitrogen, the main molecular ingredient of the atmospheric air, thus, for example, increases the pitch of the sounds produced and makes one's voice resemble Donald Duck's. Should the atmosphere on Earth be of an even lower density, approaching the barely existent gaseous envelope of the Moon, the charms of music as we know it would end up being warped, distorted and completely unrecognizable as such. In contrast, if air around us somehow condensed into a fluid material and we were able to attempt to indulge in the joys of listening to music, we would swiftly realize that its notes are shifted to the sinisterly deep ends of the audible spectrum and its beauty drowned in thoroughly incomprehensible growls. An optimal density, providing a resistance to the path of sound waves through the medium, is thus required for musical expressions to spread their wings and enrich our hearts and minds. Likewise, an exceptional rigidity of our mental and physical structures induces barriers that efficiently reflect potentially enriching impressions, whereas an overly pronounced flexibility makes us dissipate in face of the impressive stimuli imposed by the environment.

The overall evolution of life and human knowledge can be seen as a wonderful embodiment of human resoluteness to overcome the innate tendencies towards laziness and passivity with the want and strength of one's will. Biologists could thus tell us that everything our bodies are made of is the physical manifestation of an evolutionary pressure collected in us over eons of our strenuous development from amoebas and algae, some of our most distant predecessors, to humans as we are²²¹. If common men were gods overseeing the Earth in the days of its formation, they surely would have thought that employing the downward pull of gravity would predestine the terrestrial creatures to eternally crawl on the ground and be stuck to it with their whole bodies, like worms or snakes, failing to foresee that by counteracting this force we would erect our spines towards the heavens and learn how to deploy a stunning grace in our physical movements. Likewise, some evolutionary theorists hold that our terrestrial selves ought to be thankful to the deserts that covered most of the Earth during the times when all today's continents were merged in one giant supercontinent, Pangaea, and when amphibians transitioned to reptiles, leaving the land, but continuing to carry a little piece of the sea from which they had originated in the amniotic fluid of their eggs, the habit that we continue to exhibit to this very day. Even when we look at babies in the first months after they pop out of their mommas' bellies, we could conclude the same: living with stress is a vital factor that predetermines our ability to develop properly. For, during no other time in our life do we develop more intensively and rapidly than in the infant stage, which is, accidentally or not, the most stressful period of our lives. Not only is the human life, on average, thence threatened more than at any later time, except in the very old age, but all the crying and screaming is the sign of an exceptional stress undergone by the babies. For example, before the awareness of object permanence is established at one to two years of age, every time a mother leaves her baby alone in a room, the baby feels as if she has disappeared for good. Likewise, as the luminous daytime turns into a dusky evening, babies usually burst into tears, thinking that the sunlight has vanished for good and that people have been permanently transformed into dark shadows. All these impressions impose a tremendous stress on the child all throughout the day and yet it is through this stress that the child develops with an equal tremendousness. Indeed, no better everyday example could be given to illustrate this vitality of the importance of various forms of stresses for our spiritual growth and, conversely, the spiritually devastating effects that living in a stress-shielded environment delivers to our being. Human beings, in

fact, can be said to deal with stress *per se* fairly well, but troubles usually begin when the source of the stress gets abruptly removed and all the excess stress piled up internally decompresses; that is when the most adverse effects on the organism occur, as in analogy with the bends experienced by the divers who emerge from large depths to the surface of the water too quickly. Therefore, we should be sure that if everyone fully obeyed the classical, neo-Freudian psychotherapeutic advice to release all the tensions and reduce all the stress at every cost, so sadly popular in the Western world, all further evolution would be instantaneously brought to a halt. Correspondingly, it is known that the evolution of the human genome is still going on, as well as that it occurs exactly under the stressful effects induced by various environmental factors that include diet, infections, constraints of the climate and behavioral demands²²², all in order to make humans more powerful and resilient in the co-evolutionary enfolding of ever more brilliant features of consciousness and life. This, of course, stems directly from the elementary principles of thermodynamics, according to which stress provides for a vital source of energy by means of which physical systems undergo internal restructuring and conversion into states of higher order and more sophisticated interaction with their environments. Jung, thus, understandably, confronted Freud's idea of favorability of releasing stresses piled up inside our bodies and minds with a strong and resolute belief in neurosis as a drill that deepens our personality and broadens our consciousness. We could imagine this drilling effect as also being akin to a fearsomely experienced slump, somewhat like Alice's upon descending into Wonderland, gravening the darkest depths of our beings, but eventually making us deeper than the deepest fountain, free to squirt the watery confetti of exciting acts and ideas that emerge from 20,000 leagues under the sea of our soul and are sent into ever higher and heavenlier realms of being and thought with every stressful thump against the seabed of that glowing divine egg implanted in our heart.

If we analyzed the nature of human creativity more deeply, we would come to conclusion that all the fantastic human accomplishments have sprung from a majestic underlying desire to achieve something extraordinary for the sake of enlightening the world. In that sense, every form of creativity is rooted in human visions and aspirations. Without the latter, our actions would be either thoroughly dispersed or robotized, which would either way strip away the epithet of creativity from them. When I try my best to trace the roots of my belief in the extraordinary potentials that I have been endowed with for the sake of bringing about a divine salvation to the world, I arrive at the sense of my own specialness reverberating in every detail of the world. It is as if Nature herself has been incessantly whispering to me in her mystical language about the importance of following her and my own way, coalescing in the concept of the co-creational nature of existence. In essence, this means that an authority is required to keep the referential frames for our creative decisions in life stable. A giant responsibility is what moves us to produce great deeds, and there is an impression that this enormous responsibility can be supported by the powerful underlying sense of authority only. Additionally, like a counterweight on the weight balance of our spirits, this sense of authority nested inside of us keeps our strivings for freedom in check and prevents our detaching from the grounds of empathy and of profound concern for the wellbeing of another and flying away into the vacuous skies of selfish individuality that dispirits and dehumanizes all that it comes in touch with.

In fact, the Bible offers one of the most striking examples of how authorities in terms of referential sources for bringing about responsible decisions in life ought to be present in exhibiting any form of creativity. Namely, the Christ attained an unprecedented creativity that provided him with supernatural healing capacities based on an appreciation of the authority of the Father, used as the metaphor of the underlying intelligence that is named Nature in the framework of the co-creational thesis. This authority that supposedly endowed Jesus with the divine mission that he had to accomplish on Earth was so powerful that all the other authorities usually embraced by ordinary humans faded

away. Likewise, if we desire to get rid of the shy freezing of our creativity in face of the sense of authority imposed on us by the surrounding creatures, we might do the same and make Nature, the other side of the dialogue through which all the details of the world of our experience arise, equivalent to the Christian Father. In order to annul the scattering and diminishing effects of the surrounding authorities on our creativity and make it productively focused, some people keep in their mind suggestive mantras, images of saints, beautiful frescoes or simply keep values of their muses, real or imaginary, as guidance in their hearts. This is certainly reminiscent of the ancient Hindu story about the giant who chases after men who forget to fill their minds with the right background message and ‘burns them in the fire of vain contemplation’, as Symeon the Stylite, the epitome of devotion to meditation, having spent nearly four decades atop a pillar in the Syrian deserts, would have phrased it. Too much freedom and entropy, thus, inevitably leads to disastrous states for our mind and body alike and, despite the popular abhorrence of the word ‘authority’ among the true intellectual elites of the day, ideals, as sublime forms of authority, need to be hung onto to outline the channels for the expression of our being in the right directions, lest we swiftly dissipate into uncreative nullity. Just as judgments may be looked down upon by the postmodernists, yet they are a necessity, as without them the compass of our cognition would not differ a chasm from a green pasture, both of which abound in our worlds, ideas and concepts embraced as abstract authoritative figures in the sphere of our thoughts condition the properly conducted thought process. In other words, this is to say that the balance between order and freedom is what we should strive to implement in truly everything. ‘There is something in every human being that responds to the urge for revolt against convention, for spontaneous expression – just as there is in every human being a faculty that longs for conformity and order; but, just as it is obvious that too much conformity and order may lead to sterility and vain repetition, so there are problems inherent in entirely untrammelled expression’²²³, says the art historian, Alan Gowans, reiterating this necessity for balancing laws with lawlessness in everything we do. After all, the evolution of life proceeds through the interplay between order and freedom, a.k.a. chaotic randomness, an essential source of novelties in all cybernetic systems²²⁴, and what applies to these fundamental physicochemical and biological domains of life must apply to its abstract, socioeconomic, geopolitical and other spheres too. Without either of the two sides, entropy, chaos and fluid freedoms on one and organized patterns, compactness and solid order on another, no evolution of the worlds, inner or outer, could be imagined, and without unending evolution and incessant change neither could be the stability and sustainability of these worlds as we know them preserved.

Still, being guided by authority and authority only is to become a robotically stiff bearer of their messages, not ours, and never a stellar source of creativity that channels the divine energies out of his soul outwardly. In fact, in my life, I have faced many people, including myself on certain occasions, who never got to fulfill their dreams of creative acting in the world because they would always become spontaneously constrained in the presence of the authorities of others. Luckily for me, however, I have been mostly immune to this constraining effect of authority on my creativity in the realms of science and philosophy. The reason is, to some degree, because long time ago I learned that authorities are to be loved, not feared, if we wish to set ourselves in a humane and productive relationship with them. Still, my immunity in this respect mostly owes itself to my father, who himself acted as a sole authoritative figure in my world of science, whereas the same role was played by my mother in the sphere of expression of my philosophical thought. To fulfill my father’s wish to raise a son who would leave an unprecedented impact on the world of science and to pay homage to the divinest beauty of being that my mother was, I transformed into an unstoppable moving train, sending sparkles of fireworks of creativity all around. To manage doing so, sometimes I have made mistakes and blunders, but I still believe that my works have been sent forth to glide through the virtual seas of human knowledge so as to provide

precious guidance and inspirational stimuli for researchers and philosophers all over the world some day.

So we see that the quests of youngsters all across the globe for the meaning in life are reminiscent of the tale of Pinocchio who had been given freedom from being a mere wooden dummy, but only to discover that the greatest freedom is inseparable from obeying certain rules of behavior. As he discovered the meaning of the balance between limitations and freedoms, he managed to return back home and save both himself and his Father from the jaws of a voracious whale and the low spirits of tempestuous seas. As Bob Dylan pointed out, 'I think of a hero as someone who understands the degree of responsibility that comes with his freedom'. Without limitations for our creativity, the greatest potentials residing within us would never be able to shine forth. And yet, it is the shine of this yearning for the divine freedom that instills the loving preciousness into the fetters of our frail humaneness.

Compensating rigidity and flexibility

'Turn not to the right hand nor to the left: remove thy foot from evil'

Proverbs 4:27

'You'll get mixed up, of course,
as you already know.
You'll get mixed up
with many strange birds as you go.
So be sure when you step.
Step with care and great tact
and remember that Life's
a Great Balancing Act.
Just never forget to be dexterous and deft.
And never mix up your right foot with your left'
Dr. Seuss, *Oh, the Places You'll Go!*

Commitment as a reflection of strong and deliberate ethics, depicted by the image of a firmly rooted tree and Erich Fromm's words that 'love is staying'²²⁵, presents a single pole of healthy and creative attitudes in life, whereas flexibility reflected in form of continual doubtfulness, questioning and seeking presents its natural complement. Just like bell founders need to optimize the content of tin in the bronze alloy until the right balance between elasticity (a.k.a. rigidity in materials science vocabulary) and plasticity is achieved, lest the bell deform under the blow of a drumstick if the content of tin is insufficient to prevent copper crystalline planes from sliding past each other or crack and fracture, like the Liberty Bell in Philly, if the content of tin is too high, so must we constantly shuffle and reshuffle the contents of our consciousness in search of a precise equilibrium between rigidity and pliability, between coming back to an original state after the blows of a hammer are gone and undergoing free and leisured flow with every stimulus imposed on us, living life as a sort of hermaphrodite born out of the marriage between the stone and the sea. Henceforth, it is an incessant challenge and ongoing adventure to preserve this balance between firmness and flexibility. For, as it happens with all other balances essential to life, the moment we feel certain and proud of its having been found, it dissipates like a flock of fairies in the air of the midsummer night.

However, we should also be aware that rigidity and flexibility could precisely compensate each other by being dominant at different levels of one's personality. For example, holding on to the strict rules of conduct of physical behavior can open the door for creative adventures in thinking, and *vice versa*. A likewise ideal was ascribed to Immanuel Kant, who had been allegedly so precise in his daily

routines that people could set their clocks by the time he passed by, and all that with the purpose of letting his mind be free and adventurous in its roaming over the uncharted territories of human knowledge. On the other hand, it may be a common experience that when one finds oneself on the road, immersed in an incessant flow of perpetually changing external stimuli, one's mind tends to trail familiar patterns of reasoning and adopts a disciplined attitude of firm resolution to maintain the balance in spite of the environmental changes and faced novelties. Thus, I noticed that whenever I change the living environment, it takes some time until the surrounding novelties that capture my attention settle down into the cognitive background, letting my mind once again to start floating with the ships of its ideas along its usual, adventurous course.

Once one settles into a regular pattern of daily habits, one's mind starts to wonder from petty things pertaining to mere survival to more complex questions that pervade the order of spirit, life and the Universe. And conversely, once one sets feet 'on the road' and one's eyes start to physically wonder over some external landscapes, it becomes hard to wander across the landscapes of one's soul at the same time (unless one identifies one with the other in a lucid and miraculous way, which is what the co-creational thesis, *en passant*, points to). Instead, one then attains a certain peace of mind. And the balance between periodicity and novelty becomes preserved again.

These compensative correlations might be the consequences of a nearly constant amount of activity that churns out suggestions and decisions within the brain in a single day. Consequently, the more boundaries our senses simultaneously draw and follow (as the co-creational thesis suggests) in the world around us, the lesser the number of lines that will be drawn on the canvas of our mind, and *vice versa*.

Another example of this reciprocity between rigidity and flexibility comes from the field of ecology. Remember, out there exist some species of humans who increase their own flexibility of behavioral choices at the cost of increasing the rigidity of the supporting planetary biosphere.

In a similar fashion, we may easily notice how as people grow older, the tendencies to cultivate and sometimes become obsessed with preserving order in favor of neglecting the need to foster freedom take hold. The reason is of biological nature. Namely, elderly persons find their metabolic and thought patterns easily disturbed by external influences, and their desire to stick to habit and order seems to be reflected in all aspects of their creative existence. On the other hand, young humans have the ability to naturally restore their healthy balanced states of body and mind, and are therefore much more prone to experiment with external influences. Correspondingly, they are more oriented to the aspect of freedom, rather than to the one of order.

At the same time, they are more open to turning things up on their head and reverting the paradigms of stagnant and clichéd ways of seeing the world and guiding our actions in it. As a reward for their going against the stream, which only things truly alive can do, as G. K. Chesterton noticed in his discourse on the essences of Christianity²²⁶, Nature often rewards them by placing pearls and petals of some revolutionary discoveries on the palms of their hands. This surely explains why the likes of Albert Einstein, Werner Heisenberg and many other pioneers of quantum theory, as well as a number of prominent mathematicians, from Leonhard Euler to Carl Friedrich Gauss to Niels Henrik Abel to Évariste Galois, all made their most fabulous discoveries in their youthful days, practically before they turned 25. Of course, the contrary example of Immanuel Kant, who would not have been remembered by humanity at all had he only lived up to the age of 60, since he wrote each and every one of his major works after he passed that age, is here to prevent us from falling into blind worship of any fixed rules in this life. Having touched the sublime realm of math, I cannot help skipping over the fact that regardless of its being an epitome of cosmic order, even it possesses fascinating irregularities, which we may recognize if we look deep enough into it. My favorite example that speaks in support of this statement is

the difficulty in predicting the order in which primes appear among natural numbers. Sometimes they are found separated by a single digit, the largest example of which is the so-called twin prime equal to $65516468355 \cdot 2^{333333} \pm 1$, while on the other hand it can be relatively easily proven that for any given number n , there is a sequence of n numbers that do not contain a single prime²²⁷. Hence, as we see, even the realms in which we would naturally expect to find nothing but order always contain seeds of chaotic confusions and disorderliness sown throughout it, while even the most disarrayed systems imaginable always possess principles woven into them that prompt them to spontaneously stream towards periodicity and order of some kind.

This is all to say that whenever we see the things continuously changing and flowing away from us, we should be sure that something invariable and perfectly preserved is concealed underneath. As someone who has extensively studied epistemology, I could tell you that no such thing as an absolute relativism could exist in the domain of knowledge. A relationship, the most elementary thread of any body of knowledge, cannot exist but on the basis of a presupposed constancy against which changes intrinsic to the relationship are postulated. This makes perfect relativism a practical impossibility, as every relativistic worldview must be equally absolutistic in its essence too, a claim that is illustratable by Einstein's theory of relativity: namely, in order to consistently support the relativism of spatial and temporal coordinates, it needed to postulate something absolute and immune to change. This absolutistic bedrock in Einstein's theory is the assumption of constancy of the speed of light under all physical conditions and in all possible reference frames. In a way, just as James Joyce's stream of consciousness classic, *Finnegans Wake*, 'is above all else an essay in permanence', an ode to a 'resilient, all-enjoying, all-animating Yes, the Yes of things yet to come, a Yes from beyond every zone of disillusionment'²²⁸, so has Einstein's theory of relativity been primarily about constancies pervading the physical reality as grounds of any relativism in it. When we look at the emanations of life, then, it should not surprise us that orders lifted in them are such that they open space for even more of entropic freedoms, whereas new freedoms arise never with the intention to crush the preexisting orders, but rather to celebrate and dance, so to speak, on their cornices. It is as if all things living live in accord with Lao-Tzu's norm, 'Heaviness is the root of lightness, and steadiness is the master of movement' (Tao-Te-Ching 26), celebrating both the Chinese sage's idea that the cores of usefulness of the spinning wheels, of drinking cups and of dining rooms lie in their still centers and empty interiors, respectively, and the swirly look of the Tai-Chi-Tu emblem, a sign that every constancy in Nature, in this case of a black-and-white circle or a sphere, can exist only insofar as its interiors resemble ever-changing whirlpools wherein things flow in and out of each other, shifting faces and identities, incessantly.

A train moving unstoppably across starlit fields is going to be a final image used to reflect this fundamental synchrony between steadiness and change. For, although it is emblematic of determination and decisional singularity as it runs along its fixed course, it also symbolizes the human need to embark on the adventurous paths of voyage and discovery. As such, it stands forth as a wonderful depiction of the balance between stony strength and watery flexibility, that is, of Yang and Yin, respectively. Moreover, one such combination of the unstoppable determination of a steaming train and the pursuance of the ideals of freedom and wonder in its fixed and steady course, albeit intrinsically absurd and paradoxical to many, depicts the essence of my being and my approach to creative work, including the writing of these words. For, once, not so long ago, I realized that in order to keep on creating like an OK computer or a wound-up clock, independently of praises and critiques, as if under a glasshouse or in a stellar bubble, untouched by what anyone has to say about these works, listening only to the divine choruses of angels echoing inside me, I had to annul my self-awareness and simply go with the flow of some mysterious energy enwrapping and pervading my being. In letting my mind go with this flow, I have resembled a steaming train that runs its course with no heed of what is left or right of it, losing ever

greater pieces of social consciousness with every spin of its wheels, but at the cost of crafting notes that ever more beautifully glorify the exact opposites of what this train symbolizes: the breadth of one's views, the art of looking sideways, the humane imperfections that constantly fall out of tracks and disobey any predetermined plans and programs and that improvise by being receptive to the feedback of every tiny leaf, raincloud and birdsong, let alone the human voice or presence that open up like holy books around us. It is no wonder, then, that the image of the train was made the object of one of the most inspiring allegories about the marriage of science and arts²²⁹, i.e., of reason and beauty ever conceived. It was written by Gregory Bateson, the thinker who set forth the principles of systemic thinking as a sort of grounds for the Glass Bead Game for the modern times and who envisaged his apprentices, one of whom may be seen writing these words, taking his aesthetic viewpoints to new heights²³⁰. Thus, at the end of his lifework, referring to Coleridge's Rime of the Ancient Mariner, the poem in which the sea snakes fell from the sailor's neck and into the sea after he 'blessed them unaware', he says that 'after all the discussion of mind and tautology and immanent differences and so on, I am beginning to be ready for symphonies and albatrosses...'²³¹.

Science as an adventure of the human mind

'Scientists should not be ashamed to admit, as many of them apparently are ashamed to admit, that hypotheses appear in their minds along uncharted by-ways of thought; that they are imaginative and inspirational in character; that they are indeed adventures of the mind'

Peter Medawar

Like the train barreling across the land with a blend of steely determination and exploratory daringness, each scientific research should comprise the balance of disciplined and adventurous attitudes. Responsibility and diligence that tie us to approach the old and the actual scientific traditions with awe and respect on one side, and an inquisitive thirst that makes us sail with our ships away from the safe and familiar harbors of the standardized science and into the uncharted open seas of knowledge on the other side, are indeed neatly entwined within all the majestic emanations of the human mind.

If the fosterage of discipline exceeds the emphasis on imagination and freedoms, robotized intellectual attitudes will tend to pervade the scientific society, and intellectual inertness and creative passivity will consequently take over. Immersed in one such reality, the railway tracks would turn into a metaphor of predictability, tedious routines and lifeless automatism; as such, they would justify the poets' calls to break these shackles of discipline and the ensuing cry of how 'the rails dragged me under the wheel of the machine', as in a song by the Serbian bard, Đorđe Balašević²³². On the other hand, if instigations of freedoms are so high that they exceed the extent to which the attention is focused on patient scrutiny, anarchistic attitudes and irrational and futile communications will prevail. Could it be, however, that the former diagnosis is more accurate for most of the scientific societies worldwide? If it is so, then today's students should be primarily reminded that each scientific research is to present an adventure in the relationship between human mind and Nature. It should be a quest for the treasures of knowledge, and a mind on this path needs to fully and faithfully reflect this pioneering epistemological nature. The personality and attitude adopted by a fruitful scientist also need to be adventurous in each of their facets, ending not with the science one has in mind, but extending all the way to domains of more profound ontological significance, e.g., posing introspective questions about the deepest meaning of existence and ceaselessly fostering contemplations about the creative and inspirational conduct of behavior and thought.

This is why, out there on the lecture podium, elaborating intricate topics to aces and novices alike, I transform myself into an authentic embodiment of adventurousness, rolling its wheels and never stopping, moving from one planet of thought to another and yet another and empathizing with them all along the way, just like the Little Prince would do, and all that regardless of how disconnected they are from each other, separated by but impenetrable cosmic darkness, knowing all the while that only if we strive for adventure and reinvention of our beings that adventures bring forth can we become a pioneer that discovers exotic lands and bring some of the treasures buried in their soils to the souls spinning around us like shiny stars. Although many are regularly puzzled by this habit of mine to hop between seemingly most remote celestial bodies in my mental microcosm, believing that it hurts the quality of my scientific presentations, I heartily disagree. I have known that the best way to establish a cordial connection in written communication is to include a tiny distraction from the subject in it; similarly, the best way to touch people's hearts in the elaborative course of our presentations is to intercept them every now and then with a proposition or a story that seems unrelated to the central thread (even though there is no such thing as a thread unrelated to another thread in this reality in which all is interconnected). Diverting every once in a while from the main content of a presentation to tell a story that distantly touches the subject that is being discoursed on also keeps the listeners awake and makes them more receptive than linearly proceeding treatises that never stray from the topic. This seemingly paradoxical principle may be a natural consequence of the fact that an essential element of all intellectual adventures in which we participate is a constant escape from myriads of blind spots that multiply in our views as soon as we settle in them. It is worthwhile to note that parabolic descriptions, which have been used by sages all the world over, are particularly meaningful in this sense because perception of a relationship from a new angle is easily and elegantly achieved by their means. As such, they aid in stepping away from the stances being held and in avoiding the blind spots in which our intellect may be trapped if it only sees the relationship from a single angle. Babies easily get bored of resting stilly in a single place, requiring constant movement to be kept tranquil, and if this observation tells us something through its quirky metaphor, it is that our cognitive makeup requires incessant adventurous movement back and forth in relation to the subjects of its focus to ensure and sustain optimal learning conditions. To return to the stage of an infant that sees it all with dewy-eyed wonder and be on the road, tirelessly, at all times, with every facet of our being, in mind and body alike, is thus the aim posed like a guiding star ahead of us.

When man is young and starry in his spirit, the sparkles of simultaneous wonder and guidance that stars symbolize, stimulating both questions and paths to the answers, arise in his mind like a lusty and vivacious firework of emotions and thought. One such barrage of visions, feelings and ideas overwhelming a juvenile, yet visionary mind was captured by the Pixies in a song about Alexandre Eiffel as a child 'standing in the archway'²³³. The collision of a thousand voices, some of whom disbelieve and some of whom 'believe in the archway', and countless emotions, one second magnifying and another second annihilating each other, is musically created to describe the magnificence of a moment when a child who would go on and create the world's biggest and most famous archway found himself in an archway and felt deep inside this colossal emotion that would guide him toward this goal. However, when man gets older in his spirit, his inner desire for security and stability seems to prevail and these adventures, whose seeds lie in mind first and foremost, only then to be transferred to external circumstances, slowly cease to exist. Conversely, if we wish to look after the starriness of our spirits, we should wonder and dream in our minds and hearts. Let us not lock our thoughts and emotions into prefixed attitudes, feelings, conclusions and impressions. Let us set ourselves instead to undying quests for the sake of making the world a more enlightened place than it has ever been.

Lest we end up locked in a crestfallen cocoon, looking out of which it'd appear as if 'it's all the same, it's all the same', as in R.E.M.'s *Country Feedback*, we must learn to innovate and improvise, to see things from perpetually new perspectives and perform them in forever novel ways. Of the recording of the vocal part of *Country Feedback*, that timeless pop epitome of a desperate outcry for missed chances to fly onto the clouds of happiness in life, the guitarist of the band that authored it, R.E.M., said the following: 'Berry and I wrote and recorded the music in a couple of hours. Michael came in the next day and scatted the words. Usually, he has pretty concise words. We get to look them over. We'll say, 'Repeat this. Pull this out. Maybe change this line'. With *Country Feedback*, he just had two little drawings on a piece of paper – an Indian head and an arrow, I think – and he just kind of shouted'²³⁴. The band's faith in such an improvisatory approach to musical creation was insinuated a couple of years earlier, at the very end of their previous record, *Green*; therein Michael Stipe sang of having 'made a list of things to say, but all I really want to say is hold her and keep him strong while I'm away from here'²³⁵, invoking the image of him coming up with a bunch of things to say written on a stack of papers, which he tosses in the wind when he finds himself on the stage, seconds prior to delivering his performance. These visions that illustrate the attitude of spontaneity and naturalness that launched the 20th Century performance arts to stellar spheres irresistibly bring to mind another true story about a famous professor, allegedly Isaiah Berlin, who had prepared for his six-hour long²³⁶ lectures in the following way. He would first write down a few pages of text in a neat order a couple of days before the lecture was about to take place. Then, he would start cutting the text until it was not more than a page long. That would happen a day before the lecture. Then, the following day he would reduce the text down to a single paragraph. An hour before the lecture, he would narrow that single paragraph down to a single sentence, and when he was about to enter the classroom, he would throw even that single sentence away, and face the audience without any written or remembered concept at all.

This story may sound so impressive because it presents a mirrored, diametrically opposite and time-reversed approach compared to that accepted as standard nowadays. However, it may present a perfect balance to the overly prepared presentations of the modern day, which start from intermingled and amorphous concepts that lead to a single sentence to a single paragraph and finally to a few pages of text written in a fine and precise order. These excessively predefined lectures tend to naturally induce drowsiness and disinterest in the audience and are the main reason why I find presenters at scientific conferences of the day the greatest distraction to attempts to grasp the already affluent and most of the time quite self-sufficient content of the slides shuffled behind their backs. However, this could all be different had the presenters, first of all, refrained from robotically reiterating the message that is being simultaneously textually presented. Still, since the intention of most of them is to pompously boost their greatness and reputation as well as to fortify themselves against possible showings of ignorance, they naturally, although unjustifiably opt for confusing the audience with a hodgepodge of impressions rather than letting their minds take deep breaths and unwind under the skies of intellectual translucence and clarity. To counteract this inherently flawed approach through which one does not reveal, but cover oneself and one's knowledge with the veils of too much unnecessary information, the general rule that I stick to is that either no more than 20 words appear on the slide displayed behind my back, in the case of which I always leave seemingly odd silent gaps in my talk so as not to interfere with the audience's reading the text, or presenting completely wordless slides, in the case of which I am free to fill many of these gaps with spoken verbalizations. Secondly, this sad state of affairs in the domain of scientific lecturing could be improved should the presenters embrace naturalness and lack of pretension as the way to inspire the audience with their appearance and message. Therefore, whenever I am out on the stage of a big lecture hall, I try to give an example as to how an inspiring lecture ought to be held, and that while never ceasing to hold on to the balance between premeditation and improvisation. For, infusion of our

performances with expressional elements that are spontaneously unchanging, if not preplanned, is important in (a) building and sustaining our character, definable as the focus of deterministic forces²³⁷, and (b) endowing our performances with recognizable authenticity, the improvisatory element is equally vital in making our expressions strikingly relevant and resonant right here, right now, in the heart of the moment. As a matter of fact, the performance artist, Ruth Zaporah claimed improvisation to be ‘the march toward feeling’²³⁸, and, conversely, the more we robotize our expressions by being a slave to habit, custom and preconceived routes, the more distanced we turn out to be from the capacity to emotionally respond to stimuli in an electrifyingly authentic manner and brighten up the gloomy hearts around us thereby. Still, having an elaborate scheme in our head as to where our expressions are leading, that is, a partially preset plot for our interactions with our surroundings, is important in preventing us from becoming thoroughly disoriented due to our aimlessness, like the journeyer unable to figure out which road to take without knowing his destination. The mysterious director’s shooting movies with the camera tied to his back as he walks up and down the cobblestoned streets of Alfama in Wim Wenders’ *Lisbon Story*, William Anastasi’s allowing the rhythm of the bumps and turns of the subway train *en route* to his weekly game of chess with John Cage in downtown Manhattan to create ‘blind’ drawings that now decorate the interior of Los Angeles Museum of Contemporary Arts, or the habit of the Irish composer, Michael William Balfe to wait for the moments of complete deprivation of inspiration to start randomly pulling stickers containing the letters of the musical alphabet from a hat and placing them one by one on a notation with predefined key and time to create musical compositions²³⁹ present such extreme points in the departure from the structure and the embracement of a complete, arbitrary freeness of expression, although unable to yield the impulses that propel one toward divine loci thereby. Albeit an artist whose art was intrinsically improvisatory in nature, Miles Davis, notably, had an aversion to purely improvisatory music, music devoid of any preconceived thread, including the atonal free jazz, and all throughout his career worked to ‘impose a perfect combination of the loose and the prepared’²⁴⁰. For, with one such approach based on well-balanced visionary preconception and improvisation, yielded could be an impression of ticking precisely like a well wound clock or steaming forth unstopably like a predetermined train, while at the same getting lost in adventurous uncertainties every now and then, as if living up to the ideal implicit in the way of life of Thomas Mann’s Hans Castorp: ‘You walk and walk, and you never get back home on time, because you are lost to time and it to you’²⁴¹. For, I know that by adding a pinch of improvisation to a well composed concept, an imaginative and inspiring liveliness is infused to it, bringing forth a viable balance between the preconceived, structured and solidified on one side and the spontaneous, random and spur-of-the-moment on another. Neither perfectly predictable and monotonous monocrystals of knowledge nor amorphous, finely powdered and unstructured ideas would be produced in this way, but fine pebbles that may induce awe and wonder in others by their intrinsic harmony of order and chaos, clarity and mysticism, symmetry and asymmetry.

For, remember, just like most materials applied in high-tech devices are crystallographically ordered to some extent because the level of translational symmetry directly translates to the intensities of an array of physical quantities typifying them, so is some order in the bodies of knowledge that we craft and wish to hand to others a necessity, lest all that we utter turn out to resemble a vague and voodoo mumbo-jumbo utterer. On the other hand, we know that, given the fact that atomic species diffuse through solid matter by moving from one vacancy to another or from one interstice to another, amorphous materials, intrinsically pervaded by defects, are far better at conducting the movement of atomically sized entities through them than their crystalline counterparts²⁴². Likewise, moderate disorderliness, along with myriads of uncertainties, wonders and perplexities that it brings forth, needs to exist in our minds if we wish ideas to travel through them with great ease. Thus, a brief, yet imaginative look at the solid systems in our proximity is enough to lead us to conclude that a balance

between order and disorder, tidiness and entropy, regularity and freedoms ought to be set before our minds could become melting pots for the brewing of magnificent, lifesaving ideas therein.

Soon after and later in the text, I will have pointed out why and how the process of arriving at novel ideas highly resembles the phase transition between an amorphous, fluid state on one side and crystalline on another. For now, it is enough to recollect Jorge Luis Borges' saying that 'creative mind is a dream with the leash', a thought I discovered in one of the many Borges' books I read during the second year of my college, which I decided to fail, in part because I took to heart the student protestors' call for a strike and refused to attend the university classes, and in part because I wanted to catch up on the world literature classics. This thought is meant to remind us that creative ideas arise along the seashores of human mind where waves of cognitive flexibility, randomness and intuitiveness crash over firmly shaped coasts of knowledge. However, in order to transform these ideas into lasting messages to humanity and have them inscribed onto stones and leaflets of the accounts of human knowledge, we have to be fast enough in moving every now and then back inland. Because, that is where long-lasting towers of knowledge ought to be based. If we decide to inscribe our creative thoughts exactly where they have been born, that is, along the coastline of our worldviews that correspond to mystical regions of our brief awareness and short-term memory, these records would turn out to resemble castles made of sand or bare footprints that readily become washed away by the sea. Because the same sea that gives rise to the miraculous diversity of life transforms the morphological versatility of stony ridges, amusingly unique pebbles and tender love messages into a monotonous, sandy uniformity of particle assemblies. And this process of moving back and forth between adventurous and exciting regions of human mind and safe harbors where carefully kept collections of the records of human knowledge reside neatly reflects my own approach in writing this and other books of mine. It explains my passionate eagerness to entail every creative thought arising in my mind with a conscious retreat to a pen and a paper in order to write the idea down and bring it as a sacrifice of my God-given and socially nurtured intellectual capabilities back to humans and Nature, which will all hopefully benefit from it one day.

Moreover, as I already insinuated, writing a book or an essay can be fancifully described using the terminology of solidification processes. Namely, disconnected ideas at first become written down without any conceivable order. The concept of how to organize the ideas into a well-structured whole is still lacking at this stage, thus resembling the formation of unstable solid nuclei that grow but dissolve, because of not reaching yet the size limits after which the growth would become energetically favorable and spontaneous. However, once this critical limit is reached and the structure of the whole gets dawned on us by a process comparable to an enlightening revelation, the individual sentences, like diffusing atoms in the crystallization process, get to be easily adsorbed, rearranged and chemically bound, yielding as the result a unity that we may become proud of. Thus, the first steps in writing new ideas are the hardest, and as we move forward in this mere collection of unlinked ideas and cross the energy barrier for 'nucleation', reaching the critical size limit, the things start to flow easier. Recall also that this critical size limit depends on the level of supersaturation, and the more ideas fill our mind, the larger the supersaturation will be, so that the critical size limit will be reached sooner. In addition, it is worth recollecting that practically every nucleation process starts on a foreign surface, such as a gas bubble, container wall, dust particle or some other impurity, where it takes place under considerably more favorable conditions. Similarly as navies intentionally sink ships at places in the sea at which they desire coral reefs to start forming stable structures, chemists introduce active foreign surfaces to promote nucleation of new phases and profound thinkers place a single sun of an idea in the center of their minds and let it inspire stars and planets of other thoughts to rotate and align around it. In his seminal work, *On Love*, Stendhal wrote of the custom of throwing a leafless bough into Salzburg salt mines in the winter before picking it up in the spring again and finding it covered with mesmerizing crystals²⁴³. Thereby he

offered us a real-life analogy of the way beautiful new forms of knowledge crystallize on top of a meticulously chosen and maintained seed in the mines of our mind. To sum up, once a solid structure of some preexisting knowledge is present, the formation of other bodies of knowledge on top of it becomes favored and more facile.

Now, yet another remarkable parallel between the world of crystals and that of human thinking awaits us. Namely, atoms and molecules from solution or air have a hard time finding sites to attach onto an ideal, perfectly flat surface, and the same applies during the crystallization of our knowledge. Surface irregularities, such as kinks, steps or terraces, are those where atoms most easily anchor during crystal growth. In fact, according to the classical models of crystal growth, which describe the latter as directly related to interface morphology, perfectly flat crystal faces would not grow at all without surface defects on them²⁴⁴. Moreover, experts in the science of grain sintering might add at this point that only the grains with rough, atomically disordered surfaces can exhibit the normal growth, during which a unimodal and invariant relative grain size distribution appears over time, whereas those with faceted, atomically ordered surfaces can exhibit only the inhibited or abnormal growth, during which a rapid growth of a small number of large grains occurs at the expense of the disappearance of a large number of small grains²⁴⁵. In fact, because the driving force for the sintering of grains with faceted surfaces is higher than that for the sintering of grains with rough surfaces, materials were found, such as barium titanate, for which the sintering process came to a halt before the densification was complete when the grain boundary transitioned from the rough to the faceted during annealing²⁴⁶. To possess a partially disordered interface with the environment thus holds a great merit in the world of growing crystals. Likewise, imperfections on the surface of our knowledge - the surface being composed of relationships that are the direct subjects of our reflections - are the starting points for the growth of the crystal of our knowledge. Should we believe that we have reached a sheer perfection while reflecting on the ideas that appear on the surface of the glacier that our mind is, that we have arrived to ideal and immaculate worldviews in our thinking, the further growth of our knowledge would naturally be retarded. Little ideas that would land on us randomly during our daily contemplations, just as atoms and molecules from a supersaturated solution land on crystals in touch with it, would simply diffuse around the crystal faces of our knowledge and eventually bounce back from such an inaccessible surface, which would remain to exist in the pretentious light of seeming perfection. But for as long as our wonder clusters ideas that stick from the surface of our body of knowledge, tickling our curiosity and urging us to rethink them innumerable times, for as long we believe that perfection in our models of reality is far from being reached, and for as long as wonderful questions that are the cause of our amazement with the world we inhabit never cease to appear on the surface of our mind, rearranging the atoms thereon so as to incessantly search for more perfect ordering thereof, the new ideas will easily attach to the body of our knowledge, somewhat like new words and sentences that comprise this and other books of mine do, contributing to its unlimited growth.

After all, every nicely written text is akin to embroidery in a sense that its sentences resemble threads of yarn tidily woven around each other. In order to insert a new sentence to it, one has to cut this whole at a specific place. However, if perfectly made, these threads would be so neatly interwoven that such an insertion task would account for a tremendously painstaking challenge. Once more, this demonstrates how perfect expressions can be quite imperfect in terms of their posing blocks on the inflow of new thoughts, something that imperfectly built towers of thought are markedly more open to. As expected, yet another parallel with the world of crystals lurks underneath this correlation. Namely, just like perfectly arranged crystals easily break under external pressures, whereas those pervaded with lattice defects can accumulate greater degrees of stress by reorganizing their structure at an ultrafine scale, so do perfect textual wholes tend to break down more readily when attempted to be infused with

novelties. Moreover, just as diffusion is greatly hindered in metals free of point defects²⁴⁷, so could we expect perfectly structured bodies of knowledge to resist internal rearrangements and be very inflexible when a need appears for them to be adjusted to the occasion. In other words, it seems that the closer we are to perfection in giving form to our knowledge, the more impractical and unlivable it is bound to be.

The same principle that dictates that imperfection is the path to the continued evolution of ever more glorious and moving emanations of being undoubtedly applies to the refinement and diversification of the inspirational repertoire of our acts in the world. Since Heinz von Foerster mentioned in his aesthetical imperative, 'If you desire to see, learn how to act'²⁴⁸, we should also know that inspirational acting leads to vital shifts in perspectives which help us enrich our knowledge about the world too. Acting is thus intrinsically related to knowing and *vice versa*. Be that as it may, for as long as we tend to perform only acts for which we think they satisfy the criterion of sheer perfectness, we would remain blocked and frozen, calculating that perfect move which is ultimately unattainable and will never arrive. Any exciting acts will then hardly ever be performed on the substrate of our obsession with perfection, in a same way as atoms difficultly attach onto perfectly smooth and flat crystal surfaces. On the other hand, if we are not pressed with the burden of perfection, but are driven by spontaneity, naturalness, loving acceptance of our human fragileness, holding a pencil of love in one hand and a mop of light forgiveness in another, realizing beauty and perfections in imperfections, we would be able to strew the world around us with endlessly inspiring and versatile acts. In fact, if we recall here that the basics of materials science predict a finite concentration of defects in any material at its lowest free energy state²⁴⁹ and assume that the analogy between this microscopic world and broader aspects of our beings and our existence holds, then this flawlessly flawed state should be relatively easy to reach and go with the flow of. In contrast, our striving for perfection, as per this analogy, is unnatural, as it is an unattainable ideal except at absolute zero, when we, amidst all the perfections we may incarnate then, would be completely frozen and unable to elicit any expression at all. Then, if we move suddenly from the microscopic to the astronomical domain, we may come to realize that had the physical singularity from which our Cosmos came to being exploded during the Big Bang into an isotropic sphere free of any asymmetries, no stars and no life, but only a cold galactic soup composed of uniformly distributed hydrogen atoms distancing from each other eternally would have formed. Getting back to the realm of solid bodies once more, we could recall that sometimes an intentional introduction of impurities or functionless components so as to make the material less pure and perfect results in its greater reactivity and a fascinating functional upgrade. Examples of this effect are many and include the doping of silicon with minute amounts of electron donors and acceptors and turning it from an electrically inert material to a functional semiconductor; increasing the mechanical strength of metals by increasing the concentration of dislocations in them through work hardening; inclusion of secondary phase precipitates in thermoelectrics to block the phonon propagation; the use of contaminated corundum, a.k.a. 'dirty alumina', in laser applications; Nd₂Fe₁₄B becoming the hard industrial magnet of choice thanks to its crystal lattice imperfections; increasing the photoluminescence coherence time of diamonds at ambient conditions by incorporating nitrogen vacancies as point defects; and a plethora of 'crystals with engineered defects such as grain boundaries, dislocations, and vacancies providing opportunities to tune intrinsic properties of materials for either technological applications or fundamental science'²⁵⁰. An example derived directly from my research studies on magnetic nanoparticles is that of nickel-zinc ferrites²⁵¹: namely, with the addition of diamagnetic zinc ions to the crystal lattice of nickel ferrite, which comprises two magnetic cations, divalent nickel and trivalent iron, the magnetic moment of the compound surprisingly increases and reaches a maximum at approximately 1:1 molar ratio of zinc-to-nickel²⁵². This peculiar effect, which indirectly confirms the ferrimagnetic nature of the compound, is explained by the ability of Zn²⁺ ions to replace Fe³⁺ ions from the tetrahedral (so-called A) sites of the

inverse spinel structure of nickel ferrite thanks to its affinity for sp^3 bonding with oxygen and thus diminish the compensation of the superexchange, antiferromagnetic coupling of the magnetic moments of Fe^{3+} ions positioned on the A sites and Fe^{3+} and Ni^{2+} ions resting on the octahedral (so-called B) sites of the crystal lattice representable as AB_2O_4 ²⁵³. As Fe^{3+} ions are partly pushed over from A to B sites, the effective magnetic moment on the A site decreases, leading to a higher overall magnetic moment of the material; this is so because the latter is directly proportional to the magnetic moment on the B site minus that on the A site whenever the A-B superexchange inter-sublattice interaction dominates over the weaker exchange intra-sublattice A-A and B-B interactions. Another illustration of how adding a seemingly useless component into a physical system need not necessarily compromise its functionality, but can actually improve it comes from the striking case of doubling the capacity of magnesium to absorb hydrogen upon the addition of 50 wt.% of fully inert, hydrogen-saturated titanium hydride to it, owing to the nucleation-promoting effect of the latter²⁵⁴. Likewise, the addition of calcium carbonate with no known antibacterial properties to a composite comprising cellulose and antibacterial copper nanoparticles increased the antibacterial activity of the material despite the reduced concentration of the copper phase²⁵⁵. Similarly, the hydrogen adsorption capacity turns out to be markedly enhanced as one shifts from using perfectly ordered carbon crystals on the atomic scale to those containing topological defects²⁵⁶. In fact, since most adsorption mechanisms are driven by the Gibbs isotherm, which dictates that the greater the surface energy, the greater the adsorption, it comes as natural that defect-laden structures will tend to be more efficient than the defect-free ones in binding adsorbate molecules, a rule that, of course, just like any other rule in the world of physics, has to have its exceptions due to a multitude of competing factors involved in determining the outcomes of any given physical reaction. These insights once again accentuate imperfections as not substitutable at all in the pivotal role they play in ensuring the practical excellence of all expressions in Nature, atomic, human and stellar alike. Likewise, seemingly useless and foolishly futile acts and miniscule and unimportant observations are often those that surprisingly tickle human imagination and open the doors that lead to novel vistas of creative being of us and the world alike. Or, as Alan J. Perlis noted in his epigrams in programming in celebration of these purposeless pillars of every immaculately purposeful plan, ‘When someone says ‘I want a programming language in which I need only say what I wish done’, give him a lollipop’²⁵⁷. The Bosnian proverb puts the same point in a more dumbed-down, down-to-earth semantic package: ‘When all feels too well, put a pebble in your shoe’.

Now, if you have a feeling that I have gone astray with this imaginative comparison of human creativity with the crystallization processes, worry not. I have done that intentionally. Because science is one of the most wonderful adventures that we could ever embark our spirits on. And as in every adventure, we have to curiously roam around uncharted territories in order to get close to the hidden treasures. The more imaginative we are, the more prospects there will be for us to be successful in our quests. As Albert Einstein mentioned as a response to his colleague’s praising a student for having quite interesting ideas, ‘I agree, but your ideas, my friend, are, unfortunately, not crazy enough’. For, lucidity and lunacy were inextricably related to each other in the head of this stereotypical scientific genius. Hereafter, we ought to be ready to exercise our imagination in finding analogies between the most distant fields of human knowledge that we could think of. Which is, by the way, the method and the goal of the Glass Bead Game envisaged as the ultimate emanation of human knowledge by Hermann Hesse: ‘Playing the game well requires years of hard study of music, mathematics, and cultural history. The game is essentially an abstract synthesis of all arts and sciences. It proceeds by players making deep connections between seemingly unrelated topics’²⁵⁸. In the end, the extent to which we, as scientists, are ready to extend the rays of our attention away from the scientific pedestals upon which we observe the world determines the true value of our understanding of the beauty of science.

The art of giving inspiring lectures

‘Make not thy hand tied
Like a miser around thy neck
Nor stretch it forth to its utmost reach
So that you become blameworthy and destitute’
Qur’an 17:28

Inherently related to the co-creational nature of experience and the expounded Way of Love is the art of a truly balanced communication, the one that inspires others through its inexhaustible creativity. In that sense, many crucial balances need to be attained. One of them is, for example, faced whenever we have in front of us a crowd composed of mixed professionals and novices with respect to the subject field and topic that our talk is concerned with. Thence, should we conceive and deliver our talk in an overly simplified jargon, the professionals would be insulted, but if we focus on stimulating and widening only the knowledge of the professionals, the beginners would soon lose the track and in that case it is their time that would be wasted. It is an incessant challenge to balance simplicity and complexity, so as to intellectually stimulate the entire audience.

This approach is certainly justified by the fact that in order for the patterns of knowledge we face to become truly inspiring and present a source of intellectual advancement for us, they need to always retain a certain enigmatic character upon the attempts to interpret them. There always needs to remain a feeling that there is more to the picture than meets the eye. Only such forms of knowledge can bring about progress in cognitive spheres of beings of the world. In other words, only where clarity and mystery meet each other do the doors for the ascent towards ever more divine levels of being become open.

This balance naturally leads to another one important for the art of giving inspiring lectures. It tells us that preconceived expressions and spontaneity ought to be thoroughly mixed, all until our presentations become spontaneously and unpredictably developing ones from their beginning to the end and yet possess conceptual threads that provide a stable skeleton thereto and keep them from dissipating.

But then, there is another crucial balancing imperative, springing from the co-creational thesis and the Way of Love. It is a reminder that one should always maintain the state of dynamic balance between preserving one’s own individuality and empathically blending with the perspectives of others. Should one open one’s heart to such an extent that stems of its lotus flower become stretched and ruptured, the sane connection with the meditative essence of one’s being would be lost and one would be left to appear helplessly in need of love in eyes of the world, eagerly reaching out, but with not much to give. The opposite extreme lies in the stance of such a powerful immersion inside of one’s own self that the ability to open the petals of the flower of one’s heart and empathize with others became totally lost. In one instant, thus, out there on the stage, I may seem million miles away, untouchably floating on the clouds of a wildest fancy with swirls of galaxies in my eyes, and then at another instant I may come across as the very best friend to everyone in the room, so near that all hearts start to melt with sympathy. Hence, Al-Isra’s verses from Qur’an that stand at the opening of this subchapter and the musing of Roland Barthes on a photograph of an apollonian boy with an outstretched arm: ‘The photograph has caught the boy’s hand at just the right degree of openness, the right density of abandonment: a few millimeters more or less and the divined body would no longer have been offered with benevolence’²⁵⁹. Therefore, being out on the stage, with many glistening eyes directing the rays of their attention on us, bright and trustful or scorned and judgmental, all to be loved and embraced equally, we should produce a similar act of opening our mind and heart only insofar as the pull in the opposite, inward direction is

preserved, lest we lose the touch with the divine depths of our heart and fall from grace. It is for this reason that an artist, heartbeats before she enters the stage, while standing still behind the curtain or in the backstage, dives deeper and deeper into the ocean of her heart, anchoring her attention onto its seafloors, surrounded by mermaids, pearls, sunken treasures and the pillars of Atlantis, and embraces this inner world of fancy with the whole of her heart, never to let it go during her performance. For, as the Way of Love tells us, the intensity of this inward meditative drag is directly proportional to the range of the outward shine of our spirit.

But, first, one must wonder what the purpose of lecturing at all is in today's world wherein the content can be collected and grasped in far lesser amounts of time and far more selectively and efficiently by using internet channels than by attending a lecture. Why would anyone waste precious seconds and hours of one's life to sit and listen to live ranting that could be watched online in a manner more conducive to learning, with pauses to absorb the ideas and with the fast-forward button pressed here and there to skip the parts that one might already be familiar with? Those who would have lost their jobs had they not had to lecture anymore, from teachers to instructors to counsellors to megachurch orators, convince us that lectures could be redesigned so as to be more conducive to learning, but that is poppycock most of the time. What most of them have been proposing since the early 1990s is the so-called active learning, the outcomes of which have been, however, extraordinarily lame - not surprising given that the method was first implemented not by stage performers or artists with a sublime sense of aesthetics, but by prosaic educators and academic lecturers, as dull and awkward as they are on average. The proponents of this new, participatory form of lecturing have gone far to convince the world that their paychecks are justified, telling us at its best that they bring forth a paradigm shift of focus from teaching to learning, from information transmission to information assimilation and, thus, from seeing the world through the eyes of oneself, the teacher, to seeing the world through the eye of another, that is, the student, the recipient of knowledge. My relationship with it has been, however, quite ambivalent. Namely, on one hand, having lived in Yugoslavia at the beginning of these very same 1990s, when the popularity of active learning started to sprout like mushrooms in some other parts of the world, taught me how quickly one can manipulate with the opinion of the majority, disseminate hatred and impel the populace to launch a bloody war. In this case it took less than a year of daily propagation of ethnic intolerance on all sides to push the country into the civil war; and yet, this was merely an iteration of the tragic trend of the 20th Century whereby unilateral communications over and over again proved themselves as inherently tyrannical, as tools with which minds of millions could be swiftly poisoned and turned into voluntary warfare pawns. On the other hand, a perfectly democratic equilibration of opinions is a perfect way of drowning them in the waters of mediocrity and intellectual lukewarmth. Although enlightening on rare occasions, teamwork, as I have come to believe based on my own experience of learning in groups, is most often a hindrance to the growth of stellar thinkers and doers, dragging them down to the muddy waters of conformism, dullness and mediocrity. Assigning students to teams and explicitly telling them what to do, regardless of how creative the outcome may seldom be, is also plainly repulsive to the most individualistic and creative thinkers in the class, who may even go on to tell you that learning through such activities is a quiet step toward educational fascism, contrasting the age-old academic ideal of freedom as the pivotal driver of the learning process. For, although they may embrace the merits of structure and discipline in their own thought and action, they unreservedly abhor the imposition of these very same qualities onto others, be it in classroom or in daily life. To them, to force another person to think toward a specific goal or engage in a requested action appears equally fascistic and repulsive as an army officer's commanding a battalion. Firmly believing that 'being a beacon of hope for lesser people is a lonely business'²⁶⁰, they may resist engagements in group activities with the same zeal with which they detest the boot camp instructors or sermon preachers when they specifically

tell them what to do and what to say, disagreeing with the vulgarization of education through this rudimentary active learning approach, still in the embryonic stage of development, and being befuddled as to how people fail to realize the extent to which students' cognitive capacities and humanistic values are being exercised through simply posing complex formulas or schemes of knowledge before them and inviting them to untangle their cords, as opposed to dumbing down these very same skills through superficial discussions entailed by typical group exercises, which is not even to mention that they also favor loudmouths over the introspective, most talented thinkers, being the argument that reverts us to the starting point of this sentence and spins us in a dizzying circle wherefrom one'd shatter the conservative views of all kinds into pieces and see stars and all as one in a clearest of lights. Most such thinkers, relentless rebels and paradigm shifters as a rule, although rejoicing in the closeness of the hearts occasionally sparked by the interactive learning method built upon the noble idea that 'to create an open learning community, there must be an ongoing recognition that everyone influences the classroom dynamic, that everyone contributes'²⁶¹, lament over the olden lecture days and might readily highlight their preference for hearing not their awkward peers, but one from whom the Cosmos speaks, resonantly, in all its greatness and mysterious wisdom. They intuitively feel that the participatory educators' mantra, 'Being a teacher is being with people'²⁶², is partial at best, *i.e.*, as partial as St. Paul the Apostle's promoting only one of the Christ's two complementary commandments, that engaging the mind to seek empathic communion with all living things, on the account of ignoring the one engaging the mind to seek the divine guidance from deep within oneself; namely, although altruistic social consciousness is a definite prerequisite for becoming an effective teacher, digging deep, deep, deep inside oneself, to the point of deafness to social expectations and liberation from the submission to any social norms and standards, is an equally vital prerequisite for delivering expressions that direct the students toward an enlightening action and an illuminative comprehension of experience. They might also disagree with the systematic vilification of memorization by these armadas of advocates of the active learning philosophy, the rebellion against which has in my case involved insistence on memorizing the basic physical constants by students and being able to retrieve them from memory day and night as well as correlating out loud the 'no pain, no gain' adage used by bodybuilders in the gym with the expansion of the brain capacities for demanding mental tasks using strenuous memorizations in the days of our youth, thanks to which the students can one day, as I, myself, did, play chess games blindfolded in the midst of strident parties and visualize the running of other complex logical machineries with no external aids involved, the art for which they would be thankful to their teachers on that very same magical day. If Vassily Ivanchuk, for one, did not memorize each of the forty-eight games of the first Karpov-Kasparov world championship match as a fifteen-year old²⁶³, he might not have been able to engage in his usual practice of staring at the ceiling instead of the chessboard during chess games later in life; similarly, our abstract skills and imagination inevitably suffer if our brain is not trained to memorize symbols, images and sounds at the early age. Next on their long list of objections would be a key paradox of the active learning method; namely, instead of serving to activate the students and help tune their heads to the vibe of the independent thought wherefrom saps of creativity can begin to flow, it passivates them and suffocates the creative drives nested inside them. For, the expectation to be entertained through active learning games and other activities, let alone served, like a customer in a good service industry, without needing to investing any hard work at all, is the hallmark of the active learning method at most educational sites of its worship. Whereas in the olden days it was implied that one must invest an effort to comprehend the subject or else the class time will be wasted and the exam quite possibly failed, in these active learning days, most students expect to be guided by the hand toward the comprehension of the subject at hand, which breeds passive states of mind among them and adds active learning to the long list of ideologies that historically produced the opposites of their intended

outcomes, including 20th Century communism, Christianity in the Dark Ages, and beyond. Hence I alone raised my hand, softly and quietly, at a learning academy event held at Chapman University, a site of unanimous reverence of this ideology, after a speaker asked if any of the attendees thought that active learning proponents resembled a cult of a kind, having had a great time sitting and watching the sunlit leaves shimmer behind the speaker and regretting that this new pedagogical paradigm has been taken up so dogmatically, with no one there to question its inevitable weaknesses, whose recognition and analysis would be the first step toward transforming it from a pathetically rudimentary form in which it is being practiced today to an advanced format that would truly live up to the beauty of the shift from lecturers' roaming through the dark corridors of their lonely minds in a crowded classroom to seeing worlds and cosmoses through students' eyes. To that end, active learning in the form in which it is being implemented today is nothing but a straw at which a drowning man clutches in this world wherein the traditional, solely verbal and pictorial presentations are rapidly dying in favor of more dynamic stage performances. At this point in time, the minds of artists, spoken poets, dancers and postmodern philosophers need to be engaged to give ideas on how to revitalize this listless new way of lecturing, which boils down to throwing questions here and there for students divided to groups to chew on in a vain attempt to spur the spin of the wheels of their lazy, indolent minds. What I have proposed as a solution to this imminent death of the classical lecture and as a way of going beyond today's implementations of active learning is a renaissance, reverse path, a restoration of the primordial way of exerting an enlightening influence on a congregation of starry souls resting before one's eyes. It is to elicit the only communicational element absorbable solely by attending a live lecture: the magic of one's presence. It is to incarnate the 'sage on the stage' trait of the traditional lecturer in a brightest of lights, the character that the proponents of active learning have subjected to ridicule most. It is to impel the students to prepare for a lecture in the same way they would prepare for a theater show, substituting the yawns of boredom and slavenly looks with solemn enthusiasm and liveliness of the spirit stemming from the expectation that a sacred mystery will be bestowed upon them somewhere in the lecture hall. It is to produce an experience similar to watching a most astonishing cinematic work that leaves everyone speechless, gawking in awe, feeling as if they have been teleported to the doorsteps of something inexpressibly holy. Although most of us get most enriched by books, music and movies when we encounter them in a solitary setting and in the archetypal spaces which we are intimately tied to, attending a live concert can sometimes be a more amazing experience than listening to a record alone or watching the live footage on the computer screen. Hence, the goal of lecturing in my personal universe is to bedazzle, to mystically inspire the listeners to find a way to the essence of the heart and to the little pieces of divinity that lie scattered therein, the assembling of which, which they could do alone only, will make them whole again and in perfect harmony and oneness with the world around them. Mine is an approach similar to that of Vincent van Gogh, an artist who failed as a preacher, but whose art became a sermon in a different medium, an artist whose drive to create was, like mine, rooted in pure and selfless aspiration to give oneself and all things divine concealed in it to the world, for the sake of blessing it and paving way for its redemption. Deep down, the art of lecturing in my universe is but an extension of this inner need to express bedazzling holiness all around me, to shine like a sun of holy spiritedness to the world, the end toward which I sublimated my religiosity and channeled it to science at all its different levels, from the research conduct to student mentorship to article writing to oral presentation composing to, finally, lecturing. And because this spiritual experience craved to be created is impalpable and ineffable, so must the means for producing it be. In that sense, as we are being instructed by Jean-Luc Godard, the famous favorer of the *auteur*, personal approach even in such a highly collaborative art form as cinema, one must 'make sure to use everything one communicates using silence and stillness'²⁶⁴, i.e., deploy all the invisibles that one routinely uses in communication, albeit

often unaware, to convey this enlightening feel and draw these inner roads to salvation and holiness inside the viewers' hearts. Or, as Saint Francis of Assisi correspondingly advised, in an even more elegant fashion, 'Preach often and, if necessary, use words'²⁶⁵. Such is indeed the essence of my approach to lecturing: the essence, invisible, impalpable and ineffable, eclipses in it all that lies on the opposite, perceptible, tangible and verbal side. In other words, I hold that we must push logic and language so low on the list of priorities that they become hardly visible from the top of the Wittgenstein's ladder to the stars, before tossing the ladder, beginning to levitate inside this utterly mystical, wordless space where only the waves of Tao remain to resonate, and let our expressive spirit, all washed in stars, glide glowingly, like an ethereal wizard, on them, utilizing only those communicational elements that 'can be passed over in silence and silence only'²⁶⁶ to electrify the spirits dispersed like stardust across the lecture hall and convey to them a tiny, invisible spark that mysteriously ignites the fire of creativity burning on the top of Bloom's taxonomy pyramid of their mental microcosms.

Whenever I am holding a big lecture, therefore, I remind myself in advance that I *am* a sort of a superstar, in the sense of wishing that the audience in seeing me gets hold of someone impressively unique. First of all, if this seems terrifyingly shocking, the first step towards endowing you with an enlightening insight has been made. For, a punch of surprise, awakening us from the slumber of our daily routines and making us see stars, is what renders us perceptive to signs that we have been strewn with and capable of absorbing them and successfully reaching higher levels of knowledge and being in this world. Secondly, ours is, sadly, a world wherein that holy You, hands-down the divinest thing in the range of every I and an altar before which it ought to, figuratively, fall on its knees and pray, will be over and over tempted to think that it is only appropriate to see oneself as a wasted lowland of spirit, while selling humbleness as a chain that tie the bird of spirit that each one of us is in pathetic affectation to the ground and being too fearful to admit that believing in one's intrinsic starriness conditions one's shining like a Sun from the inside, which, on the other hand, conditions one's shining outwardly and saving this sad and beautiful world thereby. And since those whom we love we love to see shining internally, the collective contemporary state of perpetual irritation by the thoughts of one's own stellar nature is a sign that the world has been overcome by a total opposite of this single greatest cosmic quality that Love is and that, if we were to ameliorate these unfavorable conditions and restore the goddess of Love on Her earthly throne, we ought to encourage every I's seeing starry soulfulness within oneself and another too.

Thus, naturally, I believe that all people could and should try their best to live in the same spirit. When José Mourinho calls himself Special, he is right, but so would everyone else be had they declared themselves special. Hence the necessity for confronting the colloquial blasphemy of the Christ's 'Ye are Gods' (John 10:34) and Warren McCulloch's 'Live always as if you were a great man'²⁶⁷ once and for all. For, to sow the seeds of belief in our specialness and in divine potentialities concealed within us all across the fertile fields of our psyche is the first step toward giving birth to the magic of It, wherewith an aura of magnetic allure and enchanting spiritedness will have veiled every move we shed. And, paradoxically but true, this belief in the starriness of myself saves me from being too egotistic. For, having elaborated the balance of the Way of Love, we may know that if we love humanity as a passionate altruistic devotee of every human creature and crave to deliver illuminating impulses thereto, we would never succeed in these goals were we not to believe in the great, divine potentials of our being. This is so because believing in the starry nature of our own self is the prerequisite for our being able to enlighten other people's hearts and minds with our actions.

Once again, I am aware that this assertion may seem appalling and monstrously narcissistic at a first glance. In fact, ever since I remember, I have been surrounded by people who shared the opinion of

a dean who sent me into a long exile from academia, which was that my self-image is inflated and the sense of self-worth set unrealistically high, so any recurrence of these views would not be news to me. However, in all their sending venomous arrows to pierce the tender heart of a poet, they have failed to see how similar they are to the philistines that accused the Christ for blasphemy only because he believed out loudly in his divine nature. For, all I do here, in a way, is reiterating this prime, but largely forgotten Christian worldview according to which every human is suffused with dormant divine forces. If only recognized and applied, they could turn a mortal into a god in the blink of an eye.

Moreover, human personality, as I have come to conclude over the years, is a complex spectrum of traits, none of which can exist alone or persistently deprived of their antagonists. Some of them could be considered benevolent and some pathological, but just like in a healthy microbiome, where thousands of bacterial families, genera and species coexist together, so do these individual traits comprising a highly complex, rich personality complement and keep each other in check. In other words, if there ever was a personality completely deprived for any dark traits, be it narcissism, cynicism, misanthropy, Machiavellianism or something else, it would momentarily cease to exist, just as a microbiome freed from any opportunistic and self-evident pathogens would be quickly suppressed by its environment and would cease to exist. The bestselling psychotherapists who advocate the canceling out of any personalities that exhibit narcissism or its psychic brethren should thus not be listened to. Rather, our states of mind should be allowed to freely fluctuate across a rich spectrum of personality traits, intensifying one on one moment and others on another, thereby creating music of the spheres that elates and inspires from within these corporeal bodies of ours.

But even if we stay away from these far-fetched analogies and bold supernatural hypotheses, a simple appreciation of the idea that one must dig deep inside oneself in search of the inner energies that could turn one's being into a blaze of inspiration should be sufficient to highlight the benefit of having faith in the starriness of one's deepest nature. After all, every magnificent artist before getting out on stage gradually gets immersed deep into himself. Only as such is he able to bring forth a superb, glowing performance. And as the Way of Love insinuates, the more we sink inwardly and become One with our self, the greater the potential of ours to spread the essence of our being outwards and become One with the world will be. The more we descend into the depths of our heart where the most valuable treasures of our creativity lie, the more light will there be to be scattered in the direction of the beings of the world. Eventually, we may realize that through this balancing art of the Way of Love we become like the Sun: a star that is deeply immersed in its own essence, burning its inner content with eyes oriented inwardly, but shining the resulting light for the benefit of everyone. It exists purely for sustaining others and yet it stays perpetually distant, never approaching the planets and beings it exists for too close, lest it burn them and turn into dust with its shine.

Some have claimed that the difference between confidence and arrogance lies in the former's being tied to a belief in the extraordinary potentials of oneself and the latter's being poisoned by beliefs in one's supremacy over others. Likewise, a sense of ego, of strong anchorage of the ropes of our consciousness onto the core of our being wherefrom impulses for divinely inspiring action arise, is healthy insofar as it is associated with beliefs in one's ultimately divine nature via which one will shine like a sun and bring the light of happiness and salvation to others. However, should it become tempted to eclipse the shine of surrounding spirits rather than foster it to an equal or an even greater measure as that of the glow radiating from within oneself, it can no longer be called healthy and beneficial. Instead, then it becomes the toxic ego that gradually transforms the mental and emotional landscape of our spirit from a luscious summery seaside to a dark and dreary dungeon.

In other words, I am saying that one ought to continue to 'hang on to one's ego', as the Beach Boys would have had it, in a way of maintaining one's heart and one's being as the referential centers of

one's consciousness and a responsible initiation of actions. But on the other hand, one should never forget that one stands on the stage of life with the aim of living for others, and selflessly giving the fruits of one's being and knowledge to people of the world, all permeated with the translucent wishes to help and enlighten others by the way of one's living. The ego I have in mind here, therefore, is not the negative, jealous and malicious ego that is hurt and tries to hurt another in return, in which case it is best describe by the Serbian word *sujeta*; rather, it is a cosmic aura of belief in oneself enfolding one's being and acting as a shield that protects a spirit determined to fulfill its divine mission on Earth and develop into a shining star of inspiration and creativity.

This is to say that we should feel as stars, but also learn to see and spur that very same starry nature in others. When Joseph Beuys described himself as both a lecturer and a shaman behind the lantern²⁶⁸, he did not wonder far from the attitude I consider mine as a classroom instructor, which is to enlighten and heal from the deepest concentric circles of the human psyche upwards rather than be a mere transmitter of practically applicable information, which is, *en passant*, what most universities want their faculty to be, explaining why both Joseph and I ended up being dismissed from our professorial posts, albeit on different continents, some fifty years or so apart. And to accomplish this shamanic goal, one, of course, has no other choice but to believe in the supernatural potentials lying dormant within oneself and waiting to be awakened. Hence, I found it not concerning at all when my choice of three epithets to describe myself in the 'I am ____, I am ____, I am ____' format at a faculty workshop I attended some time ago was 'I am Cosmos, I am Rebel, I am', having wished to highlight (a) the identity that extends beyond any national or earthly borders, (b) the intimate ties of creativity and the attitude that always goes against the grain of things, and (c) the way the absence of a name can be a path to taking on a name of God, 'I am' (Exodus 3:14), and the way nil, void, nothingness can, elegantly, evoke everything, a twist of things characteristic of this dialectical, inherently strange reality wherein an expression can, magically, take the form of its diametrical opposite seconds after being released into the world. For, if anyone has found in it the sign of megalomaniac egotism, of one's sense of being as great as God and as whole as the Universe, all the while assuming the 'arrogance of a hero'²⁶⁹ aimed at toppling their order to bring about one ever more enlightening, let it be known that expressional greatness can emerge only from the greatness envisioned to be nested inside one and that only those who perceive oneself and others as divine can breed divinity in all things around them.

Only when we set the anchors for the strings with which our creativity will vibrate at our own heart and at the heart of the Holy Thy, truly inspiring words will start flowing freely out of us. The sources and drives of our creativity should be equally centered around our own being and around others. That is the essence of the pair of the most fundamental Christian commandments: carefully paying attention to the inner voice of God that whispers us the pathways of the divine mission of our being in life, and finding the source of an ultimate enjoyment and purpose in life in enlightening others.

As far as the art of inspiring lecturing is concerned, as a counterbalance to the mentioned accentuation of creative inwardness I usually try to pose the attitude of expressive naturalness built on the foundations of genuine familiarity and closeness to others, all with the purpose of establishing the balance of the Way of Love through which the audience will perceive me as someone so incredibly close to them, a soul speaking the same language as they do, a soul they could readily sympathize with and lay down their protective guards so as to absorb the semantics sent out into the air freely, with no reservations, and yet a soul distant and mystical, a walking enigma filled with something worth learning more about, having created a veil of mystery serving the role to attract them deeper and deeper into the fountain of my heart in which stars of higher knowledge shimmer.

A good sports coach never reveals himself completely to the team nor stays too distant in relation with the players, being aware that if they either adopt him as an equal friend or lose his role out of sight,

a sense of the hierarchical responsibility would vanish. This is exactly what the mindset filled with the Way of Love naturally radiates with - the balance between an inner and mysterious withdrawnness and a giant and heart-blossoming empathy.

It is true that one part of our mind has to be completely absorbed in what we are creatively dealing with, while the other part has to simultaneously wonder away by keeping the referential frames of its visionary thoughts tied to some distant parts of the world and remote aspects of being. An awareness has to be evoked of a greatly appealing, graciously treasurable beauty lying far, far away, within the deepest depths of the boundlessly oceanic vastness of reality, in order for the listeners to catch that magical feeling that flies through the air and secretly spurs them to go out and independently search for it. As the Little Prince held on to, 'The stars are beautiful because of a flower a man cannot see'. But he, he thinks of it, and keeps it tightly sealed at the roots of another flower, the flower of his heart.

On balancing giving and taking

'Heaven and Earth last long because they do not live for themselves. This is why they last forever.

Thence, by placing himself at the last place, the sacred man gets to the first place. He considers his body as a nullity, and yet it becomes preserved.

Does not he fulfill himself exactly because he does not live for himself?

Lao-Tzu, Tao-Te-Ching 7

I remember an old cartoon in which the Disney's hero, Super Goof, became captured behind an invisible and impermeable barrier on a mysterious planet, as small as one of those which the Little Prince occasioned. No matter how many times he tried to fly away, he would always bump against the invisible wall and bounce back to the ground. His despair due to this uncanny imprisonment grew strong, yet he still managed to maintain the calm and hope that there must be a way out. Then he noticed that during his imprisonment cabbage heads and other food to keep him sustained regularly arrived from the distance. Thus he started thinking: 'If something is coming in, passing through the barrier, then it is not absolutely impermeable. There must be a way out. Go figure'. And his relentless thinking eventually led to the solution. Super Goof waited for a cabbage head to hit the barrier, having approached it from far away, and at the exact same moment flew in the opposite direction. As you probably guess, he finally escaped to the freedom.

The tactics employed by Super Goof is, in fact, more common than it may seem at first sight. Years later, it would be used by the creators of the classic Amiga thriller, *It Came from the Desert*, specifically in the part where the entrance to the nest of mutant ants opened only when an ant went in or out, necessitating its following to 'see where the door opens'²⁷⁰. Outside of the virtual domain, Super Goof's trick is irresistibly similar to the way in which (a) Stuxnet computer virus infected the Iranian nuclear power plant computer system through a channel opened by the night watches' switching on the surveillance system to look for physical, not virtual intruders, (b) Joybubbles unlocked the long-distance option on AT&T phones by whistling the sound of the frequency used by the company as a signal for the end of the call, (c) advanced rocket systems, including the NATO air forces during the bombing of my home country in 1999, use the propagation path of radar or sonar signals of the enemy as a route to their source, or, in fact, to any event where an expression offered a channel for the dissemination of a counter-expression. To that end, the story about Super Goof's escape to freedom teaches us to exhibit creative powers in areas governed by the complete opposites of the qualities we intend to disseminate if these intentions of ours are to bear fruit. It also pays our attention to the brief moments during which

doors in life open for our passage through them, the tiny glimpses of time which we must train our perception to be receptive to, lest we remain dozing on their doorsteps all life long. For example, molecular biologists know very well that the entrance of plasmid DNA into the cell nucleus, necessary for gene transfection to occur, proceeds much more effectively during cell division, when the nuclear envelope gets temporarily compromised and the genes become exposed to the cytoplasmic molecular components of the cell²⁷¹. The passage of nanoparticles across the plasma membrane and entry into the cell are similarly facilitated during the exponential and declining stages of cell growth, when the membrane is more open and permeable than in the lag and stationary phases²⁷². Likewise, to unwind and soften up the soil into which the seeds of our ideas and emotions are to be planted is a prerequisite for their sprouting into stems of trees that would bring shade and sources of inspiration to summer journeyers through the provinces of human being and knowledge on a distant day. The story about Super Goof's escape across an invisible barrier surrounding the barren planet on which he was imprisoned also inspired me to find a way to explain why the nanoparticles with which we worked in the lab were internalized by the multidrug-resistant bacterial strains more than by their regular counterparts. Namely, bearing Super Goof's principle in mind, when a lot more stuff goes across a barrier in one direction, a lot more stuff must go across it the other way. In search of this stuff that travels the opposite route from the route taken on by the nanoparticles, that is, inside out rather than outside in, I learned that overexpression of efflux pumps is one of the hallmarks of resistant bacterial strains and proposed it as a gate to be targeted by nanomedicines *en route* to the cellular interiors. After all, whenever a strength is gained in life, a new weakness must lurk somewhere in the back of it, and so must it be with these resistant bacteria that defy most of the standard methods for treating bacterial infections, I deemed. And as I write these words, I should add that I ruminate by a homemade cup of tea and think how when the leaf holder, which is interspersed with tiny holes for water to penetrate it after it is immersed in it, is full of minced leaves, they do not escape to the water, but when it is only half-filled, the water would penetrate it more and, in turn, allow the minced leaves to exit the holder, echoing Super Goof's escape. Likewise, males willingly peeing in the sea ought to know that the cost of relieving oneself comes in the form of the influx of some of the seawater into the urethra; once again, for an object to be released across an interface, another object must be allowed to pass in the opposite direction. Finally, this short and rarely noted story also illustrates the following: whenever we come across a problem, with seemingly no solution or way out, we should look after a balance intrinsic to it. And once we succeed in confronting the opposing poles in precisely equal directions and with equal intensities, the solution will miraculously appear in front of us.

Essential balances directly emerging from the Way of Love include those between expressing and being impressed, releasing and absorbing, and, thus, naturally, between giving and taking. We have already seen that the Way of Love is not merely about giving all that we have to others without being carefully oriented towards forging enlightening ideas out of precious experiences collected along the way. But neither is it about mere taking, that is, being exclusively set to absorb the enriching impressions, meanwhile forgetting that the real purpose of this inner luminosity is to illuminate the paths to salvation before the people of the world therewith. Thereupon, the Way of Love is about the balance between absorbing selected impressions and then embodying them into expressions that would inspire others. In the end, we would form a close circle, in which the magnitudes of these two poles would be proportional, instigating each other. Should we start neglecting the need to give to the world the pieces of precious beauty that lies within our hearts, the abundance of this inner richness would be diminished. But if we also start running after others, desiring to merely satisfy them without making sure we nurture the Little Prince's rose of inspiration lying deep within our self, our powers to truly impress, sanctify and heal others would be similarly minified.

On the other hand, the mutuality of this and perhaps every other balance that we could think of means that if our wish is to beautify the landscapes of our own heart and mind, one and maybe even the only true way of succeeding in this is to conceive of expressions that would make people around us happier, more creative and more in peace with themselves and the world. And in the other direction, if our goal is to deliver inspirational acts, we should look back into the depths of our being and quietly, contemplatively, ignite the inner glow of happiness and contentment.

In order to inhale deeply, we must exhale deeply, and the other way around. Note the asymmetry here, however, because a proper, deep exhale is possible if one has not inhaled fully, but a full inhale is not possible unless one has exhaled all the air kept inside the lungs. I know this because of the rib flare I developed around the mid-1990s, during the Yugoslav civil wars, due to stress, given that this chest deformity is now known to be the result of being constantly in a 'fight or flight' mental state, where the air in the lungs is contained and not released fully upon exhalation. But once one lets go and gives away this air that is being held onto dearly, the breath restores its fullness and, with it, the harmony washes our physical being again, which has always been there to remind me that 'to give is more than to have'. On the other hand, this is not to say that taking the valuable stimuli that flourish all around us and forging them into something golden is secondary to this giving. For, there needs to be something precious inside us for the giving of it to add bliss to the world. That is, if we greatly wish to give pieces of ourselves to the world, we must learn how to build ourselves using the bricks of beautiful thoughts, aspirations and emotions. Hence, when Lao-Tzu says that 'the sacred man gives to others, and yet lives in an ever greater abundance' (Tao-Te-Ching 81), or when Shakespeare's Juliet confesses to Romeo from her lavish Veronese balcony: 'My bounty is as boundless as the sea, my love as deep; the more I give to thee, the more I have, for both are infinite', they implicitly point to the complementary and mutually accentuating nature of giving and having. When the impressions are many, deep and profound, there is plenty to give, whereas the more we give, truly, from the depths of our heart, the wider the space for the fulfilling impressions would be.

Roland Barthes, the same French philosopher who considered his life a mistake because he could not overcome excessive respect for the hosts who were regularly driving him back home from parties and tell them that he would, in fact, like to jump off at the rattling and dizzying streets of Paris by night (which is, of course, a definitive symptom of the deviation from the Way of Love towards the side of extreme living for others, without replenishing the sources of creativity residing inside one), and was one day ironically hit by a laundry van on a Paris street as he returned from a party and died thereafter, said once that 'the only given is the way of taking'²⁷³. Were we to take 'taking' in this adage as analogous to the taking in of external impressions, this might be a way of telling us that the way of perceiving reality is the way taking us far, far back in time, to the gates of Paradise that the first seconds of our childhood, of our being born to this world, when all was in bliss, represent. Besides, with all this pandemic of malice and victimhood enfolding its vulturine wings around us being due to the warped ways of seeing and interpreting other people's gestures, words and acts, it is of utmost importance to train our eyes to see beauty and beauty only in the worldly objects, creatures and events. Going back to the tragic fate of the French philosopher, which I wish to make sense of here, it may be a sign that only when we liberate ourselves from our ego completely and proclaim it dead, to the world and the self alike, can this absorption of the external impressions become holy and enlightened. The ambiguity of Barthes' phrase, however, should not be underestimated either, as it can also be interpreted as an echo of the Apostolic message, proclaiming that 'it is more blessed to give than to receive' (Acts 20:35), but also of Jesus' saying that 'there is nothing from without a man, that entering into him can defile him: but the things which come out of him, those are they that defile the man' (Mark 7:15). This is how we may arrive at the idea that the way we conceive our expressions, the space of possibilities of which is endless,

determines who we truly are, given that the way we give makes way to the essence of our heart. And so, once again, we have come to that fine balance between giving and taking, between seeing and acting that is integral to being complete.

To corroborate the validity of the idea that giving is in today's world less variable amongst people than taking, we could place a group of people in the same landscape. Soon we would realize that although their physical reactions to it may vary indistinguishably from one person to another, they will all see vastly different things. Even if a hypothetically identical series of images was displayed on the screens of their consciousness, they would be impressed by them thoroughly differently. For example, in the shadow impressed by the nuclear radiation onto a Hiroshima wall on August 6, 1945 and captured by the photojournalist from a graphic story by Yoshihiro Tatsumi²⁷⁴, some saw the image of a boy rubbing his mother's shoulders, an image evoking poignancy and a timeless beauty, while others saw the image of a boy strangling his mother, an image adding even more horror to the already abominable event of mass destruction. Likewise, in the segment of the cave carvings in Creswell Crags²⁷⁵, the oldest art in England, depicting two stickmen holding the third one between them, by their hands, some may see the visual document of friendship or of loving parents playing with their child, while others may take it as the description of enslavement or execution. Therefore, the way in which we interpret physical objects and events defines our creative potential for further expression. To be impressed beautifully, *i.e.*, to see beauty pervading every segment of the living and the inanimate world, is as much of a prerequisite for divine expression as making an attempt toward a beautiful act is a prerequisite for recognizing beauty all around one, the reason for which one of the prime Bosnian new primitives, Elvis J. Kurtović used to say that 'if you want to roll, you must have soul; if you want to rock, you must be shocked'²⁷⁶. None of this, however, goes against the grain of the message of the Christ. For, what he wished to insinuate was that when the wishes to give and live for the sake of beautifying others move mountains within our beings, there are no harmful impressions *per se*. Instead, our beings then unstoppably transform all the absorbed experiences into food for building ourselves and faithfully serving the benevolent missions we set forth for ourselves.

The music of life arises and is sustained through an incessant alternation between accepting and releasing, impressing and expressing, closing and opening, taking and giving. A body builder in the gym is taught to strain his muscles in parallel with an exhalation and to relax them with inhalation, while a Buddhist monk in meditation brings about awareness of the body as he inhales and relaxes the tensions in it as he exhales²⁷⁷. And maybe all the thoughts and deeds in our life should be carried out in synchrony with our breath: thoroughly giving with our exhalation, and fully absorbing with our inhalation. In that way, we might avoid the imbalanced states in which we either seem inflated and stressed out due to the tendency to withhold our emotions, impressions and breath altogether (see how psychological and physiological harmonies and disorders mutually affect each other) or look wearied and downcast because of an overly pronounced desire to satisfy the opinions of others, thereby not being able to properly inhale. Perhaps, also, this respirational harmonization of physical movement is to be coupled with allowing the essence of the Hindu mantra *Om Tat Sat* to reverberate all across our insides and guide our spontaneously elicited actions; for, considering that *Om* refers to Brahman, the divine seed of the soul sprouting inside us and streaming toward sheer starriness, *Tat* relates to the act of giving, and *Sat* indicates reality²⁷⁸, that is, the origins, the way and the destination of divine action, respectively, we could be once again assured that the latter is a bridge grounded stably in both costs that it serves to connect: I and Thou, Son and Father, mind and Nature.

Even when we look at the chemical nature of life, we see that the central atomic element in it is carbon. It is quite possibly the only chemical element that could build the atomic backbone of biochemical structures, with silicon coming as a second, though much less probable candidate for the

pivotal element of life on extrasolar planets. Carbon, as it were, is the prototype of a ‘middle way’ atom. Not only is it positioned exactly in the middle of the Periodic Table, having one half of its outer electron shell filled and the other half empty, but it engages itself in covalent interactions. Unlike the ionic interactions wherein the more electronegative atom in the bond attracts the shared electrons all the way to itself and leaves the bonded partner almost completely devoid of them, atoms participating in covalent bonds share the electrons more or less equally by having their probabilities of finding peak somewhere around the middle. That is, for none of the covalently bonded atoms can be said that it is in possession of the common electrons, as they belong equally to both. As such, covalent bonds are the ones with precisely balanced giving and taking, and maybe that is the reason why covalently bound carbon atoms were spontaneously chosen throughout the evolution to comprise the backbone of biochemical structures.

The dichotomy between ionic and covalent bonds presents a great metaphor for understanding the basic principles of life in all of its domains. First of all, ionic compounds in which one of the atoms is so ‘greedy’ that it thoroughly attracts the shared electron to itself turn out to be seriously limited in the diversity of ways in which they could ‘dance’ throughout the world of matter. In other words, the scope of their physical behavior is significantly narrowed in comparison with covalent bonds wherein atoms more fairly share the common electrons. The reason is this: due to charge separation, individual ions need to be precisely coordinated as required by the physical law of electroneutrality, with cations surrounding anions and *vice versa*. Ionic compounds are thus limited in the number of possible stoichiometries and crystalline orders that they can adopt. Though they practically exist only in the solid form, the ‘selfishness’ of the big anion is evident even then, as it allows the smaller cations to occupy mostly interstices in the crystal structure, while the anions, themselves, are densely packed. In contrast, covalent compounds can exist in all three elementary aggregation states: solid, liquid and gaseous.

In addition, ionic compounds are extremely inflexible, especially compared to more malleable metals and pliant organics, the reason being the resistance of the ions with identical charges to slide past one another. A casual speaker would also christen these compounds as overwhelmingly ‘hustling and bustling’ on average and blind, too, so to speak, given the non-directional nature of the ionic bond. On top of that, they could be seriously aggressive, as when they combine a very acidic or a very alkaline ion with a mild neutralizer. Now, ionic reactions take place at such high rates that they could not be utilized by living systems. Life processes require a relative slowness of the reactions that comprise them, and covalent reactions and weak physicochemical interactions satisfy this condition much better. Recall at this point that, strictly speaking, there is no perfect ionic bond in which the electronegative atom completely usurps the shared electron; even a sodium atom in table salt retains some control over the shared electron, although with an increase in the difference in electronegativity between covalently bonded atoms, the polar, that is, ionic character of the bond increases too, without a precise boundary between a highly polar covalent bond and an ionic one. In a way, just as dividing chess players to positional and tactical ones is a misnomer because, deep down, every chess player by default must employ both of these elementary skills, albeit in different proportions, so are there no perfect ionic and covalent bonds, as every bond exhibits some character of both. Still, because they involve colloquial ‘capturing’ of the shared electron by one of the bonded atoms, ionic bonds are also non-directional in nature. Space symmetry is an unknown parameter for them; hence, their blindness can be inferred. Unlike them, owing to the greater degree of electron sharing, covalent bonds are highly directional and can be regarded as highly sensitive to their spatial surrounding. Finally, as it is in the nature of electronegative ions to wait for an opportunity to sneak away from the bonded state with an electron more, they indeed do so as soon as one dissolves an ionic or highly polar covalent compound. And then, as in the case of dissociated acids, when hydrogen atoms swim around without their sole electrons, the

'angry' cations can be aggressive to anything that shows up on their way. Covalent bonds are much milder to the elements of their surrounding, which is another reason why life had chosen to utilize them as its building blocks.

The metallic bond is yet another type of chemical bond that is fundamentally different from the covalent one. In it, every atom gives away a single electron from its outermost shell and this electron comes to be a part of a delocalized electron cloud spread across the entire metallic structure, providing a basis for the flow of charges through it. A particularly interesting metal in the context of our story is gold, the noblest and the most inert of all the inert metals. Paradoxically, its nobleness and the great value ascribed to it are due to its being the least reactive metallic element, prone to react with no other element but itself, epitomizing extraordinary selfishness in the realm of materials chemistry. These self-centered forces packed into it are being the total opposites from the way of the Sun, of love and of all the virtues in life worth endless astonishment and praise, which are all about giving more than and beyond what one has had. In view of this, one has all the reason in the world to wonder whether there may be a correlation between the microcosmic and the macrocosmic standing behind the fact that this particular metal caused more misery to humankind than any other chemical element of the periodic table, as if its intrinsic selfishness has been reflected in the curse of soul-corroding greed that has centered around it for millennia. However, the evidence that even covalent bonds could be equally detrimental from this perspective comes from the example of diamond, a chemical compound in which carbon atoms are held together by covalent bonds only and the only one that has caused the amount of strife comparable to that caused by gold. Sometimes I wonder if the reason for this may have lain in its unsurpassed hardness, as if telling us that not hard rock strength, but pliability, flexibility, softness and grace ought to be the qualities that we should teach others to strive to attain in life. What this example also warns us against is overly easy falling prey to unilateral doctrines that celebrate monotony rather than diversity, doctrines that fail to incorporate views that challenge the actual doctrines in question and that thus fail to be akin to rolling wheels which, remember, keep on rolling exactly because each point thereof constantly alternates its moving direction, contradicting itself from one moment to another.

As we see, by looking at these tiniest building blocks of ours, we can build great stories of ethics and morality that may teach us how to properly act in much broader domains of life. By sharing electrons and yet having them confined to their own shells, giving and taking at the same time, being wholly integrated within themselves and yet spreading their covalent arms to the surrounding atoms, becoming one with them at the same time, interactions of atoms that comprise each tiny part of our being essentially dance the Way of Love with every bit of a second of our lives. Thereupon, the Nobel Laureate, Roald Hoffmann, wrote a book entitled *The Same and Not the Same*²⁷⁹, clearly alluding to this dichotomy between connectedness and separateness, commonality and individuality that the symbol of the Way neatly epitomizes. In it, he wove stories around the polarities that dominate the realm of chemistry on all possible levels, including: synthesis and analysis, i.e., intervention and observation of the creative work of a chemist; statics and dynamics of chemical explanation; utility and harm of chemical inventions; industrial and academic milieus between which some of the most productive chemists were divided; the revealed and the concealed in articulating the work of a chemist; trust and suspicion in grasping the work of one's peers, etc., inviting us altogether to wonder whether being crucified between opposing directions of being and thought hides the secret of the greatest creativity bearable on Earth. Be that as it may, with knowing that the Way of Love is intrinsic to all and even the tiniest living processes, a sense of calmness washes over us. An eternal beauty is awakened in the eyes that learn to recognize this miraculous dance of atoms of biological matter as abiding on the magic thread of the Way of Love at all times.

On who brings the new freedoms about

‘And have ye not read this scripture; the stone which the builders rejected is become the head of the corner: This was the Lord’s doing, and it is marvelous in our eyes?’

Mark 12:10-11

‘Princess on the steeple and all the pretty people,
They’re drinking, thinking that they got it made.
Exchanging all precious gifts,
But you’d better take your diamond ring,
You’d better pawn it babe.
You used to be so amused
At Napoleon in rags and the language that he used.
Go to him now, he calls you, you can’t refuse.
When you got nothing, you got nothing to lose.
You’re invisible now, you got no secrets to conceal’

Bob Dylan, *Like a Rolling Stone*

The Way of Love has shown us how in order for one to walk along its majestic path one needs to incessantly balance enlightenments of the foundations of one’s own being and of the surrounding worldviews. To be successful in this, we ought to be simultaneously distinct and adjustable, unique and compliant, divergent and convergent, one and the same. That is, our expressions should contain just about enough novelty to invite people to ascend via their ladders of profound thought into higher states of consciousness. If we exceed this amount and, metaphorically speaking, begin to point at the bars on the ladder of their growth that lie too high to be grasped, the learners would be pushed outside of their ‘zone of proximal development’, if we were to borrow the phrase from Lev Vygotsky’s worldview, and our efforts to enlighten them may end up being in vain, the reason for which educators often resort to peer-to-peer instruction, allowing students to explain concepts to each other and leaving the instructor in the shadow, the dwelling place of gods in this mysterious reality of ours, for most of the time. In contrast, if the guiding stars we drop before the fellow earthlings’ feet fall within their reach, prompting no effort on their behalf to reach them, their growth will be equally hampered, which brings to mind the misfortunate couple from Kaneto Shindo’s heartrending *Naked Island*, who, engaged in a Sisyphean task of bringing fresh water from the neighboring island to the top of their own tiny island to water sweet potatoes, do so by always dropping water at a certain distance from the plant, neither too far nor too close, so as to impel the roots to reach out for it and be extended thereby, enlarging and strengthening the plant, which, as all gardeners know, must grow underground to support its rise in height. In other words, whatever the sign we hand over to a human soul, it should point at the graspable bar lying just above the one on which this soul stands, resembling a good forward pass in the game of soccer, never made directly to a teammate, but always a few feet or yards away from him, guiding his movement toward the goal. To achieve this at the communicational level, we should never cease to carry instructive novelties in our expressions, but we should also never underestimate a humble, loving and wise need to adopt the language of the people whom these expressions are meant to help. Only in such a way could we endow our communicated ideas with the simultaneous attributes of intelligibility and progressiveness. Only in such a way could we also solve the Sphinx-like paradox hinted at by David Bowie when he noticed that ‘the music you love to play and the music that they want to hear are two totally separate things’, the paradox whose solving, as we see, need not result in a complete withdrawal from sharing illuminative ideas in order to remain true to oneself nor in degradation of our sublime stances in order to put our points across. It is the paradox whose solution need not be the renouncement

of the role of a teacher in the classroom just because what sounds relevant to the sublime mindset that we have built over the years will sound esoteric and be incomprehensible to students who lie far below us on the ladder of complexification of the intellectual microcosms nested inside one. It is the paradox whose solution need not lie in the following of the footsteps of Rogers' and Shoemakers' teaching that teaching across the homophilic gap is ineffective and useless²⁸⁰ and that the teacher's torch is to be swiftly handed over either to the students themselves, who would go on to teach one another, or to moderately intellectual pedagogues, skilled just enough to explain the basic concepts, even though they may not be the ones who teach by example and represent the most progressive thinkers in the field, let alone be suited to inspire and educate the 'innovators' of Rogers' and Shoemaker's classification of learner types. Rather, it is the paradox whose solution is unlocked elegantly by the magic key of the Way of Love, allowing us to remain true to oneself and yet never cease to view the world from the eyes of another, tied in an inextricable empathic bond with the spirits we communicate to, all the while roaming across the remote universes of our soul in search of the precious guiding stars as ideas or intuited impulses to hand over to. In other words, we should do our best to make the surrounding human spirits shine as fine diamonds, but we should also know that these precious stones cannot be cut straight from their heart. Diamonds could be shaped from the edges only, in a process that must be slow and persistent.

However, despite the fact that originality and conformism are in synchrony in all advanced cognitive systems, it seems that crucial evolutionary events are conceived at first in semi-desolate and solitary minds that every now and then leave the cheerful parties of their surroundings to ponderously stare at the starlit seashores of their mind and the world, where the firmly shaped coasts of knowledge meet the amorphous and mystic sea of unopened opportunities and distant and mysterious horizons. Ravens, as it is known now²⁸¹, call less, risking the atrophy of their vocal apparatuses, when they spend too much time too close to the other members of their flock, meaning that the evolution of birdsongs was most probably conditioned by the partial distancing of individual birds, particularly the creatively inclined ones, from their social groups. And yet, their songs are inevitably social in character, serving the purpose of bringing these individuals closer to one or few other birds, be it by signaling for the presence of food to their fellows, alluring a mate or something else, once again reiterating this balance between separation and connection that is intrinsic to the Way of Love and at the root of every tree evolving into something magnificent in this life. And so, when the photographer Dennis Morris notes that the lives of stars are desolate, yet the secret to their energy lies in the constant affirmation of the statement 'I exist'²⁸², he unknowingly reiterates the basic tenet of the Way of Love and the necessity to have one side of a luminescent mind be literally dark, roaming through lonely landscapes, and another side of it washed over by wonder over it all, shining with the astonishment by the fact that one and all around one exists, in order for its creative powers to bear fruit in reality. But what is not immediately inferable from this parallel is that the more intense and beautiful one's delving through one's inner world at the cost of secluding oneself from the outer world, the greater the sense of wonder enkindled within one and the more powerful the assertion of this 'I exist' are, making it able to move more massive mountains by it.

Drawing this parallel helps us understand a continuous trend in the progress of humanity, which is that the most progressive minds are unable to fit perfectly into the existing social networks of communication. No matter how much they try, a feeling that something essential is missing will always exist. The conformist beehive is not their home and they will always fall out of the fixed behavioral grooves and into the gutters of loneliness, the cost of which is that their progressive ideas will perpetually be destined to bounce back from the crowd and dissipate into the cosmic ether. There is nothing surprising about this, of course, given that masses, mediocre by default, have traditionally been

resistant to ideas churned out by the most foresighted of minds. In turn, the actual ways of communicating and understanding the world have throughout the millennia appeared to these visionary minds as obsolete and impotent in comparison with what their marvelous imagination has endowed them with. Disappointment with the world, therefore, is not an ill to prevent or treat, but rather the prelude to the birth of an artist and an inventive spirit in us. Pablo Picasso, perhaps the greatest of all celebrators of social outcasts in the history of visual arts, carefully nurtured one such estranged attitude even when he became world-renowned and strewn with fame and fortune, always believing that 'the true artist must be alienated from the society... alone and unafraid, in a world he never made'²⁸³. Reality represented by this world, he deemed and the ensuing art movements of the early 20th Century took to heart, the artist must 'attack, tear down, destroy'²⁸⁴ and install in its place its diviner analogue, being a point of view that hints at the schism existing in the artist's mind and turning either into a chasm that will swallow the best of him or a polar gap across which an electrifying power of creation can stream. On the other hand, of course, it does not require much insight to realize that the magnificent drive to create brewing inside the creative spirit must be social in nature as much as it is individualistic because, after all, the products of this spirit's creativity make no sense if they are not to convey something of importance to the fellow human beings. Hence, perceived from some higher ground, the most productive artists constantly move back and forth between their loneliness and an immersion into waters of social interactions. Their introspectiveness and abstract nature moves them in the former direction, while their warmhearted and compassionate nature attracts them to the latter, resulting in their crucifying partition between the ways of their heart and the ways of the world. Although such sense of not belonging anywhere can seem desperate and unpleasantly perplexing, it marks the grounds of the Way of Love. The latter can be walked on only for as long as we devotedly stretch one of our hands to satisfy peoples of the world and have the other hand extended so as to accept the precious guidance from the way of Nature flashing like a road made of starlight inside our heart.

'Freedom is the road seldom traveled by the multitude', says the Bar-Kays saxophonist, Harvey Henderson in Mel Stuart's movie *Wattstax*, the phrase made massively popular after it was sampled in a Public Enemy's song. And, 'fashion is the deliberate inculcation of obsolescence'²⁸⁵, the environmental activist, Paul Hawken said while confronting the contemporary, 'eco-narcissistic' mainstream support of the partly oxymoronic movement of Green Consumerism, in which one often sees plastic products marketed as eco-friendly for they were not made of wood, and wooden products for the same application promoted as 'green' because they were not made of plastic²⁸⁶, or cotton mats advertised as ecological because they do not need to be disposed of after usage as paper wipes do and paper wipes advertised as ecological because of being disposable and not wasting electrical energy and polluting the environment with detergents during washing as cotton mats do. Likewise, although the ecologically aware individuals have traditionally resisted the use of synthetics and have preferred natural products over them, today we often come across the fabricators of synthetics who consider their products to be more eco-friendly than the natural products, one example of which may be the synthetic biology startup, *Antheia*, whose mission is to 'help produce and develop sustainable pharmaceuticals that are not dependent on plant-based starting materials and, thus, are resilient to climate changes and natural disasters'²⁸⁷, an advertising statement as preposterous as that of the vegetable oil producers announcing 'no cholesterol' on their bottles of oil. Very soon, we might be reaching the age when electric, battery-driven cars would continue to be advertised as a greenest choice in the automobile industry, but so would regular cars too once the pollution caused by heavy metal ion emissions and the depletion of mineral resources are added to the list of environmental threats where greenhouse gases still hold primacy. For, the same fate that struck many wonderful ideologies conceived in visionary heads, only to be thoroughly vulgarized and transformed into their diametrical opposites at times when adopted by the mainstreams, has happened to

the ecological movement, progressive at first, but only up to the point when the masses took its beliefs over and turned them into a source of profitable propaganda. Hence, this movement is nowadays trivialized to the ridiculous point where usual users could be seen selling smaller food packages for higher price in order to be able to advertise them as ecological and healthy, or promoting organic produce that has been flown in from the other side of the planet, all the while regularly paying their carbon taxes. On the other bank, however, we see the movement growing into an exhibition of organized aggression, the pure opposition to infinitely peaceful and lenient stances of trees that their followers, so-called eco-fascists, are fashionably hugging.

Nonetheless, observing the prophetic pathways for a simultaneously sustainable and evolutionary future has always been the privilege of visionary individuals, rather than of large social collectives. The latter would eventually accept the ideas sprouted in the heads of these visionaries and build a midstream fashion around them, but we ought to always remember that crystallization of a perfect monocrystal starts from a single embryo. This process, in turn, is possible only insofar as the phase transition is sufficiently slow and the change in the boundary conditions in which the system has found itself gradual. Fruitful social transitions, therefore, resemble the slow process of fruition of any natural plant. Only painstakingly slow processes that do not yield immediate gratification as a response to invested efforts are truly valuable in the story of the developing humanity.

In the context of the continuous evolution of humanity, each generation on Earth is destined to be swamped by a sense of obsolescence whenever it tries to imagine life in past social eras, irrespective of their distance in time units, be it twenty years or twenty centuries. But also, every one of them is similarly predisposed to present a likewise source of ridicule for some future generations. ‘The old order changeth, yielding place to new, and God fulfils himself in many ways, lest one good custom should corrupt the world’²⁸⁸, is the motto Lord Tennyson put in the mouth of King Arthur on his deathbed, uttered to console the knights lamenting over the inevitable dissolution of their sacred congregation and tell them that even the most immaculate things, physical or abstract, are bound to become corruptive for the soul on a not so faraway future day, and then ever more beyond it. However, by living in the present, we are normally blind to most of such circumstances and the ways of interaction and behavior that would, sooner or later, turn obviously obsolete. Anyway, I am sure that the rigid ways of communication of the present and past would someday be transformed into a dancing joy that permeates beings in their communication, that people of the future would look at the eco-awareness of the current era, wherein the epithets of ‘economical’ and ‘ecological’ are taken to exclude rather than complement one another, with a slight disgust, that the architectural works in form of inorganic cubicles and rectangular shapes born out of the primitive idea that the aim of architecture is to ‘civilize the naturals, subdue the land and tame the wilderness’²⁸⁹ would seem intolerably lapsed for people living in ‘kinetic’ houses with living walls, made of smart materials that respond to the movements of persons inside them²⁹⁰, creating an inorganic/organic symbiosis through which the unnatural divide between the natural and the manmade will have been thoroughly healed, and so on, lest we, as the human race, somehow fail in these progressive endeavors and come to collapse like many societies and civilizations before us. If that were to be so, ‘when they come to chronicle the decline of this civilization, they’re going to wonder why we were debating flag burning, abortion, and broccoli eating instead of the fundamental issues of how we live and use the environment’²⁹¹, as the American urban planner, Robert Yaro cried out, wishing to emphasize the vital importance of the co-creative relationship between humans and the environment for our survival and evolution as species, the complex and multidimensional relationship that has as many facets as there are arts and sciences in the world. And emanations of each one of them alone could be used as an indicator of the state in which this co-creational relationship is found; or, as pointed out by J. H. Kunstler, ‘If the ordinary house of our time seems like a joke, remember that it expresses the spirit of

our age. The question, then, is: what kind of joke represents the spirit of our age? And the answer is: the joke on ourselves²⁹². Of course, glimpsing the dreams of sci-fi architectural spaces of the future²⁹³ as antipodes to those of the present and past, and seeing the confused, apelike mindsets of the modern day immersed in them, suggests that their times have yet to come. Should they become suddenly erected everywhere around us, their sustainability would be eventually brought into question and they would be left to experience the effects of slow decadence, which is the same fate as the one which exceptionally advanced ideas ungraspable for the mediocre minds comprising the given times are predestined for. This is so because the only way by which the human mind and its environment evolve is through their mutual, co-evolutionary development. Then, again, the same question appears before us. That is, who is privileged to perceive the current ways of life as obsolete? Clearly, only the ones who are able to imagine how the advanced ways of life would appear like. And that is, visionaries and prophets. Not many, but a few.

It is a sort of truism that committees rarely bring forth truly monumental and long-lasting ideals or pieces of art, and that carrying out the latter is usually reserved for outstanding individuals. But on the other hand, these bright and talented personalities always seem to faithfully reflect the needs of society. They appear as if living for the world itself, breathing together with it through their great pragmatic compassion and empathy. As such, they let both the challenging problems and gratifying solutions of and for the whole society be reflected in their strong and willful, yet gentle and flexible, personalities. Simply saying, in the enormity of their compassion, not only do they grasp the world, but they *are* the world.

Someone has said that the way in which discoveries that strongly influence the progress of the civilization occur resembles the phase transitions in material systems. For example, on one occasion I started off my talk on chemistry of calcium phosphates with an invitation for the audience to compare two excerpts, one from a recent Nature article buyable for \$32²⁹⁴ and one from a self-published fanzine costing only \$2.50²⁹⁵, both of which touched the same subject: the need for empathic interaction within our social milieu for the sake of refreshing our creative energies. After the audience was done with reading them, they were able to choose which one they liked more: the former, dryly written, mainstreamed and overpriced one or the latter, handwritten one, all with intentionally made typographic and grammatical errors, all so as to invoke sympathy and warm the reader's heart. When the vast majority of them picked the latter piece as the one they would more readily read at home, the indication was clear: the scientific world has exceeded the saturation limit in terms of its awareness of the obsolescence and dullness that writing and presentation styles implicitly demanded from scientists today embody. Yet, when and where the phase transition to more sublime and inspirational scientific writings will occur, we know not. However, as in analogy with phase transitions in physical systems, one or a plethora of nuclei, creative centers which will detach from the old and come to foster the new ways of expression, will arise. If only one such nucleus turns out to be present, the resulting phase will be a monocrystalline one, provided we have a liquid-to-solid transition in mind as a metaphor, and a not very desirable state of uniformity will be reached thereby. In contrast, if innumerable nuclei appear throughout the system that the global scientific network is, some of them will happen to be extinguished and dissolved before reaching the stage where further growth occurs spontaneously, without energy expense, while some of them will succeed in growing atom by atom, angstrom by angstrom, into stable grains of the new phase. Simultaneous growth from centers of countless little nuclei will lead to their collision with each other and mutual frictions in the resulting material. And as we know, some of the most critical properties of materials are determined by the structure of these grain boundaries as well as by the size of the constitutive particles. If the material as a whole fractures one day due to external pressure, it will do so by expanding the cracks between individual grains, spaces known for a high

concentration of structural defects and the very same ones that have stood in the way of the crack propagation, proving that age old Buddhist adage advising us that the same is the key that unlocks the gates of Heaven and Hell. As a matter of fact, uniformity can be considered the greatest enemy of nucleation since interfacial zones, phase boundaries, impurities and irregularities on the surface of the container are areas where nuclei preferably form and grow. Consequently, if you happen to find yourself standing on one of such irregularities, know that your predisposition to be the starting point for nucleation that will gradually transform the entire physical reality to a new state of consciousness is higher than ordinary. Some may add that a crystallization nucleus develops from single atoms or molecules, but after the phase transition is over, it might be considered as unimportant which atoms exactly constituted the nucleus. For, if the atoms which we suspect to have constituted the starting point of nucleation are not the ones that comprised the nucleus in reality, some other atoms would have taken their place. If we now broaden our views all until we grasp the billions of years of evolution of life on this planet, we would be able to extend this insight to countless evolutionary phenomena. We could, for example, find an immediate confirmation for it in the fact that multiple similar species have appeared on quite remote branches of the evolutionary tree throughout the history. Three anatomically different human species – *Homo erectus*, *Homo habilis* and *Homo rudolfensis* – are thus thought to have evolved independently from each other and only then merged, or became partly extinct, resulting in the rise of *Homo sapiens* that we are²⁹⁶. Hence, whenever we come across an exciting discovery, we should know that although it undoubtedly originates from individual creativity, it is at the same time the product of the ceaselessly evolving universal consciousness. Just like a girl prettier than Miss Universe could be usually run into in a local grocery store, so should we be sure that no matter how revolutionarily progressive our ideas seem to us, they are always the products of global consciousness and the property of humankind as a whole; as such, they most probably sprout in many people simultaneously. Of course, stars will align above the heads of only one or a few of them and shine the beams of light downwardly, prompting these protagonists’ of the story of life to find themselves all of a sudden in the limelight of human attention, while leaving other, nowhere less progressive thinkers deprived of this pompous attention, forgotten and deeply buried in the dark corners of vulgarly oversimplified chapters of human history. The effects of community and of individual insights are, thus, intertwined because each one reflects the essence of the other in this phase-transitioning search for long-lasting, evolutionary novelties. As they co-define each other, the qualities of individuals are inseparable from those of society, and *vice versa*.

The Latin root of the very word ‘competition’, *competere*, meaning ‘to coincide, to strive together’, actually denotes the act of bringing something about together. Combined with its contemporary connotation, we could conclude that being different and distant is as much important as being the same and close to others. It is how the music of love and life is being born: through the balance between uniqueness and togetherness, self and community, soul and humanity. We should not be afraid to be different, but in our quests for originality and uniqueness we should always keep in mind that we, humans, are all on the same boat and that our individual journeys are enabled just because we travel together.

In this context, it is also useful and almost necessary to find the ways to reconnect the distanced ideas, people and events in conceptual wholes in which everything would be clearly seen as related to everything else. On the way there, we should know that a long road stretches ahead of us in our attempts to descend down the stem of their visible effects to the roots thereof where they all appear connected, almost like from here to the North Pole if we were to witness the effects of global warming in reality, of the insatiable consumption that human race indulges in right here, right now. Science, religion and environmental activism are also sometimes seen as disconnected as polar bears falling off the melting

icecaps from our household drains, teak trees timbered in Indonesian rainforests from our polished patio furniture²⁹⁷, tons of waste matter scattered across rivers and valleys from every gold ring exchanged between newlyweds²⁹⁸, the plundering of silver from Bolivian mines by the Spanish conquistadors back in the days from the fall of the Ming dynasty in China and the enclosure of pastures and farming fields in England²⁹⁹, missing educational options for a Saudi girl from every drop of gasoline poured into the tank of a car on a US road, pennies flowing into the coffers of weapon smugglers and war profiteers from every mouse click in favor of a fiery forum post that disseminates ethnic hatred and intolerance, or visions of benefactors portrayed in the first true masterpiece of the art of cinema, David Griffith's *Intolerance*, from the fate of the gamin pushed into poverty via their rearrangement of financial resources for the municipality, but with a little bit of imagination and zeal, the links between these seemingly unrelated areas could easily be established. Yet, recognition of the metaphoric nature of all human knowledge provides a neat basis for bringing together scientific and theological depictions of the world into a single set of efforts. In particular, the pragmatic roots of both could be referred to in an attempt to find a way to conciliate numerous disparities between them. That is, neither science nor theology represent ultimate truths about the nature of reality; rather, given that we partially construct our perceptions as well as the theories about these perceptions, whereas the potential ways to construct meanings are infinite, both sciences and theologies can only claim to be practical pointers toward richer spiritual experience in human communication. Making the observation that reaching for the pathways of love and care stand at the root of all communication of meaning - scientific, theological and common one alike - sets the deep ethical foundations that correlate these diverse fields of human inquiry about our place in the vast and incomprehensible Cosmos. Today's environmental activism emerged from the scientific achievements in understanding the ecological network of life. By realizing that biology in particular and science in general stand at the roots of contemporary environmentalism, hostilities unleashed by environmentalists and directed toward their fellow scientists could be naturally erased. It is also frequently forgotten that what used to be a creative and original movement of an era inevitably becomes an obsolete trend as time passes by. When they were first articulated, the ideals of reductionism and positivism were highly pertinent and ahead of their times, but when looked at from today's perspective, it is obvious that they require fundamental revisions. Individual branches of the tree of human knowledge are naturally ramified in the course of its growth, but cultivating a sense of unity, as affirmed by the fact that all these branches tap the underground waters from a common stem, presents an equally important challenge. Specializations and generalizations, differentiations and integrations, empirical sciences and systemic science are, in other words, to be fostered in parallel.

On balancing activity and passivity

'Behold, I send you forth as sheep in the midst of wolves: be ye therefore wise as serpents, and harmless as doves'

Matthew 10:16

All arts spring forth from the wonderful blend of (a) actively 'paddling' against the stream, propounding creative impulses and living the dreams and aspirations that burn within us in spite of the listless social forces that drag us down, into the mud of ruddy triteness, and (b) passively 'floating' on the waves of patient, careful listening and quiet devotion to another and divine Nature as a whole. In other words, as much as we need to be a faithful follower in life, we are required to become an active leader. Being the same and being different. However, as in the case of all essential, systemic balances that underlie all the aspects of life, there is no formula on how to achieve perfect balances independently of

the ever changing contexts in which they exist. ‘The most fundamental doctrine is that there is no most fundamental doctrine’, Heinz von Foerster used to say, whereby St. Paul the Apostle in a somewhat anarchistic spirit proclaimed: ‘For without the law sin was dead. For I was alive without the law once: but when the commandment came, sin revived, and I died...The sting of death is sin; and the strength of sin is the law...For I through the law am dead to the law, that I might live unto God...I do not frustrate the grace of God: for if righteousness come by the law, then Christ is dead in vain’ (Romans 7:8-9...Corinthians I 15:56...Galatians 2:19...Galatians 2:21). On the other hand, all the creative patterns of behavior and thought are derived from balancing one’s faithful leaning onto specific rules of conduct and one’s being open to continually improvise and instill novelties in them. Or as Ludwig Wittgenstein used to say, ‘Doubtfulness without an underlying certainty would not be doubtfulness at all’³⁰⁰, echoing a centuries older thought by Immanuel Kant: ‘When the conditional is given to us, the unconditional is posed before us as a problem’³⁰¹. That is, each question and insecurity that we bring forth in our explorations springs from some fixed lines of thought implicitly accepted as certain and unquestioned premises and tautologies of our reasoning. The existence of all things conditional, volatile and questionable in our epistemic schemes is possible strictly only on the grounds of unconditional premises, unshakably steady, solid and firm. More poetically, Pico Iyer, my former colleague and fellow faculty at Chapman University in Orange County, iterated this very same message when he pointed out that ‘movement, ultimately, only has a meaning if you have a home to go back to’³⁰² at the end of his lecture that aimed to answer the simple and yet an infinitely elusive question: What is Home? The answer is, of course, that not only can the concept of movement exist only so long as there are static points in reference to which the given movement is being defined, but also that home is a notion that loses all meaning without leaving it and periodically moving to and fro with respect to it. Likewise, when I assert that everything and everywhere is a form of Way, of simultaneous connection and separation, of a static line drawn to signify and spur movement, it is merely another way of hinting at the all-pervading entwinement of the activity intrinsic to Paulo Freire’s truism that ‘we cannot enter the struggle as objects in order later to become subjects’³⁰³ and of the pliant and pious passivity eternalized in Erich Fromm’s aforementioned saying that ‘love is staying’ as well as in the final verses of the New Testament, containing the comparison of a fulfilled, enlightened spirit with a virgin who gives in to all things, being akin to a fountain that sprinkles and splashes the water of life to the dry and arid world around her unreservedly, regardless of how the world treats her or what it has to say about her, with benevolence untainted by the self-interest.

Having gotten back to the balance of activity and passivity, we could recollect the following note by Samuel Taylor Coleridge: ‘Mast of my readers will have observed a small water-insect on the surface of rivulets, which throws a cinque-spotted shadow fringed with prismatic colors on the sunny bottom of the brook; and will have noticed, how the little animal wins its way up against the stream, by alternate pulses of active and passive motion, now resisting the current, and now yielding to it in order to gather strength and a momentarily fulcrum for a further propulsion. This is no unapt emblem of the mind’s self-experience in the act of thinking’³⁰⁴. In a similar fashion, artistic pieces that aim towards inducing only either the states of thorough energetic activity or total lunatic dreaminess may not be seen as truly remarkable. In fact, all the pieces of art that capture people’s attention with their catchy invitation to ecstasy and euphoria in a truly brilliant manner hide touching peacefulness deep within them, and *vice versa*: majestically serene songs always possess the power to profoundly excite and move our spirits.

William James once observed that in order to become wise, a man needs to learn the art of not only learning, but also forgetting. Knowingly or unknowingly, in this thought of his the philosopher took on the ancient Taoist principle dictating that ‘the more one knows, the more there is to un-know’³⁰⁵. Andy Warhol, on the other hand, satirically declared that ‘although most people wish to know as much

as possible, the operation that my mind unstoppably performs is erase, erase, erase'. This is all related to the nature of human knowing: namely, if we were able to absorb all the impressions from our environment at any given moment, it would amount to an overload of information that would confuse and stifle our cognitive apparatuses. The processing capacity of the brain has been shown to deteriorate with aging not by failing to remember or notice relevant details of the perceptual stimuli around us, but primarily by falling short to neglect the unnecessary data³⁰⁶. Apparently, the attention thus lingers too much on unneeded data instead of riding along the wave of actively noticing/absorbing and forgetting/forgiving, somewhat similar to mentally retarded or juvenile minds that pick on random perceptive details of their environment and spin it over and over again on the reflective canvases of their minds. Today we also know that every learning involves forgetting on the cellular level³⁰⁷, the reason, in my opinion, lying not as much in the limited capacity of the brain, implying that memories must be discarded and connections ruptured before the new ones are formed, as in the fact that every progress in life follows a spiral path, whereby two steps forward are always paired with a step backward, directly derivable from the fact that life abhors the linear, overconfident, deterministic, machinelike paths and embraces those whereon mistakes are freely being made and revisited and corrected as one spins in circles, alternately going backward and forward, resembling more a pirouetting ballerina than an object riding on a conveyer belt. All of this presents a quiet celebration of ignorance and a gentle reminder that, all the time, even while reading this sentence, we make a choice of what we should focus on to and, in turn, what we should be ignorant about. Making profound choices of this kind is what makes us wise. And who could give us a better example on how to balance gnosis and ignorance in the atria of our mental manse than children, our usual guides to godliness in life? For, in spite of the opinionated hardheadedness of theirs, children forget and forgive the grownups' disregard of the choices they are so passionately attached to as lightly as the feathery footsteps of a nymph, never looking back in anger and resignation for longer than a heartbeat or two or three. The same grace with which they alternately build and ruin things around them is found in this harmony between learning and unlearning embedded in the core of their cosmic consciousness.

The dichotomy between keeping in mind and slipping the mind is, therefore, inherently related to the ontological nature of human being: building harmony wherever we lay our calm and bright eyes, but spontaneously inducing disharmony behind our back, and maybe even *vice versa*. If we decide to spend a day in the garden watching a flower that we find beautiful, we should always be sure that some other flowers will miss our gracious looks and start to wither. Imaginative observations are all about finding a balance between absorbing cognitive incentives that the environment is strewn with and yet consciously choosing to be blind to an array of them. On the other side, creative expressions similarly emanate from a balance between picking semantic diamonds and pearls that are to be embodied in our words and movements and sinking the rest to the bottom of the ocean of our memory. And we see this complementary relationship between creation and destruction everywhere. We are all aware of how great leaders who became parts of the establishment determined to serve the society as a whole, without any one-sided preferences, could not sustain without resenting someone, and thereby often initiating their own tragic ends. To work for the sake of enriching the whole is impossible without inducing temporary dissatisfactions on smaller scales. In fact, what may appear as a sign of sincere friendship in a narrow context can oftentimes be seen as a corrupted activity in light of the whole, and *vice versa*: actions occasionally interpretable as breakaways from the amiable spirit of loyalty and friendliness from a narrow viewpoint can be perceived as quite benevolent and socially friendly from a broader perspective. For example, a professor who refuses to write a letter of recommendation for his little laborious student or a colleague may break the bonds of friendship between the two, but will contribute to a more harmonious social whole by preventing ineffective workings of the organization which the

person would have undeservedly joined otherwise. On the other hand, doing an illicit favor to a friend may support the cordial relationship between the two, but do an irremediable damage to the fair functioning of the society as a whole. Numerous conflicts of interest may thus be seen as clashes of responsibilities or frictions amongst overly limited cooperative spheres. Namely, industry mainly looking after the interests of its stakeholders, professors caring primarily for those of their students, and doctors mostly thinking of how to defend those of their patients are fair in themselves, and yet have regularly been shown to result in conflicts of interest in the modern medical scientific arena.

Looking at life from under the umbrella of philosophical fanciness, while sipping a cocktail wherein spirits of standard-shattering activism and devotional passivity stand immaculately blended, we could be sure that wherever we look, we could recognize this balance as the one governing the prosperity and wellbeing of the given physical entities. For example, if we think of our physical skeleton, we would quickly realize that two types of cells involved in maintaining the healthy bone structure have mutually antagonistic purposes: while osteoblasts are responsible for building the bone, osteoclasts degrade the mineralized tissues, all so as to enable the unceasing regeneration and remodeling of this vital organ in response to environmental demands. A similar orchestration of a pair of mutually antagonistic types of cells is present in avascular cartilage too, and in both cases throwing things out of balance can result in a state of disease, be it osteoporosis when the activity of osteoclasts prevails over that of osteoblasts, osteopetrosis when the activity of osteoblasts is surpassed by that of osteoclasts, or osteoarthritis when the activity of macrophages exceeds that of extracellular-matrix-producing fibroblasts in cartilage. The recruitment of neutrophils from the bone marrow is similarly governed by the balance between the expression levels of two opposing chemokines: retention-promoting CXCL12 and egression-promoting CXCL2. Interestingly, as is usually the case, the two pathways intersect at a common molecule, endowing it with an ambiguous and hardly decipherable role, which is in this case the small guanosine triphosphatase Rac³⁰⁸, implying that disappearance of a biomolecule from a metabolic pathway can have an identically augmentative effect on the metabolic process as its appearance can have. The extent to which the nonlinear, intricately feedback-looped metabolic pathways within every cell, tissues and organism are pervaded with intrinsic ambiguities is illustrated by the case of two mutually antagonistic osteoblast-specific proteins: osteocalcin and osteopontin. Namely, while osteocalcin is a promoter of mineral nucleation in bone and osteopontin is an inhibitor, osteocalcin-deficient mice are not typified by a weaker, osteoporotic bone, but by denser and more massive bone³⁰⁹, invoking the inhibited osteoclastic activity as the result of the absence of osteocalcin expression as a possible reason. The disappearance of a molecule essential for causing a biological effect may thus annihilate the given effect, but also augment it in this complex feedback machinery called life. This brings us to over to the secret of the fascinating mechanical response of hard tissues that makes them resistant to a wide array of stressful effects lying partly in the so-called 'sacrificial bonds' that break under stress, though only to be reformed at a later time³¹⁰. This teaches us that to be truly strong and survivable is to be in part like a heavy rock, firm and still, and in another part like a bamboo cane that the Zen sages talked about, flexibly swaying and freely losing its own support under the force of the wind. Finally, from the materials standpoint, bone is a biphasic composite in which the two phases that join forces are extremely different from each other. While calcium phosphate, like most ceramics, is strong to compression, but very fragile, collagen, the organic component of bone is tough and flexible, but weak, having a very low elastic modulus³¹¹. Yet, these two components do not give in to mutual antipathy and abhorrence of each other's weaknesses, but accept one another and move towards the state of tight entwinement at the nanometer scale, yielding as a result the most complex Nature's material, a biomechanical base for our bodies, and secretly teaching us along the way of the virtue of embracing things, perspectives on life and modes of being that are different from ours.

Of course, what else to expect but an embracement of difference from a compound that hydroxyapatite is, a compound which, itself, is a marriage between the most chaotropic cation and the second most kosmotropic anion of the Hofmeister series³¹²? If we think of how phosphate ions, despite their structure-loving nature, willingly shared their little crystal home with calcium ones, the most chaos-causing, structure-breaking of all cations, and if we consider that Nature rewarded this crystalline combination by inaugurating it as a tsar of all minerals in the animate world, it speaks millions in favor of the acceptance of difference and fosterage of diversity in our little worlds too. To escape from the bleak sameness in spite of its clutches of safety trying to grab our soul and seize it for good and to blend in with the opposites may thus be the only route toward spiritual victory in this dialectical world of ours. A simple recipe as it is, it implicitly calls for the negation, not conformation, of oneself and the fulfillment of a major evangelical precept whereby the deconstruction and disappearance of one's earthly self is the way to the birth of one in divine spirit, in a similar way as the dying of a seed is a step that must precede its sprouting into a beautiful tree.

To that end, speaking of this tolerance of difference as a key to crafting a multifaceted diamond out of our consciousness instead of a dark tunnel of dogmas and disillusionments, we should not cease to remember that critically important it is to constantly differ from oneself as one evolves from one moment of one's cosmic existence to the next. To strive for difference in relation to external phenomena is thus only one side of the coin, being pretty invaluable if we neglect the need to do our utmost to make ourselves akin to a jazz tune never played twice in exactly the same way, always going with the improvisatory flow through one's head and heart. Today we know, for example, that identical mental tasks are each successive time performed along different neural routes in the brain, suggesting that our biophysical makeup is not suited for repetitiveness and spinning in circles, but for constant innovation and moving on like a spiral, embracing certain periodicities while undyingly being reborn again in the way we perceive the reality and act in it. Now, if you have come to think that bone, specifically its mineral component, hydroxyapatite, the least soluble of all calcium phosphates, does not have a story to tell to accentuate this point, you are wrong. One of the characteristics of this material is a low Weibull module³¹³, which is descriptive of the degree of variability in mechanical performance during successive tests: the more repeatable the response of the material to a stress, the higher the Weibull module is, and *vice versa*. In other words, deep inside our bodies a constant reminder of what life has embraced lies inscribed: be always different from what you think you are and from the type of being you solidified yourself into through years of submission to habit if you wish to maintain the title of the striver for the stars in the divine Eye watching over you. Value innovativeness more than routine and improvisatory naturalness more than robotically preprogrammed ways of being.

Yet, my favorite description of calcium phosphate, the chemical compound of which the mineral component of bone is made, is 'Nature's perfect imperfect material', a Bilbo Baggins of a kind in the kingdom of inorganic chemistry and the epitome of the lifesaving smallness of Winnie-the-Pooh's friend Piglet, a little animal which becomes useful in their forest adventures because of being small enough to climb out through a small hole in the roof of a house in which he and his friends were locked, call for help and have them all saved at the end of the day. For, calcium phosphate is neither strong like diamond nor flexible like guar gum; neither lustrous like sapphire nor transparent like jade; neither colorful like opal nor chatoyant like moonstone; neither smooth like glass nor silky like butterfly wings; neither precious nor difficult to make; neither conductive, acoustic and elastic like metals nor able to create a magnetic aura around itself. Rather, it is pale, fragile, rough, cheap, crumbly and highly defective in its natural and most functional, bioactive and osteoconductive state. Yet, in spite of all of this, Nature, as if wishing to teach us something of mountainous importance therewith, chose it as the ingredient of the bases of our physical beings. Could she have given us a sign thereby that to openly

express our angelic fragilities rather than hide behind the veil of phony spotlessness is the road to taking the greatest cosmic powers that pervade the reality upon ourselves and becoming their sacred carrier? Does it mean that to be 'ready for the fall' as we enter the dance floors of life bursting with determination and drive, if we were to revert to the analogy that came out of the mouth of Alexis Taylor during a Hot Chip song³¹⁴, is the recipe for making every breath of ours and every spin of the wheels of the train of time with us onboard one step closer to the utterly divine destinations and our becoming a holy dancer to the music divine on Earth, a spontaneous shedder of the shrills of stunning spirituality to all things around us, living and inanimate alike, for they are all God in essence, while surfing serenely on the waves of Tao, with neither a forethought nor even a grain of judgment carried in the sack of our mind?

Calcium phosphate and in particular its crystalline modification present in bone, hydroxyapatite, teach us of yet another quality that Nature apparently delights in: peculiarity. In that sense, it is highly similar to water and if we were to substitute 'water' with 'hydroxyapatite, the bone mineral' in the following line by Kurt Kolasinski, we might not stray far from truth: 'Water is the exception to almost every rule and its interactions with other forms of matter are extremely complex. If it were not of such paramount importance to our world and life itself, we might never study water and simply write it off as pathological'³¹⁵. Like water, exhibiting so many peculiar properties in the realm of fluids, from its highest surface tension among all liquids except mercury to its density being highest in the liquid, not the solid state, at 4 °C and 1 bar, to its extremely low vapor pressure and an incredibly high boiling point compared to the neighboring hydrides in the Periodic Table to its being one of the rare carbonless liquids at room temperature to its being an almost universal solvent, destined to remain 'at the same time familiar and mysterious'³¹⁶ at all times and places, and exactly because of that being picked by the goddess we call Nature as the molecule to make the microscopic sea on which all things creating us from bottom up swim and surf, hydroxyapatite is full of unexpected features that reveal themselves only to the most studious and inquisitive research eyes. For example, hydroxyapatite has the capacity to undergo enormous lattice distortions and, henceforth, accommodate an array of defects and ionic substitutes, making bone a major mineral reservoir for the body along the way. Then, hydroxyl groups positioned in the channels in the hexagonal crystal lattice of hydroxyapatite can be polarized in the electric field, which may explain why electromagnetic radiation has a profound effect on the process of mineralization of bone. The dominant, slowest growing face on hydroxyapatite platelets in bone, (001), is the fastest and the least pronounced one in hydroxyapatite rods in the tooth enamel, indicating an exceptional crystallographic flexibility of this compound as well. It also exhibits a very high nucleation rate even at extremely low levels of supersaturation, the reason for which the nanosized particulate form is the one in which it is naturally found. Finally, as the result of unfilled hydroxyl group sites in the lattice and the resulting vacancies that allow for the direction-dependent mobility of hydroxyl ions, of their more mobile oxygen ion substitutes and of columnar calcium ions, hydroxyapatite synthesized in the body possesses a significantly higher bioactivity and osteoclastic resorption rate compared to the one made in the lab or elsewhere in Nature. As the result, despite its sparsely soluble nature, hydroxyapatite in bone, unlike its synthetic analog, is easily restructured and remodeled to fit the biomechanical and energy demands of the environment. All of this can make us justifiably wonder if this is why Nature chose hydroxyapatite and water to build the basis and the communication medium of our bodies, respectively, from. For, one part Wonder, one part Love, translatable as 'one part difference, one part oneness', 'one part uniqueness, one part sameness', 'one part venturing, one part staying', 'one part peculiarity, one part particularity' or 'one part madness, one part mercifulness', has ever since been the formula for success on any levels of our social and physical realities.

Having been involved in biomineralization studies for years, I learned to see this exciting field of research as a place where miscellaneous directions of scientific thought meet and cross-fertilize each other. After I was invited to departments of physics, chemistry, pharmacy, dentistry, materials science, chemical engineering, bioengineering and translational medicine to present the results of my research on drug delivery to the bone, it began to crystallize in my head as an area of intersection of numerous disciplines of natural sciences on the scientific map of the world. Just like the city I was born and lived my youth in, Belgrade, has stood not only at one of the biggest European confluences of two rivers, Danube and Sava, but also at the crossroad between many powerful cultural streams of the present and past (Neolithic cultures, Illyrians, Thracians, Greeks, Celts, Romans, Goths, Frankish Empire, Byzantines, Bulgarians, Ottomans, Bavarians, Austro-Hungarians and Slavs are some of the cultures that settled in the city and claimed it as its own at one or the other time during its history, whereby the historical records indicate that it was attacked each 30 years on average), so has my intellectual curiosity ever since been inclined to multi-, inter-and trans-disciplinary studies. And as a field of science in which the knowledge of nanomaterials, soft colloid chemistry, self-assembly phenomena, biochemistry, molecular biology and medicine meet and blend, I have found biomineralization to be a naturally intriguing and exciting source of research topics to engage and exercise my creativity in. Their beauty also lies in the fact that by looking backwards, to see how biological systems at a simpler scale design and make materials, they enable us to outline the blueprints for the design of advanced materials and technologies that would be in a better harmony with our natural substrates. Finally, like all bridges in science and life alike, including nanoscience, another one of my professional resorts, bridging the language of quantum mechanics applicable in the Angstrom domain and the language of classical physics applicable in the micrometer range, the science of biominerals is a magical place dominated by enigmas and perplexities, as well as, in turn, by infinite sources of enchantment and delight.

Bone is also a rarely neat metaphor of the structural balance between flexibility and rigidity. By combining hardness and stiffness of an inorganic, ceramic material with toughness (speaking in materials science terms, of course, where, recall, elasticity terminologically equals rigidity) of an organic solid, the brittleness of the former and softness of the latter are being both overcome, yielding a tissue that can, thanks to its stability, skeletally support the organism. The ratio between its ceramic and organic phases varies depending on the structural constitution of the organism and the medium in which it dwells. Thus, one half of the bone material of highly agile animals, like deer, is composed of collagen, whereas this protein constitutes only one-fifth of bones of large marine mammals, such as whale³¹⁷. Elastic bones of the former and stiff ones of the latter are evidently evolutionarily formed in feedback with the interactions between the organism and its environment. Another confirmation of the feedback nature of this interaction comes from the evidenced modification of the bone shape and density in astronauts who were subjected to zero-gravity conditions for prolonged periods of time³¹⁸. In view of this, now we know that bone structure defines loads it can bear, while loads imposed on the bone in turn define the strength and resilience of the bone structure itself³¹⁹, shedding light along on the way on physical exercise as a vital factor in maintaining healthy bones during our lifetimes. In other words, unlike shoes that the longer they stay in a shoebox, the more polished and shipshape they look, in the world of animate matter the reverse principle applies: the more things are utilized, in a smart and moderately strenuous manner, of course, the longer they will last. This is, for example, why the following lines of Shel Silverstein's children's poem, Sick, are bound to present a more potent medical advice to those feeling unwell than their being forced to rest and hydrate: 'My elbow's bent, my spine ain't straight, my temperature is one-o-eight. My brain is shrunk, I cannot hear, there is a hole inside my ear. I have a hangnail, and my heart is – what? What's that? What's that you say? You say today is... Saturday? G'bye, I'm going out to play'³²⁰. Undoubtedly, of course, developing under these boundary

conditions has faced living creatures with many dire challenges throughout the evolution. Yet, in the end, problem-solving attempts still stand as the only pathway to our progress and evolution, an insight that comes as both a cause and an effect of this thread of thought on the feedback nature of the co-evolution of living creatures and their environments.

A medical expert in bone repair using extraneous implants could easily remind you that every successful implantation of a biomaterial is followed by a certain degree of inflammation. Namely, the first cells recruited at the implantation site in a healthy body are leukocytes, together with a plentiful of blood plasma. On one hand, this helps in swelling the biodegradable polymeric implants, speeding up their degradation via hydrolysis, while on the other hand it induces a signaling cascade that results in the production of cytokines and differentiation of monocytes into osteoclasts³²¹, the cells that would go on to resorb the organic and biodegradable ceramic implants. Avoiding this inflammatory response would imply a complete inertness of the body to the foreign material, which would signify all but a healthy and sensitive response to injury. To further bone regeneration, some of the traditional reparative techniques in orthopedics have thus directly prescribed an infliction of injury or infection, as in the case when short bones are fractured by the physicians to induce their elongation, when skull around a cranial bone implant is frustrated by hammering to elicit the release of growth factors and promote the healing process³²² or when swabs contaminated with staphylococci are applied to an open bone following a surgery performed on it so as to speed up its recovery. Note that the former process has had its analogy in the workout universe. Namely, if we were to magnify a piece of muscle tissue of a bodybuilder and follow its evolution over a week or so, we might be able to see its fibers being torn on the microscopic scale following every weightlifting session. This subtle damage that leaves the tissue temporarily sore is, however, the starting point of its healing and the corresponding increase in massiveness in a process that could be once again seen as the one wherein inflammation and regeneration stand mutually entwined.

Therefore, even though inflammation is associated with increased oxidative stress, damaging for the body in the long run, it is a common misconception that inflammation interferes adversely with the healing process and that it is essentially undesirable as such. Rather, as we see, by attracting white blood cells and macrophages and stimulating the blood vessel formation, mild inflammation promotes regeneration of the tissue. And the more of the regenerative growth, the less of the fibroblast and fibrin accumulation and the lesser the chance for the formation of a permanent fibrous scar at the end of the healing process. Reactive oxygen species that herald the inflammation process have thus repeatedly been shown as damaging in excessive concentrations, but capable of promoting cell proliferation, migration and other physiological processes in favor of healing when present in optimal concentrations³²³. Quenching the expression of hydrogen peroxide, a member of these notorious species, has been, for example, repeatedly shown to negatively interfere with a number of essential signaling events inside the cell³²⁴, including those governing healthy glucose metabolism³²⁵. Inflammation has also been shown to promote proliferation and differentiation of mesenchymal stem cells, which are capable of migrating to the critical areas in the organism to partake in their healing³²⁶. Also, puzzled by the fact that silicon- and strontium-doped calcium phosphate implants are much more smoothly taken up by the body than the pure compounds^{327,328}, even though neither of these two elements are known to play any physiological role in the organism, biomedical engineers have come up with an original proposition to explain this peculiar effect; namely, these two foreign ions are thought to ring a mild immunological alarm in the body, which produces just enough of the inflammatory response to ensure the resorption of the implant and the formation of new bone at its place in the stead of inert encapsulation. In the microbiological universe, concordantly, we know that the biofilm mode of growth, where bacterial cells shield themselves inside a thick and mucous polysaccharide matrix, limits the penetration of oxygen and nutrients and leads to oxidative stress, which, in turn, enhances the mutability of these cells, explaining

the ability of species such as *Pseudomonas aeruginosa* to rapidly acquire foreign genetic elements and equally rapidly evolve the resistance to antibiotic therapies³²⁹. Similarly, for gene transfection to be effectively performed, required is a carrier that exhibits moderate levels of cytotoxicity, able to softly rupture and penetrate the cell membrane prior to releasing a potentially healing agent that will then travel to the cell nucleus. Molecular biologists who have played around with the transformation of somatic cells into pluripotent ones and back have learned that a thin line differentiates oncogenic genotypes from the regenerative ones³³⁰. In both cases, the stress exerted on the cell to induce its transformation into any of the two lineages is immense, thousands of times greater than when it undergoes inflammation, showing also fascinating similarities in terms of molecular pathways involved, suggesting that paths leading to the darkest and the brightest of horizons in the life of a cell may as well be one and the same and that healing and ailing in any living system are not so distant from each other as we used to think. Moreover, it was shown that activation of inflammatory pathways enhances the effectiveness of gene therapy in a sense that it opens chromatin and allows for the genetic information to be interfered with, leading Stanford University researchers to even coin the term ‘transflammation’ to more veritably describe the process of gene transfection³³¹. Of course, these findings make sense once we realize that regeneration and inflammation signaling pathways in the cell are tightly entwined and that stimulating one may not be possible without stimulation of the other³³². A plethora of pro-inflammatory molecular mediators thus figure as essential components of regeneration pathways within the cell³³³, dropping us off directly at the doorstep of a bit worn-out, platitudinous motto, ‘No pain, no gain’, as well as of the truism oft-used by the economists and politicians: ‘There are no painless solutions’³³⁴. Researchers involved in other studies have found out that the boost of cell immunity is paralleled by an increase in intracellular superoxide production³³⁵ as well as that the mesenchymal stem cells incubated in a hypoxic environment have a greater capacity to pass across the blood-brain barrier³³⁶, all of which reiterates the idea that moderate stress increases the resilience of the cell. Medical practitioners who have observed that symptoms of a disease in a community most frequently begin to appear after a collective stress is removed - meaning that stress has acted as an effective protector against the agents causative of the given disease³³⁷ - would readily agree with this idea. All in all, to willingly undergo stress is thus far more opportunistic and beneficial of choices than to avoid it and stay confined in the cocoon of safety and relaxedness, explaining along the way the counterintuitive recent finding of certain nutrient deficiencies that decrease the health span of organisms while increasing their longevity, in which case DNA damage, senescence, declined insulin production, delayed wound healing, osteoporosis, hair loss, alopecia and cataract all coincided, unexpectedly, with the expansion of the animals’ lifetimes³³⁸. Longevity of adult organisms within single species, moreover, as biologists could tell us³³⁹, is directly proportional to the species’ sensitivity to the environmental stress. This implies that humans, typified by high longevity compared to other mammals, are more susceptible to stress than other higher animals and are, as such, more evolutionarily open-ended, having a greater potential to transform over eons into something even higher and even more sublime than their current form. Hence, whenever the stress imposed on us seems to have become unbearable and we feel as if we will crack under its pressure, we should also know that somewhere deep in us a door has opened wide, wider, widest, to let us pass through it and reach a state of mind and form of being higher than I and the world of the present.

In the same way, just as the act of shoveling disturbs the soil but helps seeds be sown deeply into it, so must drug delivery devices maybe be mildly malignant, or injurious, to say the least, in order to intrude into the organism and distribute a benevolent agent to it effectively. For the very same reason, some may even say that detection of toxicity of a material should present the starting point for consideration of its usage as a therapeutic³⁴⁰, an insight with which Paracelsus, the coiner of the phrase

'poison is the dose' would have surely agreed. Calcium phosphate, the material to which I dedicate most of my career in science, can be thus accused of being too cell-friendly, which makes it prone to exhibit an exceptional osteoconduction in the sense of enabling the cell adhesion, spread and growth on its surface, but also poor osteoinduction³⁴¹, in the sense of not being able to facilitate as abundant of new bone growth as some other materials, which are nowhere as biocompatible as calcium phosphate, do. In general, the most potent medical devices or methods could be said to be such that they deftly navigate through narrow waterways, dangerously close to the two monsters standing on the coasts left and right from them: Scylla of therapeutic ineffectiveness and Charybdis of invasiveness that is harmful to the patient. Naturally, a walk over this thin rope stretched over the abysses of inertness on one side and injuriousness on the other tends to produce as many passionate supporters as adversaries. Every one of them, however, must admit that a hypothetical therapy that is perfectly safe and perfectly effective, being the dream of every medical researcher and practitioner, is as utopian as *perpetuum mobile*. To underpin the idea that there could be no healing without harming, we could also bring to mind phenomenal discoverers who, as a rule, allow their visions to largely eclipse the caring respect of surrounding creatures; adroit detectives who know that penetrating the criminal circles while pretending to be a thief, let alone having a partially illicit mindset in the first place, is the best way to catch the wrongdoers; fruitful attackers in soccer who must exhibit certain insolence in order to be able to penetrate through the opposing team's defense; the revolutionaries' theory of social change, which presupposes that turmoil and violence must precede institutionalization of liberty; the voice of Van Morrison that sounds as if tearing one's heart apart with rage and fury, but only to infuse it then with lustrous spiritual energy; the music of Johann Sebastian Bach and many other composers that uses the tool of unfathomable fearfulness awakened in the listener to lift him up into sublime and ethereal states of mind; or impressive actors and magnetic personalities *per se*, who have known that mildly frightening the observers, for example, by stunningly energetic and unexpected moves pulled on the stage or during any other performance, is the best way to reach into their hearts and leave an inspirational message therein, like a seed that will slowly, little by little, sprout, stem and flourish into something unforeseeably beautiful. In analogy, we could also conclude that the exhibition of every opinion that heals another is akin to a major surgery: the patient usually initially feels worse than before the operation, thinking often that damage has been done by the surgeons and blaming them for their incompetence. Likewise, the recipient of a most beneficial opinion imaginable is likely to feel hurt at first and possibly accuse the giver of the opinion for malicious tendencies, but such is the nature of life: the most benevolent and lifesaving spirits will have always been condemned as rogues or fiends rather than celebrated for their luminescence, the reward that usually awaits the fake, self-loving prophets and the sugarcoated swindlers. After days or weeks, however, when the sore tissue begins to heal and the pain starts to disappear, one would realize that one has become, in fact, cured by an opinion which, as we see, must hurt before it heals.

Back to medical devices, this also explains why years after asbestos was banned from usage, a plenty of research is done on similarly elongated silicon-based particles for drug delivery purposes, knowing that they can be optimized to produce just enough damage to the body to enable an effective delivery of therapeutic agents. Pharmaceutical research in which I was personally involved at UCSF thus focused on ultrafine wires that were meant to open the tight spacing between epithelial cells that make up the lining of the colon, otherwise associated with pathological inflammation, and deliver useful drugs through it. Furthermore, it is known that bone presents a continuously regenerated organ, but it is less acknowledged that in order for the cellular regeneration to be triggered, a fracture needs to occur first. Although the latter mostly appears in form of microscopic cracks, this still shows us the importance of imperfection and fragileness for the sake of preserving our rejuvenating potentials. These insights could be flavored by the fact that osteoblasts attach and grow significantly slower on the surface of

hydroxyapatite, the material that they, themselves, produce compared to innumerable other artificial surfaces³⁴². This detail merely reiterates the well-known critical importance of comparative slowness of chemical reactions that come to comprise life, as opposed to ultrafast reactions that mainly typify the inanimate matter. Then, remember how even calcium phosphate skeleton, the ultimate structural basis of our physical structures, evolved in a similar way as shelled mollusks form calcium carbonate pearls: through finding a way to transform noxiousness into utility and beauty. Namely, calcium has a strong tendency to bond with many proteins, particularly the phosphorylated ones, like ATP, inducing their aggregation and thereby disrupting their functionality. In large quantities, calcium has a toxic effect on the transport across the cell membrane and is also known to be a part of harmful deposits in the body, such as atherosclerotic plaque, kidney stones and dental calculi³⁴³. In view of this, the results of a twelve-year long study showing that high intake of calcium through dietary supplements increases the chances for heart disease can be all but surprising³⁴⁴. Yet, despite all of this, our evolutionary predecessors developed a whole set of strategies on how to transform the risks on their integrity posed by calcium into sources of resilience for their organisms. One of such mechanisms capitalized on the inflow of calcium ions from the seawater into the cytoplasm through a punctured cell membrane and used it to trigger a complex process of patch vesicle formation and their sealing the torn spot on the membrane³⁴⁵, thus turning a nuisance into a valued messenger, a thorn into a tear that heals, as it were. Likewise, some of these very same prehistoric organisms absorbed and precipitated calcium in form of something useful inside or around them, because that was the way to decrease its concentration in the ancient oceanic habitats. Just as shelled mollusks form calcium carbonate pearls as a response to irritating splinters or grains of sand, the story of evolution has, in fact, ever since been the one of creatively turning stumbling stones that the environment poses in front of its creatures into building blocks of progress. ‘Who accepts upon oneself the sins of the world will become the king of the world’ (Tao-Te-Ching 78), Lao-Tzu’s words immediately come to mind as well as Stephan Lochner’s Christ resting as a baby on the lap of Madonna of the Rose Bower, grumpily holding a small apple offered to him by the angels, as if to insinuate that he had come to Earth to live out the original sin in order to redeem its bearers for what has been cursing them since the beginning of time. Life, indeed, whether viewed from overarching panoramas or from the narrowest of corners, invariably makes progress on absorbing negative influences and transforming them to a fuel for the glorification of their heavenly antipodes. On the other hand, the interiors of living organisms are abundant with phosphates due to their inclusion in ATP-driven metabolic cycles, which implies that the organism’s body fluids are constantly supersaturated with respect to calcium and phosphate³⁴⁶. However, instead of regarding these by-products of internal biochemical processes as useless and discarding them as pure waste, the way most industries treat their by-products nowadays, the natural intelligence found a way to turn these pernicious elements into skeleton, a biological material essential for the evolution of higher forms of life. Needless to add, none of the ideas sketched in this and other books of mine have ever been discarded as useless or redundant; a whole lot of effort has been invested therefore to find a suitable place for each one of them to fit well within the structure of the book as a whole and not awkwardly stand out, as well as to reshape them into unique forms and thus transform them from excessive to essential. For, unlike the human design that tends to eliminate redundancies, maximize efficiencies and minimize costs by subjecting it all to the rigor of Occam’s razor, the natural, evolutionary design is typified by greater tolerance to redundancies, errors, seemingly useless ‘appendices’ and far more convoluted settings³⁴⁷. Knowing this, my books indeed tend to live in accord with the ideals of organic, natural design and be suns under which even the most prodigal sons of thought shall find solace. And just as the holy shepherd from the Gospels rejoices over regaining one lost sheep more than over keeping ninety-nine of those that have always been with him in safety (Matthew 18:10-14), I too find great satisfaction in saving the ideas that

were once on the brink of rejection, but are now brought back to the heart of the book. Even this particular idea shared one such fate of temporary dismissal and aimless roaming from here to there, all until an appropriate place for it miraculously appeared right here.

Finally, a dedicated examination of the nature of bone materials gains a deeper meaning when one perceives it as symbolic of being devoted to the skeleton, that is, the foundations of natural systems. To that end, this subject of research has been particularly rewarding for the spiritualist in me since it managed to elegantly disapprove the validity of clinicians' derogatory comparison of synthetic calcium phosphate, the mineral component of bone, to 'stone'³⁴⁸ and demonstrate that, indeed, 'tis a stone in which 'a little sun that will illuminate us slumbers'³⁴⁹, as put into verse by the Serbian poet, Branko Miljković. For, throughout many years of research on calcium phosphate I have come to conclusion that despite its lusterless surface, incredible potentials lie dormant in it, the discovery of which I saw as Nature's way of saying that in the spiritual skeleton of reality, in its hidden foundations, in those invisible planes in which our visible features are rooted reside the sources of inexhaustible potentials and powers for our physical beings. Another insight derivable by analogy from the fact that bone is akin to biomechanical pillars on which the totality of our biological selves stands supported flies us over to the final lines of the Christ's Sermon on the Mount and the solidity of foundations that is celebrated therein. For example, once we have built a good skeleton as the basic structure for our creative works, the 'meat' of individual ideas could be solidly hung on it and allowed to rest thereon firmly yet flexibly. This is probably most obvious in writing a book. When the overall structure of it is profoundly broad, we have no difficulties whatsoever to find a place in it for any ideas that we subsequently come up with. Likewise, a mindset tuned to the systemic framework of thinking, actively processing relationships into general analogies before projecting them onto relationships in different ontological domains, has no difficult time finding interest in anything she reads or hears, for everything glows with a light of curiosity to her.

Hence, when the foundations promoted by seemingly passive and faithfully preserved features of one's being and understanding are stable enough, the conditions for a fruitful building activity appear, and *vice versa*: the sustainment of every stability depends on a continual renewal of itself. Bone, as an example, is often regarded as a living mineral due to its continual growth and dissolution, formation and degradation, renewal and remodeling, taking place during its bearer's lifetime. Henceforth, the presuppositions on which we base our thinking are not something that should rest on the pillars of our faith forever and ever. Rather, it is something that ought to be repeatedly subjected to scrutiny of our sense of wonder, innate but gradually suppressed in the process of transitioning from the Eden of childhood to the Purgatory of the adult life. For, notwithstanding the preservation of the pattern, the only permanence in our world is the perpetual stream of change. The will to continually revise the foundations of our experience is thus evidently a crucial element of healthy cognition.

On balancing old and new, including a few autobiographical sketches

'Every scribe which is instructed unto the kingdom of heaven is like unto a man that is an householder, which bringeth forth out of his treasure things new and old'

Matthew 13:52

It seems to be an unwritten rule that in every age truly sacred beings and their acts are regarded as unholy and blasphemous by the commoners. Such a situation has been occurring from the ancient times on. That is, from Socrates who had been condemned for 'spoiling' the youth of Athens with his

public critical appraisals to the Christ who observed the ethical flaws of people who allegedly lived according to the rules of the Old Testament, but who, in fact, ‘draweth nigh unto me with their mouth, and honoureth me with their lips; but their heart is far from me’ (Matthew 15:8), and all the way to the modern times wherein many people, artists and scientists alike, are denied access to the popular media precisely because their visionary pace may be more advanced than an ordinary man can follow.

This has partly been so because in most cases those sacred beings have somewhat resembled the Evangelist scribes who skillfully combined old and new (Matthew 13:52). As such, they have taken the old patterns of behavior and understanding, and ingrained some new aesthetics in them. Pearly messages that have become all stale by being clothed in uninspiring clichés thus tend to be refreshed and reinstated in new and sparkly clothes, becoming more appealing to the masses as a result, all for the sake of making the world a better place at least by a most miniscule computer bit. These achievements of theirs are sometimes a consequence of their spontaneous chastity and grace that predispose them to observe purity, value and goodness in everything. Prone to find precious values in (a) the traditional knowledge and conventional lifestyles, which many of the arrogant newcomers to the planet Earth, especially those gifted with visionary eyes through which they could glimpse into more progressive ways of being, often tend to carelessly stomp over, and (b) ultramodern worldviews, which most of the old-school conventionalists tend to discard as blasphemous and destructive, they represent the epitomes of wisdom of the human race, standing at their point of time with arms lovingly spread to the future and the past, resembling the very Christ overlooking Rio de Janeiro from atop the granite peak of Corcovado mountain. There is no doubt that I, myself, have stunned many with the seemingly hardly compatible combination of a bit conservative traditionalism and futuristic liberalism that my worldviews bear. This is, in fact, quite concordant with the school of Christian anarchism that my intellectually frivolous, a.k.a. multi-disciplinary eye of the mind has incessantly flirted with. Correspondingly, I have been endowed with the epithet of a renaissance man on innumerable occasions.

American Heritage dictionary tells us that a renaissance man is ‘a man who has broad intellectual interests and is accomplished in areas of both the arts and the sciences’³⁵⁰. In addition, alongside being a polymath, being a renaissance man implies cultivation of ideals that incorporate some ancient and long-forgotten truths and worldviews into modern perspectives. For, renaissance, historically, was rooted in the revival of the classical ideals of beauty, to which end its masters dug out the mythic past inhabited by the ancient Greek and Roman gods, spirits and heroes and made out of it the bridge for humanity to cross the deep crevasse between Dark Ages and Modernity. After all, the very word ‘renaissance’ means ‘renewal’, which at its etymological core denotes the process of repeatedly looking back, learning from the past and bringing the precious insights back to the present where we combine old and new in the anciently alchemical and yet visionary and hypermodern pot of our mind.

Old-fashioned and unprecedentedly progressive traits are often charmingly mixed in truly advanced men. They know that in order to peer into the future one has to understand the trends and pathways of the past first. Therefore, they live in the past with a large portion of their beings so that they would be able to produce inspiring visions of the future. Or, as Confucius would have put it in his timeless words, ‘He who by reanimating the Old can gain knowledge of the New is fit to be a teacher’³⁵¹. In agreement with this adage, the Russian-American sociologist, Pitirim Sorokin recognized that all successfully implemented revolutions ‘represent a blending of the new patterns and way of life with old but vital and creative patterns of prerevolutionary times’³⁵². Thus, every time we look up into the night sky overcrowded with stars and discern the Milky Way, our galactic home, in it, we glimpse a message from the gods that tells us that its spiral contours are reflected in every congruent walk in life. In other words, every progressive pattern conceived and followed by our fragile selves ought to assume the shape of a spiral wherein a forward stream is coupled to a subtle backward twist, lest we fall off the

cosmic cliffs if we blindly rush forward without ever turning back. For, just like no river on Earth follows a straight path to the sea, so does the process of the spiritual growth of the little rivulet of our spirit into an oceanic home for many rivers of human hearts always consist in rearward twirls. Although they may seem regressive, without them our streaming forward could never be accomplished.

Therefore, to resist to embrace the old and incorporate it in our expressions is to never be able to come up with something new and original. After all, everything we do or say is thanks to the entangled lives of gazillions of creatures, human and nonhuman, that preceded us and that made way for who we are, how we feel and what we think. Here come to mind the musings of Ralph Waldo Emerson: ‘Our debt to tradition through reading and conversation is so massive, our protest so rare and insignificant – and this commonly on the ground of other reading or hearing – that, in large sense, one would say there is no pure originality. All minds quote. Old and new make the warp and woof of every moment. There is no thread that is not a twist of these two strands’. Hereafter, although ringing loudly with the bells of relevance, a question mark must be posed at the end of John Updike’s motto saying that ‘a novel of real ambition must invent its own language’³⁵³. For, the timeless importance of this striving aside, as we see, to flawlessly succeed in this, we need to be ready to jump into some ancient seas of thought and bring treasures lying forgotten on its floor to the daylight of our creative being. And how really new the new will be will always be a question. For, indeed, in most cases it is gracious ornamentation of some ancient truths with shiny new clothes and gems that presents the approach of many highly appealing modern artistic and philosophical works and schools.

And yet, simply mixing old and new does not guarantee success by itself. The pale aesthetic appearance of ancient architectural works copied onto the milieu of a modern city can certainly speak with their palpable hum in favor of this point³⁵⁴. Likewise, the syncretism of the academic art of the 19th Century, which aspired to synthesize neoclassicism and romanticism, failed flat on its face and produced results that connoisseurs and curators are usually ashamed to be associated with. Crossovers of classical musical pieces with electro beats, predominantly designed to appeal to the listeners of both of the combined musical genres, cannot be either considered as artistically triumphant, which is not to say that combining the language and style of classicism with those of modernity cannot be made to impress. As long as the synergy produced broadens one’s vision, understanding and appreciation of the blended forms *per se* or in combination, the vivacious sound of success will be heard knocking on our door.

And yet, not everyone is bound to be as immaculate in creating something magnificent through cross-fertilization of diverse influences as, say, Antonin Dvorak when he allowed the Native American sentiment to infiltrate the Eastern European pathos of his music, as evidenced in his late quartets and the New World symphony, or Sergei Rachmaninoff when he let a Gershwin-esque jazz sound penetrate his harmonic and rhythmical language and blend therein with the musical language of Russian romanticism. Dilettantish combinations of old and new should, of course, not prevent us from seeking exciting new combinations of such kind. Old patterns should not be let stay deeply entombed in the soil of the past, but should be enthusiastically inspected under the limelight of modernity. And when creative new eyes find pearly insights in these old forgotten truths, they may recognize a whole lot of sunken treasures around them, and glowingly bring them back to the daylight of human being.

Thus, whenever we glimpse patches of obsolescence starting to spread through works which once rejuvenated human spirits, but now are merely having a dulling effect on them, a strategy we could use is excavating the core treasures from them and crossing them over with interesting new expression styles found in our proximity. The rise of jazz, swing, boogie-woogie, rock and the modern pop music through a concoction of the traditional African sounds emphasizing the rhythm and the traditional European ones built on melodic and harmonic musical elements, at the times when they were seen by Isadora Duncan as regressing into ‘sensual convulsion’ and ‘servile coquetry’³⁵⁵, respectively, may present a good

example of this effect. For, as the science of holism teaches us, the whole is rarely equal to the sum of its parts, and it is up to our imaginativeness to discover juxtapositions for which $1 + 1$ would be much more than 2.

In fact, old ideals and forms of expression can be meaningfully adopted by human beings only insofar as they are let live, change and constantly modify themselves together with the evolving human minds. Many inherently rich traditions of human knowledge, including primarily religious thought, nowadays appear mildly obsolete due to their own ignorance of the need to always find new ways to express these valuable ideas so that they appear up to date and claim relevancy in modern times. Sticking to the stale old representations of things in a world where everything evolves exponentially, explosively fast at this very moment in space and time, can only destine us for disaster. Which is the feeling I always get when I observe country flags with crowns, swords, eagles and other symbols of crusade wars, wondering why we could not move forward, freely modify this imagery so that it fits the cosmopolitan spirit of modern times and thus prevent the symptomatic slipping of humanity back into tribal modes of being, along with the tragedies these modes cause.

Music, to this end, conceals a very instructive parallel. Namely, had classical musical pieces captured a sense of innovativeness in their performance instead of sticking to the old tradition of expression (including often overly pompous conductance, insistence on the formal attire, and, overall, too uptight and rigid of an approach to the performance), maybe more of the younger generation would find relevance and the actual beauty in these works. This example in which the relationship between the traditional schools of musical expression and classical musical pieces performed today is set forth can be neatly correlated with the relationship between the tradition of church and the religious thought that it has propagated. Namely, could it be that similar leaning to obsolete ways of presenting eternal truths is also responsible for the fact that ever more young folk at the very mention of anything religious or theological turn their backs with resentment and disgust? Confusing map with the territory, that is, oftentimes plainly corrupt and flawed institutionalized application of the Christ's teaching with the timeless essence of this teaching *per se*, they mistakenly blame the latter for the tragedies caused by religious fundamentalism and intolerance over the centuries. What they too easily allowed to slip their minds, if they ever heard of it at all, is Jesus' warning, 'All therefore whatsoever they bid you observe, that observe and do; but do not ye after their works: for they say, and do not' (Matthew 23:3), which is to remind us that despite the improper way of embodying and expressing the eternal truths he had proclaimed, they are still essential in enabling our ascent from the animalistic to the angelic abodes for our soul and ought to present the essence of our cognitive attitudes at all times and places.

After all, what drowned the actuality of certain doctrines of eternal relevance for human wellbeing, from Christianity to communism to punk, were vulgar interpretations thereof by their followers, and not the obsolescence of the very teachings. Of course, the connotation in which I use the word 'vulgar' here is the one springing from its original roots found in the Latin verb *vulgare*, which stands 'for common people', relating it to shallow simplemindedness and naivety rather than to lewdness or bad taste³⁵⁶. The common angst against religions, thus, most of the time springs from disgust over the acting of exactly these followers who have masked the original teaching with pretension and hypocritical or superficial acceptance thereof. Although this process of corruption of the core of human teachings usually proceeds gradually and practically imperceptibly to their day-to-day followers, taking many waters and generations to pass before their conceivers can start to spin in their graves, there are cases when this distortion can take place in a much timelier manner and become apparent to the founding fathers already during their lifetimes, as exemplified by Ludwig Wittgenstein, who allegedly became so disgusted with the way his followers had professed his ideas that he literally wanted to die. The main problem, of course, standing in the way of an easy acceptance of these teachings in their

authentic forms and their continuing to live as such through the ages is that they are being disseminated by these armadas of spurious janissaries rather than by the pioneers. Nevertheless, for those with an ability to protrude through the coarse appearances and, with meek eyes, recognize the value of the essence, going back in time and rediscovering the ancient pearls of wisdom is always a rewarding task that clears up one's visions of the way forward.

In the end, no steps forward could be made without occasionally making steps backwards. Equally, no steps backwards should be made without prophetically keeping track of the way forward. No old traditions and ways of being could be meaningfully handed to the modern world without delivering them in the context of actual values and trends in expression.

If religion were to find new ways to express the knowledge it metaphorically preaches about, new generations would be attracted thereto, which seems to be the only way for the enormously valuable and, I am free to say, absolutely critical knowledge for the sustainability of the human race to keep on flourishing. Just as music had to evolve from the classical genre to the myriads of modern styles in order to continue to resonate with people, so does religion have to constantly evolve its forms and semantics lest it grow obsolete. Although the latter scenario is everywhere around us in these least religious of times since religions were founded on Earth, the religious knowledge must keep on searching for the ways to reach the human hearts or else the consequences for humanity would be catastrophic. This is, by the way, what I have been attempting to do with my works all the way through: to observe these eternal truths from modern perspectives and demonstrate their omnipresence and infinite value. Hence, if I could sum up the ideals of my dealing with written words, it would be the inherent, unexplainable desire to find the sprouts of an everlasting beauty residing in each domain of human knowledge and Nature itself. As we know that due to their co-creational coalescence, human knowledge and Nature are juxtaposed in every piece of what we call Nature and every piece of what we regard as human knowledge, these two are truly inseparable, and invoking beauty in the roots of our epistemology would be reflected in awakening the sparkles of beauty in the world as we see it, and *vice versa*: by diligently improving the order in the world around us, its spontaneous reflection on peace and love within human minds and hearts would occur.

And in the whole mess of *passé* ways of presenting the ancient and eternal beauties, occasionally come people like Jesus in religious frames or many artists whose hearts burn with the desire to show the immaculate wonder of living to the world, and make the old, fusty and stagnant tradition ashamed. They eventually seem to be showing us that the secret of every immaculate creative deed lies much more in the burning inner wishes to bless and sanctify others with these works than in the expression of one's innate talent and technique.

Emotional affinities, in fact, always precede the intellectual judgment and when it comes to classical music from the Romantic period, for example, in line with the topic of this discussion, I have most cordially embraced the very early and the very late in it. Thus, I have been in love with early Romanticism, namely that of Beethoven, Schubert, Berlioz and Mendelssohn, when this musical genre was conceptually fresh and revolutionary, but I have also been fond of late romanticism, amongst which are counted the likes of Mahler, Strauss, Bruckner, tonal Schoenberg and Sibelius, when the genre was already considered *passé* and worn-out and when resorting to its devices was adequate to indulging in solemn nostalgia about times long gone. In contrast, the only romanticism that can bore me to the bone is from the period of its maturity and peaks in popularity, when it was, essentially, a fad, as in the music of Chopin, Schumann, Liszt or Brahms. These subtle emotional affinities of mine have secretly spoken to me about my inclination for the very new and the very old things and stances in life, which I, moreover, try to mingle in the effort to come up with some magical concoctions in this unfettered pot of my mind.

It is, indeed, the principle behind all the major discoveries and prophetic visionary attitudes to combine old and new in their underlying inquiry. However, most people in our surrounding tend to follow the brand new trends on the account of neglecting the old and lacking the interest to inspect the new in the context of the history of its roots. Therefore, the criticism I usually undergo is that I am being overly engaged in getting acquainted with relatively old works from times passed long ago, but to which I merely reply: 'If you want to learn about where the current times and trends are heading to, make sure you study well the times and trends of the past. For, your visionary horizons would be somewhat limited otherwise'. However, it is also true that we need to be closely familiar with the current fashions and try our best to become compassionate with their followers (which, sadly, becomes a rare practice as people get older and stiffer in their cognitive interactions) in order to understand the rises and falls of some of the past 'empires' in the domain of human creativity.

Simply saying, it is a general tendency of older people to stick and defend the existing paradigms that describe how specific human expressions and patterns of thought should be conducted. On the other hand, younger people wish to break them without carefully recognizing the advantages of the debased rules. However, it is the balance between adaptation and evolution, that is, conformation and novelties that comprises the essence of all the peacemaking and yet creatively inspiring approaches.

An example of the comparison of how the musical industries worldwide are doing could be instructive in this context. The musical industries typical for small and developing countries, which tend only to adapt to demands of the public and disregard any tendencies to produce original musical works, seem to be predestined to be of little value in both general quality and in respect to the human traits and qualities that they invoke as a part of the communicational medium. Industries that besides conforming to the given standards so as to survive on the market manage to produce novelties may be regarded as successful ones. However, this is what happens to many rich musical traditions of comparatively small countries. The brightest and the most talented youngsters become more inclined to foreign trends in which they can readily notice and follow exciting lines of progress, thereby letting their native ethnological tradition in music slowly wither as they continue to develop artistically. By being unequivocally negligent about their native musical and cultural heritage and more often than not openly revolting against it, they contribute to the condition describable by the answer given by a witty commentator to the question if Serbia supports artists enough: 'More than they support Serbia'³⁵⁷. In the Balkans, where I had grown, there is, in fact, a pervasive animosity between the supporters of the traditional sound and those inclined to the sound that arrived from the Western culture, with absolutely no attempts to reach exciting crossovers between the two. Yet, I have always claimed that an unassailable musical hero would be not the one who would faithfully follow the already thriving international trends and try to build up on them, as the majority of creative local musicians have aspired to accomplish, but the one who would enter the realm of the aesthetically degenerate folk music that appeals to the local taste - both of which, the taste and the music itself, have been, holding each other, sinking into ever deeper mud of vulgar expressions - and revitalize its rotten core by blending it with a lively energy that comes from the modern musical streams. In my musings, I have sketched one such savior of the Serbian folk music, as trashy as it can be for as long as I remember, as someone akin to a David Lynch of Hollywood, ready to infuse this musical scene with profound introspectiveness and in-depth touches of wonder. Saving the endangered cultural diversity of the world, in which the secrets of its sustainability and evolutionary potential lie, rather than drowning it in the waters of lifeless monotony, can be expected to result from one such creative approach. For this reason, the first concert I played in life, in the studio of B92 radio station, on a Halloween night sharply fourteen years before I landed in SF for the first time, combined a song by Sonic Youth, a stereotype of the urban sound of the time, wherein I whispered the verses sung by a schizophrenic girl in the original version, and a song by a

Bosnian band we unanimously favored, Zabranjeno pušenje, which many cool kids cold-bloodedly rejected due to their accent and style associated with hundreds of thousands of refugees that flooded Belgrade at those times, secretly pointing at the region of the map of modern musicality wherein treasures of greatest ingenuity lie: confluences of the local and the global for the benefit of both. In the following years that now have grown into decades, I have done it all to encourage the young Serbian musicians in search of a musical domain to fertilize with their creative powers that I came in contact with to enter the aesthetically ruined sphere of the domestic folk scene, though only to grow tremendously saddened each time by noticing their unquestioned and abhorring repulsion from it. For, what would be a more gracious endeavor than to embark on the mission of picking the disparaged dust off the ground and proving to the world its diamond-like value, to demonstrate that not what we express, but how we do it hides the key to transforming our expressions from rotten to beautiful, and to save the roots of the local culture to whom we owe our hearts and souls from merciless degradation? Of course, like Jamie Oliver being poured heavy scorn on after he announced opening a hot dog and burger joint in central London³⁵⁸, which presumably followed his realization that the culinary cosmos would be revitalized not by snottily preaching the benefits of unaffordable organic or fancy fusion cuisines, but by descending to its most hellish holes and blowing fresh new life through them, so could we expect nothing other but almost unanimous disparagement by the masses to result from these decisions of ours to start playing music with the devil as the first step on our mission to render the world more angelic than it has ever been.

One of my favorite examples as to how a music can revive the local cultural legacy using the cool language of modernity has been The Band, the eponymous second record by the band of the same name, The Band, one of the rare classical rock bands that realized that the key to producing timeless tunes lies in slowing down and protracting the climaxes instead of doing it all to literally rock and roll the listeners from one aural orgasm to another. This record, which has been characterized as a history lesson, a music that connects one with the heartland of America and a passport to this country's past³⁵⁹, bearing resemblance to a crossroad that connects the past, the present and the future, all at once, has stood in my head for a long time as a monumental example of the type of works badly needed by the dying musicological heritage of the Balkans, yet thoroughly missing from the local scene. For, our societies are such that closed circles will always hold supremacy over the entwined, Olympic ones, which is to say that the gaps between the fans of the folk scene and the fans of the westernized music scene have remained hardly crossed by anyone. The danger of such closed circles is probably best illustrated by the failure of the protest art in the Weimar Republic, the first and the most powerful to emerge on the European soil after the end of World War I, to resonate with society at large despite its picking the reactionary autocracy and the militarism of the Kaiser's Germany to pieces, while also exposing the fallacies and hypocrisies of intellectuals like no modern art prior to it did. This failure of Europe's first serious subversive art movement is nowadays attributed solely to the fact that its works and messages were aired within closed circles, where expressionists and Dadaists are said to have essentially talked to themselves³⁶⁰, having little to no effect on the outside world inhabited by commoners, who craved guidance and guidance did they find in the resurrected power of martial Germany, with all the tragedies that followed. Misfortunes on an equally intense, albeit more subliminal scale, I believe, occur with the avoidance of the intersection of these two circles in my native culture, one occupied by the fans of the western musical heritage and the other one by the aficionados of the folk sound. With no truly talented local artists dedicated to building bridges across this gaping cultural ravine, it has surprisingly taken foreign artists, such as the American band Beirut or the fellow Chicagoan, Andrew Bird, to disgrace the domestic ones and come up with inspiring blends of the locally ethnic and the globally trendy. Of course, in a world wherein occupying a single stance for prolonged

periods of time enlarges the blind spot into which many of the potentially derivable insights will irretrievably fall, this is neither the first nor the last time that it has taken foreign eyes to come to a local scene, recognize its demerits and revitalize it, with some of the notable examples being Rolling Stones' infusion of glitter and glide into the muddily dirty and heavy rhythm and blues sound of the Delta and taking it by the hand to the radio stardom or Elvis Costello's restoration of perhaps an authentic sensibility, gentleness and prayerfulness in the growingly cold sound of an array of musical styles that hold the epithet of American on his record King of America. Federico Fellini likewise knew that only if he left Rimini of his childhood would he be able to depict its authentic beauties to the eyes of moviegoers all around the world. I have followed the same refugee route to be able to portray the delightful haven of my youth to the world and yet at this point in space and time I am deeply saddened by noticing the eerily broadening and wholly unbridged gap between the local musical heritage of my native country and the western trends which almost all the creative musicians in it are inclined to, allowing the former to wither and die from dehydration right before the watering cans brimming with the water of life that these unconcerned artisans hold in their hands. Recent history does contain musical works that stylishly blended the spirit loyal to the local tradition with the global trends, thus incarnating the zeitgeist unique to the local culture, but also being able to speak to the whole wide world, hoping that, as art in the eyes of Andrei Tarkovsky ought to do³⁶¹, it will connect the listener(s) with it. For example, where could the music of Idoli, Zabranjeno pušenje or Toma Bebić emerge but from Belgrade, Sarajevo and Split, respectively? Still, the ears of the modern, pro-western musicians that dominate the local scene populated by the intellectuals are helplessly blind to their intrinsic message, ignoring the fact that artistic works are to be like historical monuments, with a place for each secured in museums of the future day, where they would take their consumers by the hand to times passed long ago and immerse them in their authentic spirit. How in the world they would be able to do so if they sounded exactly the same as any new band from Zurich, Prague or Stockholm is the question that they, strangely, never bother with, as they, blinded by the setting lights of this world, continue to pursue their epigonic mission. While following the path of Blur, the band which started off as a baggy, Madchester band and went on an extensive tour across American cities and towns after the release of their debut, Leisure, but then became disgusted by the grunge scene that was unstoppably coming to the UK across the Atlantic and went on a search for an authentic British sound on the following three albums, Modern Life is Rubbish, Parklife and The Great Escape (ironically, the band embraced a very American musical style in their next release, Blur in 1997, while Graham Coxon's solo releases indisputably fell into the category of American indie rock, but this coincided with their transitioning from rising stars to falling stars and is a part of another story), thus earning the status of the most popular band in England along with Oasis, would be widely appreciated in countries such as France, Spain or the United States, the pursuance of one such path would be ridiculed and plainly suicidal for one's popular success in my hometown, Belgrade. 'Colonial education appears as a process of denying the national character, alienating (the national) from his country and his origin and, in exacerbating his dependence on abroad, forcing him to be ashamed of his people and his culture'³⁶², a notable politician said once, reflecting the estrangement from the tradition hung onto by the aficionados of all things western in this city, who have, albeit unaware, through the dissemination of their musical tastes, acted as tools of neoliberal political forces that propagate uniformity across the face of this globalized planet that has never been in need of the versatility of lifestyles and worldviews more than it is today. Needless to add, both musical industries that could benefit from a well-composed interplay between adaptation and evolution and people who could similarly adapt to their native backgrounds and from there on create novel patterns of expression could have stood on the winning side had the creative approach based on balancing the old and the new, the traditional and the trendy, been pursued. When Béla Bartók, the 'traditional modernist'³⁶³ with a

lifelong interest in the Yugoslav folk music³⁶⁴, posed the central question of his endeavors in ethnomusicology, ‘What are the ways in which peasant music is taken over and becomes transmuted into modern music?’³⁶⁵, he hinted at this need to work diligently until the ways to pick the particles of dust from the local heritage and turn them into notes of some diamonded sounds that would extend in relevancy far beyond the realms of modernity are derived. For, only when the crossroad that the impression of the present moment is stretches our arms as far as possible to the past on one side and to the future on the other could we expect the artistic experience to transform us into an epitome of the enlightening figurine displaying the Christ on the cross.

A simple comparison of Yugoslav music before the country’s breakup, during the times when a relative closeness with respect to the inflow of international trends and standards was instigated so as to preserve elements of the local culture to a certain degree, and the music that dominates the region on this very day, a mere copycat of actual worldwide styles on most occasions, has always secretly spoken to me about the importance of balancing openness and closeness for the sake of proper development of any natural system we could think of. Becoming fully transparent, a blind follower of principles imposed on us by our surrounding, or turning into a solipsistic deserter confined in a bubble of one’s own visions and thoughts is equally damaging for the harmonious evolution of our emotional and intellectual being in life. Henceforth, I have always thought that adopting a combination of the sacrificial cult of friendship and communion on one, native side and the Westernized cult of individualism on another, foreign side would lead to a triumph in the domain of human spirit for people in the Balkans. In this balance, the ideal of the Way of Love lies dormant. It may have been that living at the boundary between the communal spirit that the place of my origins abounds with and the individual spirit that I fed through consuming foreign artistic pieces predisposed me to develop this personal philosophy of mine, which thrives with one such balance between leaning onto one’s own inner path and cultivating warmhearted oneness with fellow earthlings. Living too much on the communal side, up to the point when intimate glimpses of the paths that we ought to follow and which are inscribed within our hearts become eclipsed by our blind following of other people’s ideals, would have had devastating consequences for my creativity, as much as living too much on the individualist side and neglecting to realize the beauty that my native tradition and the spirit of brotherhood and unity that it carried forth glow with would have had.

Be that as it may, it is the balance of (a) conformism standing on the shoulders of one’s immense respect for the tradition of human work and thinking whose invisible eye watches one from behind at all times and (b) originality rooted in the sense of uniqueness and the drive to differ and venture where no human soul ventured ever before that comprises the essence of every truly creative endeavor. The Way of Love with its dynamic, permanently fluctuating equilibrium between an empathic unison with the worldviews of others and a meditative immersion in the essence of our own being neatly reflects this balance. However, it seems to be a pervasive inclination of juvenile souls to fall onto the extreme side of non-conformism and excessive cravings for originality, whereas aspiring to create in compliance with sentiments and wishes of people around us naturally comes with age. Just like the Sun never suddenly brings daylight onto the face of the Earth, but gradually makes the multitude of faraway stars fade away, new ideas that eventually succeed in finding a fertile soil in the society rarely fall onto it similar to the cannon-shot described in the famous Balzac’s novel, *La Pèrre Goriot*. The true and lasting value of anything that produces abrupt fruits in the world around us and leads to immediate satisfaction should be always enwrapped by the shadow of a doubt in our thoughts.

This is why not a single truly innovative idea has ever been smoothly accepted by the society. Even when the long and winding road leading to the gates of their hesitant, halfhearted acceptance was crossed, a walk over the edge awaited at this very end, during which the ‘judges’ and the ‘referees’ of

the community pondered intensely and deliberated for extensive periods of time whether to accept them or not. And then, to their surprise, these very ideas went on to change the face of the world for good, making most of these judges and gate-keepers blush and only a few secretly gratified. Yet, this and none but this has ever since been my conscious choice as well. Due to my belief that every significant work must break the old habits of thinking and conduct and bring forth something new and original, not a single truly ingenious thought, act or work of mine has ever been accepted right away. Instead, pooped faces and condemnatory looks are what they have all instigated around them, providing a reason not to despair, but to rejoice. For, to perfectly conform to the opinion and the expectations of the majority is to be drowned in the river of time, to never ever live up to the divine creative potentials dormant inside of one and to fail to bless and beautify the world with one's blissful being, the world that is in as bad of a need to be blessed and beautified as it ever was.

Had I encountered either of the two extremes – a smooth acceptance of supposedly perfectly compliant works of mine or their immediate rejection because of being deemed absolutely unfit – my belief in the lasting value of my work would have become shaken. But I have known that by balancing a desire to write so as to be understood with a desire to enlighten the reader by infusing his worldviews with unexpected novel insights (for, that is the only way to contribute to the intellectual evolution of the society: to gently hold peoples of the world with one hand and to point with the other hand towards beautiful horizons that the future advancements of our knowledge bring forth), I would equally meet strong opponents and strong proponents in my life. If my works had left people without strong impressions, satisfying or disappointing, *that* would have been worrying to me. In my classroom, for example, students become regularly divided to my avid supporters, who'd faithfully follow each utterance of mine with a twinkle of that magical concoction of vivacity and melancholy in their eyes, and passionate haters, who'd incessantly direct scornful gazes at me and who'd carefully watch for my every word and physical gesture, trying to discern the slightest cue of inappropriateness in them and then blow a whistle on me to the administrators. Likewise, no written or musical work of mine has left its consumers indifferent, for they'd become either blown away by some surreal charms sensed in it or turned into a black hole of aversion and negativity upon coming face-to-face with it. What is particularly encouraging in this whole schizoid split in the realm of effects of my being in the world is that it seems to be a permanent destiny of all truly creative and innovative minds, from the times of the Christ to this very day, to face both compassionate minds that quietly radiate with a bright smile of support and confrontational ones that would do anything they can to prevent the spread of the influence of their ideas. This has all been the consequence of a principle deeply ingrained in the nature of social reality, which tells us that one is able to exhibit a truly creative innovativeness only by walking over the edge with one hand spread towards the love and respect of one's tradition, holding tightly onto it, and the other hand of ours waving and delivering exuberant outpours of revolutionary freedoms to the world.

Also, as one willfully steps forward to explore the boundaries between diverse fields of human thinking, such as science and theology, for example, he can be sure that a novel language that he will inevitably develop as a result of his multidisciplinary inquiry will sound unintelligible to most of the people whose minds have stiffened from enclosing themselves for too much time within single disciplines of human thought. And it is particularly unpleasant when such two areas in contact are subject to hostilities and seemingly irresolvable incompatibilities. This is when we risk getting caught in a crossfire as we stand, seeking a peaceful agreement between the two. Risks and benefits, on the other hand, always grow together, which is why such daring standpoints, on top of which we reach out to hostile sides in an attempt to reconcile them, are reserved only for the greatest and the most imaginative spirits of this world.

When it comes to walking over the edge, I consciously accepted the role of a catcher in the rye, knowing that in order to truly live for others and sustain a childlike loveliness in their play and in their eyes, I would have to be partly distanced and stand close to the cliffs of life, watching carefully that children in play do not lose their inner sense of orientation and fall down to the sea. While standing on these edges of life, I would occasionally look to myself as David Hockney's pensive version of an artist, portrayed as standing by the azure pool and watching confoundedly an angelic creature bathing in it, knowing that to capture the beauties of life one must resist to participate in living these beauties out. To that end, I would resemble a chaperone, a type of biomolecule known for its role in helping other proteins fold into their biologically active conformations and be transported through the bloodstream without being recognized by the proteins of the complement and the cellular guardians of the immune system, before being eventually released to carry out their physiological missions alone, without the chaperone, who would, unrecognized, sail off into the dark hematic streams of veins, arteries and capillaries of the body. To some extent I would also resemble a heterogeneous nucleation surface, the one that always appears on edges and crevices of supersaturated physical systems and facilitates their phase transitions, while it, itself, does not undergo them. When I was a child, I used to tell my Dad 'Watch me' whenever I was about to get engaged in an adventurous exploration of the world and temporarily distance my tender and trembly self from him. A sense that he looks after me from behind gave me an impetus of confidence, boosting my energy in creative play in which mostly myself and Nature were the only participants. But later in my life, I realized that the time was to come for me to take the role of one standing behind and, while not being engaged in the play itself, making sure that it proceeds flawlessly. As a consequence, throughout my entire life I have been excluded from playing and left watching the childish play of others all alone. But that is the cost that the real artists must pay to preserve their creativity and keep their inner sources of inspiration pure and intact. It is dreaming the living more than living the dreams that presents the key to building majestic artistic senses.

Even in the scopes of my professional career I seem to have been always walking over the edge in combining my passionate devotion to the problems of ethics, aesthetics and philosophy and my professional obligations that I also, after many years of realizing a subtle beauty inherent in them, quite akin to the dreaming lady from the aforementioned Gregory Bateson's allegory³⁶⁶, turned out to similarly zealously adore. And yet, throughout my entire career I have been carrying out my professional scientific tasks while adopting a freelance 'moonlighting' attitude, that is, by working on my philosophical and artistic writings secretly, carefully hiding them underneath the piles of experimental papers and lab notebooks whenever my supervisors would come close. Left alone in the lab or the office, like Superman putting on his cape and flying out a high-rise window to save the world before returning to the comparatively bleak identity of a Daily Planet journalist, so would I invest otherworldly efforts and energies in my writing lifesaving words like these, clandestinely, only to return to the shoes of a lab rat when the bosses swung around the corner to check on me. Following the steps of Jean-Luc Godard, yet another relentless breaker of conventions, flirter with the paradox and a master in directing digression and a loss of focus from the central thread of the storyline, who felt to have been equally involved in the creation of high-quality movies as a film critic and as a filmmaker³⁶⁷, by means of my philosophical and popular writings, including this very book, for example, I have attempted to elucidate problems and outline solutions within the foundations that support science as well as within innumerable contexts in which it exists, contributing thus to its progress as much as, if not more, I do by diligently doing my lab work and making small research steps towards discoveries of direct, practical significance. Therefore, I have never felt guilty for secretly working on my philosophical papers or books during the regular working hours at the university. Not only have I been determined to be a Robin Hood in the realms of the modern science, but I have also known that even Albert Einstein produced his

most elaborated manuscripts on the theory of relativity at the times when he had to hide them in drawers whenever he would hear footsteps of somebody approaching his working place at a patent office in Bern. In the same style, Arthur Schopenhauer was known to have worked on his philosophical discourses during short spare time spans in the midst of his working as a merchant apprentice, all in order to satisfy his father's wishes as to what his career choice in life should be³⁶⁸. In doing so, he had lived up to the same balance between pragmatic and philosophical creativity as that which I have opted to fully embrace in life. For, 'a person of high, rare mental gifts, compelled to attend to a merely useful piece of business for which the most ordinary person would be fitted, is like a valuable vase decorated with the most beautiful painting, which is used as a kitchen pot; and to compare useful men with men of genius is like comparing bricks with diamonds'³⁶⁹, as Schopenhauer pointed out on one occasion, portraying thoughts that have ran through my head innumerable times during my treading along parallel tracks, scientific and artistic, as risky and yet fulfilling as I can imagine a devout creative work to be.

When one of the greatest tennis players in the history of the game, Roger Federer, was asked about the secret of his success, he simply said, '80/20', referring to the well-known strategy of spending 80% of time playing/working with 20 % of strength and 20 % of time playing/working with 80 % of strength. This ratio is, of course, variable depending on the person and his workstyle and can go as down as a minor percentage of 1 %, as in the case of a type of goal-getter in soccer known as cobra, that is, someone who may seem indolent and uninterested to even run for most of the game, but is in reality alertly waiting to make a run into an open space, receive the ball, send it into the net and effectively resolve the game with a two second maneuver, just like a cobra biting its enemy. All this is to say that whatever the actions tied to a certain skill are, the mastering of this skill will require the mastering of the complete opposites to those actions. This principle accounts for many of my skills, including my indisputably idiosyncratic approach to scientific work and productivity. Namely, I have tried dedicating close to 100 % of my capacities to pure science, but then I realized that in such a way I barely improve my productivity at all. And so I switched back to something that resembles the 80/20 strategy more, with a plenty of time spent on the argumentation of my philosophical and poetic thoughts. This is how I restored the good old productivity I had once exhibited. Hence, to be a successful scientist, one needs to feed the thirst of one's philosophical and artistic senses and constantly question the meaning of it all. But in order to be a productive artist, one similarly needs to adopt scientific rigor and discipline in one's creative attitude. My mind is thus perpetually preoccupied with simultaneously creating works that elevate human spirit and stand as a testimony of the eternal beauty of human being on one side, and exhibiting creativity that spreads its hands outwards and benefits the world around in practical terms on another. For this reason, I have compared my journeying down the river of sciences and arts with a canoe ride during which I would alternately paddle on one, scientific side and then on the other, philosophical, artistic and religious side, and so on and on. In such a way, my journey along this river of creative being has been made swift, smooth and light. I have known that following a straight line by peddling only on one side of the boat is possible but terribly energy-consuming, distortive with respect to our physical and mental balances and much less efficient on top of it all. Switching my attention from scientific textbooks to aesthetic discourses to chess games to dreamingly immersing my mind into sublime clouds of thought to ultrafine lab bench work to prayerful and ecstatic writing to sophisticated calculations to listening and playing music, all in a matter of hours, has thus prevented me from dully and monotonously staring at a single field of thought and letting the blind spot eclipse the sunny glow of my curious attentiveness and extinguish my thirst to dive in the endlessly deep oceans that each one of these fields of thought conceal. Instead, this crisscrossing dance of my attention between the fields of science, arts and philosophy has served the purpose of igniting, rather than suppressing, my creativity in all. Just as 'physical work becomes easier to perform when the motions involved are regularly

alternated³⁷⁰, so do extensive analytical studies in my mental universe require frequent switching of my brain to the domain of artistic, philosophical and theological thought, while prolonged dwelling in the latter craves for igniting analytical cerebral powers every once in a while, lest both of these hemispheres of my mind undergo withering should they be used solely, without complementing them with their mental antipodes every so often. And in such approaching scientific problems with a part of my mind always distantly resting on philosophic endeavors and poetic windmills that I have been tilting at, I have actually personified the ideal of the Way of Love. As the latter suggests, whatever we engage our creativity into, a part of our mind has to be shining with the light of our attention outwardly while another part is eclipsed and turned inwardly, meditatively processing one's emotions and memories deep inside of one's self.

Someone has said that the most beautiful songs, songs that would enlighten the world the moment they were transformed into an audible music, rest dormant in each one of our hearts. An art is to learn how to express these minute sources of inspiration as much as to nurture them. I have known this for a long time, which explains why I have spent so much effort finding the right channels to express the essence of my being through music and words. In fact, the Way of Love is all about sustaining the shine of celestial beauty within ourselves and opening the ways for its expression by dispelling the clouds of gloomy thoughts and emotions gathered around this inner glow, so that it can emerge out and bless the people of the world. It was with having the aforementioned brave imperative of John Updike in mind that I stepped up to challenge the tradition of simple linguistic expressions in English with long, convoluted and rollercoaster-like, almost never-ending sentences with hidden and multilayered meanings, typical of German philosophers, in my writing. This, of course, caused many protests, but I learned to live with them. Because what I have badly wanted to achieve ever since was a harmony between scientific exactness, philosophical clarity and poetic abundance, reminiscent of fireworks of beauty, so typical for my inner synchrony between the intellectual rigor and poetic imagination. Alchemically blending the clarity of a sun and pleasantly intoxicating starriness of the night sky was, of course, what I saw as a path leading there. Yet, that many obstacles would stand in front of my works before they become embraced by the literary mainstreams was clear to me from the first day I laid my pen onto this glossy virtual paper. And my impression of the opinion of servants of moguls of the publishing world and guardians of the wide gate (Matthew 7:13) through which the babies of my books would never enter to see the world after reading them was quite concordant with the one Gustav Mahler placed in a 1896 letter to Bruno Walter: 'I have no doubts that our friends, the critics, appointed or self-appointed, will once again suffer from dizziness, but those who enjoy the pleasant strolls I offer will find them fun'³⁷¹. Hence, when one of the reviewers of a philosophical work of mine wrote that the 'this richly-written paper is infused with information, and covers a truly eclectic range of disciplines, authors and approaches... my main criticism of the paper, deriving from my initial experience of reading then re-reading this paper, was one of dizziness, and a desire to be able to stop and (try and) digest the enormous number of ideas being raised before continuing. But such self-enforced stops did not solve the problem (for this reader at least) as the paper has a breathless nature to it, a desire to pack in more and more ideas in highly-concentrated form. As a result, it reads like a stream of consciousness... the flood of information... a shower of ideas'³⁷², I took it as a compliment in view of my desire to convey analytical clarity with neatly and consistently interwoven arguments as much as to produce starry dizziness in the readers' minds, to intoxicate them with the beautifulness of the presented ideas, and spin them on a carousel of cosmic joy. Also, after Henry James received a response from Harper Publishers' reviewers to the submission of the Ambassadors, the novel which the writer considered his 'most perfect piece of art'³⁷³ and which would a century later be listed by the Modern Library as one of thirty most significant English-language novels of the 20th Century³⁷⁴, saying that 'the tissues of it are too subtly

fine for general appreciation; it is subjective, fold within fold of a complex mental web, in which the reader is lost if his much-wearied attention falters³⁷⁵ and advising merciless rejection, every time my written (or even musical) works become turned down due to their epistemic and stylistic complexity, I worry not; for, I have known that when the gates of man shut before us, the gates of Heaven usually open in all their ethereal glory.

Ever since I submerged myself into the magnificent world of Hermann Hesse's Glass Bead Game, I knew what the path of my life would be: the one of finding the right balance between threads of logic rigorously drawn by an intellectual clarity and a sense of divine beauty. Innately, I had it in me. I have always been aware that my Father's intellectual clarity and rigorous scientific character, altogether with his Montenegrin origins and the stony terrain and dark mentality of these areas that they invoke, combined in me with my Mother's romantic liveliness and inhalation of pure, cosmic beauty, altogether with her Dalmatian origins and the enchanting seascapes that they immediately invoke. How to balance the symbolisms of stone and sea has meant to be my aim in life. And how else to do that than by standing at the seashores delighted by the breadth of the sea and its lovely, subtly crashing waves and yet playing with tiny pebbles, seeing the cosmic vastness in each one of them? The great symbolism of the meeting of stony Yang strength and willingness and wavering Yin melancholy of the sea has thus been inscribed in me. And I have already pointed out how these places where the sea of randomness and the stony coasts of firm knowledge, rigidity and flexibility, faith and wonder, closeness and openness, inside and outside meet is where life and all its qualities have arisen.

Later, after I got acquainted with Dostoyevsky's Idiot, I consciously devoted myself to instilling an everlasting and divine beauty to all the aspects of human knowledge and experience. However, it was not before I came up to Gregory Bateson's Mind and Nature that the way of how this balance could be concretely achieved and expressed clearly opened in front of me, thus substituting amorphous and formless conceptions living somewhere deep inside of me with a clearly crystallized vision. It was for the first time that I peered into a harmony between aesthetics and science that was neither pathetic nor empty and prosaic. In other words, I realized that systemic thinking is the key to linking science and religion, and ratio and arts and beauty in general.

For many years I could not write anything without keeping an eye on the aesthetics of the structure of the whole, and without inhaling some poetic character and an inherent wisdom to all the thoughts I expressed. Once, I remember, I even swore in devotional ecstasy that every thread of thought impressed in words, be it an ordinary email, a research budget justification or poetic lines adorning this book, would be written with love and the spirit of divine oneness engrained in it, irrespective of how clichéd, purely informational and impersonal the given communication was demanded from me to be. For, when one becomes a master of a craft, be it putting symbols in a sequence or plucking guitar strings, using these skills for a more primitive purpose might degrade one's talents, as I believed; if one is asked to cut logs with a sword, the swordsmanship one is endowed with would slowly dissipate in the air. And so, no matter how simple the task given to me would be, I felt as if a few paintbrush strokes had to be applied to decorate the outcome with signs that magically awaken a sense of divine purpose in one. That, of course, presented a problem when I first started writing scientific articles in which the flights of human spirit are not tolerated at all. As a result, I learned to soften up their influence, but never truly gave up. Still, the compromises I have made to allow the beloved babies of my writings emerge to the social daylight occasionally made be literally heartbroken, as in the case when the paper I wrote to elucidate the role of a particular crystallographic element of hydroxyapatite crystals, a.k.a. hydroxyl ion channel, in defining a selected set of their peculiar properties was denied publication until all instances of poetic expression were erased from it or replaced with heartlessly dry verbal substitutes. This, I remember, would not have been so depressing had I not written this piece in the moments my Mom was

transitioning to another plane of reality, slowly setting for the Great Sail far and beyond the fields of the Earth, and infused it with secret, implicit reference to the spiritual magnanimity that she had been. And so, in spite of the scientific rigor of the discourse, I wrote about the marriage of water as ‘the princess of peculiarities in the realm of fluids’ and hydroxyapatite as ‘the crowned prince of peculiarities in the world of crystals’. I christened hydroxyapatite also as an ‘ugly duckling in the materials science universe: unappealing at first, to those who spend enough time befriending it, it will come to reveal extraordinary beauties and meanings extending far across the world of atoms and molecules and into the realms of our psyches, our social lives and beyond’. I inspiringly talked about Nature and ‘the wonders of Her works’ when it came to explaining Her choice to use ‘hydroxyapatite to build the bases of our biophysical structures with’ and prove along the way Her ‘finding utility in peculiarity’ and ‘perfection almost exclusively in imperfection’, all of which was a secret seal of remembrance and homage to my Mom and to the divine beauty that she brought to this Cosmos.

The high-note ending invoked ‘a magic thread’ as a metaphor of the hydroxyl ion channel structure. ‘Future will tell how many insights relevant for our fundamental understanding of materials and for continuing to harness their untapped biomedical potentials await those who will continue to pull this magic thread that runs from surface to surface, through the heart of things’, is how the first ending went, yielding words which, I sensed, were echoing through the ages with their subtle immaculateness. After this caught the insipid eye of the publication managers at the Royal Society of Chemistry editorial office and they raised their ugly red flags, asking for this to be replaced, I conceived of a different ending, wherein I compared the theoretical and the experimental strivings to examine the effects of the hydroxyl ion channel on the properties of hydroxyapatite as comparable to ‘digging of a tunnel from two opposite sides, hoping that the hands that make their way through the dark will eventually meet in the middle’. ‘And each time they do’, I continued, ‘a new magic thread, like that running through the center of the crystal that was the subject of this study, will have been drawn, perhaps to remind us on a grander scale of things of the infinitude of applicative and inspirational analogies latent in the structure of this magnificent material’. And this, too, went into oblivion rather than down in history. A particular attention in my writings I pay to reflecting the central ideas promoted in a piece in every single aspect of it, in which case talking about peculiarities necessitates the infusion of the piece with peculiarities at each of its structural levels, the role of which poetic lines enfolding it at the beginning and the end were meant to serve, alas all but being tolerated by this prestigious publisher. In any case, when I erased this ‘magic thread’ and substituted it with a prosaic ‘line’, something beautiful vanished and a wonder if the soul was sold to the devil at that instant of time installed itself in its place, to haunt me for as long as I am alive. Still, I solaced myself with a hope that this was only one lost battle inside of a greater war, the war waged for the sake of restoration of the Renaissance and the Romantic in science, the science which, sadly, becomes deader and deader with every new day.

A colossal challenge it is, indeed, to endow rigidly styled scientific papers with an underlying aesthetical form. It also the ideal for the sake of the fulfillment of which dying in this evanescent body would be but a small price. And despite advancing like a spiral, making one backward step for every forward step made, looking back at my scientific articles I do see the traces, shades and nuances of beauty penetrating them to an ever greater and a more confident extent, perhaps proving that everything becomes easier after one becomes accomplished in merging the aesthetic and the analytical in a fine manner. Still, to this very day, even when I engage myself in writing a purely administrative application or a proposal, I spontaneously construct my expressions guided by the voice of beauty from the inside. Science, for me, is still a battlefield on which I am guided by the principles of beauty in an equal or even larger extent compared to the merits of reason.

So, for example, to prompt the closing of the circle that runs from being to knowledge and back to being again, the circle whose drawing epitomizes the Faustian mission of all beautiful intellects in this world, I have implicitly called for the destruction of language on many verbal communication platforms. Not only have I ended a number of my philosophical papers with random arrays of words, such as ‘ocean waves, seashore pebbles, corals, fish, atoms, gramophones, pine trees and stars passing me by’³⁷⁶ on one occasion and things ‘shattering into a shimmery semblance of the starry sky, incomprehensible but dazzling and mysterious, a silhouetting chiaroscuro, an anahata sound, a squirrel and a pine needle, and then a star’³⁷⁷ on another, but many of my formal communications, which could have been dry and boring in essence, I topped with inarticulate sequences of words, for kicks profoundest in nature, as, for instance, in the letter of application to join the editorial board of the most prestigious scientific journal on ceramic materials, *Journal of the American Ceramic Society*, wherein, to accomplish so, I referred to ‘my two-year old boy making lively strolls through the apartment in the evening hours and making writing long emails difficult, the reason for which I must wave goodbye and send best regards before he comes busting the keyboard againmmmmrm//mnmnn,xaz@mmmmmmmmmm’³⁷⁸, all for the sake of implicitly signifying the necessity of throwing away the ladder of language after we climbed on it to starry heights, just as Ludwig Wittgenstein did at the very end of his tractate³⁷⁹, if we are to become whole again and reenter that Paradise lost long ago. A golden word, after all, as the Serbian proverb has had it, unlocks even the steeliest of doors in life and, if you ask me, I would tell you that every humanly imposed gate has a magical combination of words that unlocks it like a charm. This is how I have come to know that every battle could be won if the powers of divine spirit are tamed and used on our side, including this battle of mine in which the bureaucratic dryness of contemporary science and social being is posed against a ‘world so live’, if we were to quote the memorable outcry of Tom Verlaine in Television’s *Venus de Milo*.

Thus, when I am being advised to use my writing skills to make something profitable, my answer is that without this genuine desire to produce something beautiful and priceless, there would be no skills that I am otherwise in possession of. Inner drives in terms of benevolent wishes and aspirations is what keeps the wheels of human creativity spinning, just like the desire to live and love keeps the windmills of healthy and prosperous living turning. Also, by financially supporting myself through science while investing my heart and soul in my philosophical and artistic works, I have never been pressed to advertise my works to my peers and the public in order to ensure my bare survival, which took a big burden off the back of my babies, as I have baptized my works on more than one occasion, given the tainting effect that the advertisement of our works usually has on their bestowal upon the face of the world. And by continuing to pursue the path of independent thought, philosophical, poetic and scientific all under one umbrella, while refusing to join the ranks of dry administration in academia, I see myself as truly alive; or, as stated by Murray Burns in Herb Gardner’s *A Thousand Clowns* in regard to his approach to teaching his nephew, Nick, about life, ‘I want him to know it’s worth all the trouble just to give the world a little goosing when you get the chance and I want him to know the subtle, sneaky, important reason why he was born a human being and not a chair’, the exact words I may use if I ever become offered to substitute my position in the lab or beneath a snow-white cloud brewing with the sources of poetic thought with the one of departmental chair or its likes. Hence, in relation to my refusals to become a slave to administrative traps at the faculty levels in science and rather remain a Robin Hood, a soul relying on an innate sense of justice and keeps the ethical referential frames in the starry framework of one’s own thoughts rather than in principles imposed by the worldly authorities, and that takes a bit away from the rigid system of funding scientific research to enlighten the hearts of innocent childlike creatures that occasionally turn to science to look for the answers to the fundamental

questions of life, I enjoy telling a story about Chuang-Tzu and the turtle, which closely echoes with the message delivered by the Biblical Parable of the Trees (Judges 9:7-15).

And this is how the story goes. While Chuang-Tzu was fishing on the river Pu, two couriers from a distant state approached him, saying: 'We are sent by the great prince Chu. He wants you to become the minister of his province. It is the richest and the most prominent of all the Chinese provinces'. Without switching his focus away from the fishing rod, Chuang-Tzu said: 'I know that in the province of great Chu a castle exists. In that colossal castle, there is a room ornamented with tens of thousands of gems and other precious embellishments. And in the middle of that lustrous room there is a case made of pure gold. In that case, there is a turtle that lived a hundred and fifty years, and is now mummified in most expensive clothes. Is all of that true?' The two couriers looked each other bluntly, and confirmed: 'Yes'. 'Now, tell me', continued Chuang-Tzu, 'do you think that that turtle would rather be dead and lie in the most expensive clothes in that preciously ornamented room in the most revered castle in the beautiful prince Chu's country, or be alive and spank this mud with its tail?' The couriers again looked each other, and said: 'Well, it would prefer to be alive and wiggle its tail through this mud'. 'Then, go away. I also prefer being alive and playing around in this mud', finished up Chuang-Tzu.

This, of course, goes without mentioning that on another occasion, when Chuang-Tzu was asked by an emperor to draw a crab, he asked for a house in a pastoral setting, twelve servants and five years to do the task. The emperor agreed. At the end of the term, Chuang-Tzu asked for even more time to finish the drawing. The emperor agreed again. Five years later, Chuang-Tzu picked up his brush and drew a crab in a single stroke. Needless to add, the emperor was delighted, claiming how it was the most superb drawing he had ever seen. In Jacques Rivette's film *A Beautiful Troublemaker*, the painter Frenhofer's goal was 'to capture the whole life on the canvas of a painting with a few traces of a paint', but it could be thought of as a pale image of the skill to seize the infinite within the finite that Chuang-Tzu had been in hold of in his day.

It is not certain if Pablo Picasso knew about this story, but his may be a contemporary example of the same message that Chuang-Tzu wished to bestow upon people by drawing a crab with a single stroke of a pen. It occurs midway through the documentary film made about the Spanish painter by Henri-Georges Clouzot³⁸⁰, in a scene where the French filmmaker and his cameraman announce that they almost ran out of the film for recording and ask the painter if he could paint something in five minutes, which is how much film was left on the reel. Picasso agreed and to the question of what it was going to be, he said simply, 'Anything', and went on to paint, slowly but hurriedly. Then, in the very last seconds of the extra time added to the painter by Clouzot as a gratuitous bonus, so he could finish his miniature masterpiece, to everyone's surprise he started painting a large black blotch over the lines he had drawn in the center and then three silhouettes around it. That was when he got interrupted and forced to put his paintbrush down. This became the work known as *Visage: Head of a Faun* and its reconstruction is currently on display in the British Royal Academy of Arts in London. Although the painter never explicated what he meant with this unusual display of artistic showmanship, many of the subliminal messages could be read from it. For one, it signifies that the creator should not hesitate to erase everything he had created so far, even when it had taken years to complete, to say something profounder with lesser means, which, like Chuang-Tzu's crab, needs no more than one or two strokes of the brush to reach the divine levels of expressiveness, not hesitating along the way to leave the work intentionally unfinished, too. Naturally, it takes not an arrogant wiseacre, but rather a thinker who doubts one's thoughts from one moment to the next and is prepared to revise them from head to toe with each breath of the Universe to engage in these peculiar and playful bouts of creativity.

Be that as it may, whenever I would face people in my life urging me to begin to act in smart and cunning ways and stop living up to Paddy McAloon's meek motto that 'feeling cheap is the only thing

you keep'³⁸¹, implicitly pointing out that life is the same ground for a heartless battle for survival as it has ever been in the animal world, I remind myself that I am not interested at all to participate in this rat race for the humanly prizes of pride and mammon. Instead, I am interested in godly praises, and nothing much beyond it. Like the bear from a Hafiz's poem, sitting in silence on a starlit hill with a friend and 'feeling grateful for life', then hearing a story about one who 'has become famous and travels from city to city in a golden cage, performing to hundreds of people who laugh and applaud his carnival stunts'³⁸² and beginning to weep right away, in sincerest compassion, I have always felt unbearable pity, not envy, for politicians and other pompous pheasants who sacrificed their place on quiet dreamy hills, under a blanket of stars of wonder, with laurels of fame and stature received in the bustle of limelight by fellow humans. Thus, I maintain that I live for the sake of two things. One of them is bringing light to the world, something that could be done so long as one, like stars of the night sky, remains immersed in the darkness, all alone, and the other is living up to the divine, not human expectations regarding my mission on Earth, requiring a great deal of withdrawnness and listening to one's own heart in silence and solitude. The first inner drive may come from the benevolent heart of mine, unable to beat without doing that for the sake of beautifying the world and other people's worldviews at their foundations. The second drive, however, comes from what I see as a sense of faith and belief in the divine underlying purpose of the existence. By perceiving the world and acting in it upon the grounds of these two guiding principles, I strive to synchronously incarnate the two nodes of the Way of Love, the devotionally meditative and the empathically expressive, as exposed in the two major Christian commandments (Mark 12:29-31), respectively. However, the possibility for these two vital aspects of immaculate being to enter a conflict with each other signifies the dynamic nature of crucial, life-sustaining polarities in life. Should we find poles that could be brought into perfect equilibrium, we ought to know that the creative potential of this balance has to be a minor one. But once a combination of symmetry and asymmetry shows up as imminent, the chances for realizing the ubiquitous meaning thereof might soar. Such is certainly the case with the encounter of the love of man and the love of divine Nature, taking place in all the peaceful plays or raging battles within our hearts and minds. Balancing the two remains the task for the most graceful and enchanting beings of the world to engage in.

The story about Chuang-Tzu and the turtle confirms my beliefs that it takes a certain impurity in spirit to become so incredibly rich compared to the rest of society, and that Nature has provided rich people with so much just so that they would be able to reward others and wash their sins away through charitable deeds. Me, I would always be oriented towards horizons that outline the divine beauty and God's grace in truly everything, believing that Nature would provide me with just about everything, neither more nor less than what is required to keep my creativity flourishing.

And that I would be about to find a stunning beauty in many different details of my world, which is the central point of every authentically systemic view of the world, I demonstrated even as a toddler, running out in my lone moments of chasing dragons, twinkly fairies and butterflies in my fancy to tell my Father 'remember, remember'. In that sense, an innate desire to impress the memories of mine onto a substrate for other minds to enjoy may have been deeply ingrained in me ever since I was a child. Today, I do not let a single enthralling thought disappear down the hollows of oblivion before it gets impressed onto the pages of these and other books of mine or my scientific or philosophical articles, almost as if the goal is to be able to reload the content of my consciousness anew from these backups of my memory should it ever become amnesiac. Therefore, from the time I was four or five to this very day, the image of the geeky boyish writer from the movie *Everything is Illuminated*, with whom I share a strangely similar grandfatherly connection on the paternal side, leaning down to pick up a grasshopper from a sunflower field, only one of out of innumerable objects from everyday life that he would collect fearing that it would be otherwise washed away by the waves of oblivion, is the one I could point at and

say, 'This could be me'. I have known that the utterly blissful experience of reality would erase in an instant all our cravings to record it for a future reference, letting all our cameras, notepads and sound recorders drop from the limped arms of our bedazzled and infinitely awed selves, as it happened to the two divers that my Mom told me about on a beach in Split in the summer of 1984, who got so amazed by the underwater ruins which they accidentally came across and which easily could have been the remnants of Atlantis that they forgot to use their cameras to capture them; however, the urge in me to communicate the beautiful ideas and visions that arose in me and save them from falling down the voids of oblivion has prevailed over this thirst to immerse myself in the most authentic and fulfilling way of being and find bliss therein. Thus, I have spent great portions of my life succumbing to the fears of forgetfulness that ruptured my spirit and working hard, mentally and physically, to rescue millions of ephemeral ideas arising in me and give them a palpable, material form before they are being scattered into the winds of evanescence. All my books could be, therefore, considered memory scrapbooks, if not straightforward memoirs, thanks to their containing reminders of interesting ideas that I have come up with or discovered along the secret alleys of my half-savagely-half-saintly mind during this journey called life and that I feel that I must impress on the paper before these winds of oblivion come and carry them away. Many people, for this reason, when they see me writing frantically on bus stations, in busy marketplaces and at parties, let alone when they encounter the breadth of my written oeuvre, confuse me for a writer, not knowing that 90 % of my writing skills has come from hard work rather than from the natural-born talent and that what motivates me for this work is simply my enormous anxiety over the transiency of things. It impels me with the zeal of a wolverine to record every single thought I have found valuable before it fades away and vanishes from my mental screen. After all, according to John Dewey, what distances us, as human creatures, from sheer bestiality is the ability to endow the objects that distinguish our experiential reality with past memories and, therefore, a meaning, so that 'a stone is not merely hard, a thing into which one bumps; but it is a monument to a deceased ancestor'³⁸³, as he deemed it. If that is so, then this process of association of physical objects with the attributes emerging from the pot of our mind wherein memories and emotions and melted and crafted into alloys of spiritual significance can be the one via which we advance along the rope that extends from the animalistic to the angelical and from the subhuman to the superman in terms of our being's qualities. Being aware of this has provided an additional motivation for my creative drives to act in the spirit of the Indian girl who had a habit of impressing her lifesaving dreams onto pebbles and rocks and then giving them to endearing earthlings so that they could put them under their pillows at night and revive them in their sleep.

As you see, my obsessive-compulsive need to transform every single original thought that arises in me and that I deem valuable into words and thus save it from being erased by the breezes of oblivion off the sand dunes of my mind had an early reflection in this running around of mine and insisting that my Father remembers all the tiny details of the world that impressed me at the moment. I was not older than four when this strange drive to save things from oblivion arose in me on the wings of a primordial, archetypical feeling a.k.a. *mono no aware*, i.e., 'a sensitivity to ephemera', a feeling that in the Japanese culture stands for the root of empathy with all things, living and inanimate. The gentle sadness arisen in me when an object would break, disintegrate or disappear was immense even at such an early age, echoing Virgil's timeless verse laid down to depict the moment of Aeneas' gazing wistfully at a mural in a Carthaginian temple dedicated to Juno³⁸⁴: *Sunt lacrimae rerum et mentem mortalia tangunt*, meaning 'there are tears of/for things and mortal things touch the mind'. Hence, ever since I was a child, the dance of life in my eyes has been akin to the legendary view of the dancers in Kurosawa's *Ikiru* from behind a wavering bamboo-beaded curtain, as if to suggest that any joys and pleasures of life will sooner or later have the curtain drop on them. This awareness has permeated my worldviews with the waves of

the sea of melancholy, at the rocky bottom of which, I knew, the treasures of wisdom, like those crystallizing as words on this page, lay scattered. Diving for it became my favorite pastime, albeit at the cost of carrying the burden of sorrow for the things gone before their time on Earth expired everywhere with me, even to the most festive of locales. Gradually, this pathos enfolding the awareness of the transiency of things became a major fuel for the flame of divine wonder and its starry flicker perceived in all things, in and out of me. This early manifestation of the fear of change and of the impermanence of experience, which I would later recognize in my son, Theo, too, explains why I have found one of the most touching cinematic moments to be the one when Andre Gregory ends Wallace Shawn's 'dinner with Andre' by saying the following before the sound of Erik Satie's *Gymnopédie No.1* begins to echo through the air: 'People hold on to these images of father, mother, husband, wife... because they seem to provide some firm ground. But there's no wife there. What does that mean? A wife. A husband. A son. A baby holds your hands, and then suddenly there's this huge man lifting you off the ground, and then he's gone. Where's that son?' My deep fears of the ephemerality of life are also summed up in the ending verse of *Pet Sounds*, one of my favorite records and greatest inspirations in art: 'Could I ever find in you again things that made me love you so much then; could we ever bring them back once they have gone?' The spontaneous evanescence of both the epistemological traces of our being in the world and its ontological appearances are embraced by this wondrous question posed at the very end of the record, seconds before the final sounds of a whistling train and dogs barking in the distance are about to end it for good. Alongside unambiguously symbolizing fear of the passage of the train of time, on a brighter side these two sounds also evoke the Arab proverb 'The dogs bark, but the caravan moves on' and distantly remind one that the mindset predisposed to attain starriness in life lives in concert with the final premise of Lao-Tzu's *Tao-Te-Ching*, 'Truthful words need not be well chosen words; words chosen well need not be truthful words; a good man does not debate; who debates is not a good man', not coincidentally at all being the same two sounds to which the mute and mysterious girl at the end of Tarkovsky's *Stalker* performs a miracle.

Therefore, this perpetual anxiety over the transitory nature of life has been like a flame that kept my thirst to creatively express myself through science, philosophy and art ablaze. It is almost as if the bedazzling beauty and joy that I have perceived in life at any given instant of time has been one pole set forth in the back of my mind and this fear caused by the inconstancy of things another. Via their fundamental disparity, the two poles have formed an electrical potential of a kind, a tension that has driven the current of creative forces to stream within my body and mind. 'Names mingle, vanish, but works remain. Life is short, but art is long', the words with which my 16-year old Mom ended one of her high school essays are the words that have reverberated inside me ever since. 'I am finite, but my work can be infinite. Unlike me, it can be made to live forever', is how I often explicated my stance when asked about my professional goals, typically with an attitude intrinsic to Oasis' *Live Forever*, carrying a message whose stridency would resonate loudly in the ears of my colleagues, especially in mediocre institutions, who were in it for the money and bare survival, unable to grasp the transcendental connotations and feel the echo that it has sent through the ages and cosmic depths. Here and there, however, I did come across minds whose creativity in writing was driven by a similar desire to mark things, dreams and memories down before they drift away carried by the breeze of time. 'Much of my writing is about loss'³⁸⁵, the San Franciscan writer, Rebecca Solnit says. 'In that sense of loss two streams mingled. One was the historian's yearning to hang into everything, write everything down, to try to keep everything from slipping away, and the historian's joy in retrieving out of archives and interviews what was almost forgotten, almost out of reach forever'. Consequently, 'Mysteries to find' is the title I gave to my first collection of songs, combining in it things hardly combinable: that is, the act of finding as the opposite to being lost and forgotten with knowing that only mysteries and puzzles can

be the source of our evolution to higher states of being. Symbolically, the process of recording this collection of songs, the only one recorded in Belgrade rather than in its suburb of Mala Moštanica, followed a similar juxtaposition of opposites as that implied by its title. Namely, the low working memory of the computer, as I remember, forced me to play the channel on which the typically moody and mystical rhythm guitar pattern was recorded on a separate cassette player while recording the solo guitar line that evoked the joy of 'finding' on the second channel; the slightly slower speed at which this cassette player played this first channel than the real speed at which it had been recorded made it grow subtly out of phase with the second channel, like in Steve Reich's *Come Out*, the composition created by having two tapes played in a loop at slightly different speeds, allowing them to diverge and get out of phase minutes into the recording, transmitting the sense of losing the thread, of missing a connect of vital significance. For, 'it is in the nature of things to be lost... we should be able to find our way back again by the objects we dropped, like Hansel and Gretel in the forest, the objects reeling is back in time, undoing each loss, a road back from lost eyeglasses to lost toys and baby teeth', as Rebecca would further point out. This may also explain why I have always enjoyed journeying on trains while sitting in one of those rare rear-facing seats. Namely, the reason for this peculiarity lies in my preferring the feelings of letting the details of landscapes that the train passes by slowly disappear in the distance, as if symbolizing the tendency to give away, erase and strew the fields of the world with the beauty lying deeply concealed within our hearts. As someone jolted down on the sticky pavement of upper Haight St., 'Only when you give up everything will you be able to give anything'. And so I let things move away from me and go, go, go, especially after a day of strenuous exertion of the intellect. Thus I feel as if the creative energies in me reconsolidate and the shininess of the spirit restores.

It was hard for me to find a musical piece with a more appropriately reflected clash between the streams of love and fear swirling through my being than the Beach Boys' *Pet Sounds*. I have always connected this romantic concoction of love and fear to the way I was born, the event which could have easily not happened owing to an infection my Mom had suffered from during the pregnancy. My life as a fetus was meant to come to an end with a giant injection of table salt. Hence, every time I glimpse a pile of salt, such as that on the back cover of *10000 Maniacs' Love Among the Ruins*, it reminds me of the duality it has been a symbol of: on one hand, it was in a salty sea bouncing off the soft walls of my mother's womb that I began this enchanting journey called life, while on the other hand this very same salt, the food of life by means of which our neural cells light up as they communicate with each other, was meant to prematurely end my antenatal life. As someone who was directed by the hand of fate to be a professional in the field of medical research, my beginnings as a sentient creature on this planet, revolving around this ominous injection of table salt, have taught me to take any medical advice with, well, grain of salt, if not to question at times everything spoiled and venomous nested in the heart of the medical practice, which, like everything institutionalized in this world, invariably corrupts the pure essence of its original intent. How much of a blessing this rebellious attitude that constantly questions the premises and practices within one's own field of expertise is becomes apparent to anyone who has come to realization that noticing flaws in the fabric of reality is the first step towards making discoveries that will ameliorate these or, as it is often the case in medical research, some other flaws. Therefore, right next to this table salt standing ominously in front of me, an angel, such as that appearing in the corner of our eye whenever the times are tough, so as to alleviate the hardships of the world, levitates, reminding me of a creature that suddenly popped up in front of my Mom as she sat in the hallway of a hospital and waited to receive this lethal injection, softly whispering that rubella need not impair the child's development. Her willingness to shun the medical advice, walk away from it and bear me, with disregard of the pessimistic predictions of doctors about the prospect of my intellectual and physical development, was preceded by a mountain-moving battle between her love and her fear. And the fact

that I was not supposed to be born under these circumstances implanted a cross deep inside myself, a cross that will have my spirit crucified on it for the entirety of my life: for, not only did these events sow a seed of distrust in society as an extension of the medical profession in me, but they, in turn, also made me aware that everything I would give to the world, considering that I was never to be here in the first place, will be a pure gift to humanity and the Cosmos. This sense of being pulled apart by the two diametrically opposite feelings, one of a totally selfless altruism and the other one of an anarchistic abandonment of the society and all its authoritative hierarchies, has predisposed me to exhibit this very same clash between love and fear as that which had torn my Mom apart. Moreover, as the one who felt he could travel to the prenatal states of mind in the moments of deepest meditation, I have always felt as if the astrological sign of Virgo ingrained in me some starry wonder and grace, whereas the bright airs of love and dark winds of fear were instilled in me as the result of the events surrounding my birth. However, as I will explain soon in more detail, the battle between love and fear is intrinsic to humanity and quite possibly to every conceivable form of life.

The threads of fear and love thus became deeply woven into the fabric of my spirit and whatever the songs and records I would hear later in life and found truly impressive, beyond the point of an utmost thrill imaginable, from aforementioned Pet Sounds to Kate Bush's Hounds of Love to Sigur Ros' Takk to Cocteau Twins's Four-Calendar Cafe to Big Star's Third to Sonic Youth's Evol to Molly Nilsson's History to the enchanting aural atmosphere created by Angelo Badalamenti in his music for Twin Peaks, I would recognize in them this blend of opposites, fear and love mingling with each other, yielding sensations that would take me to the very beginning of it all, to the prenatal days when I swam in the motherly sea of tears, and enable me to touch the foundations of my origins, the first steps in which the entire road ahead is mystically reflected. After years of intimately leaning my ears and eyes onto the world of arts, I came up with the thesis that these dialectical confrontations of opposites, executed in a stunningly stylish and sensible manner, hide the key to extraordinary artistic creations. This happened some time after the days when I found myself singing the verses of a poem about fear written by my Mom when she was only 16 years old, named Wind, from the stage occupied by the post-rock band in which I played the lead guitar and whose sound I often described as a crossover between Sonic Youth and Dmitri Shostakovich, a blend that sends shivers of fear down the music lovers' spines. And yet, the notion of wind in this poem was meant to symbolize not only the feelings of fear, but also the vibe of love, for, as the shabby message written on the wall not far from the SF Nob Hill flat where I would be living years later said, 'Love is like the wind – you cannot see it, but you can feel it in the air'. And indeed, anytime the antennas of my ears sprang up in excitement, it would be because of the magical concoction of fear and love that I sensed floating in the air around me. Be that as it may, for many months in those prenatal days I kicked and, as my Mom's storytelling went, all she heard in these kicks was my saying, 'Mom, I want to be born, I want to live, do not give up on me'. And then, it was during a night at the ballet when this mysterious dubbing in her tummy was louder than the sound of the orchestra that she made the decision. It was then that she said: 'I will bear a child. Even if he be impaired, I will take care of him for as long as I live. His name will be Wolf'. In Serbia and Montenegro, it is customary to give a child name Vuk - literally meaning 'Wolf' - whenever the parents are not convinced in its normal and healthy development. To divert her mind from the worrying thoughts and the terrible dilemma she had to be concerned with, my Mom, who, according to her memory, at those days had but a single dress, which she washed every evening and dried overnight, spent days weaving. A big tapestry resulted from her devotional work, depicting a big, big Sun, and quite coincidentally, I was born on the stroke of noon on a late summer day. To be born at high noon, like another poet, Johann Wolfgang von Goethe³⁸⁶, is to be 'granted the ability to grasp the mystery of the eternal recurrence of all things'³⁸⁷, if we were to trust Nietzsche and, verily, all my life this

symbolism has been with me to whisper to my soul how great and monumental things I was brought to the Earth to carry out. This inner voice has instilled in me a sense of immense responsibility for I would do in life, which acted as a tremendous burden, but also a drive to absorb an old knowledge and create a new one unstoppably, like a steaming train. As for the other tapestry that emerged from my Mom's hands while she carried me in her belly, it had a colorful, calico bird woven in it, symbolizing the moment of awakening, the meaning of which has ever since stood as one of the most important ideals in my thinking.

Later I came across the beautiful scene of awakening from Vittorio de Sica's movie *Umberto D.* With its showing a graceful girl waking up in a poor house, amidst grimy walls, though purely and gently, like a silky white lotus flower arising from the muddy waters, it reflected the concoction of angelic cleanness and sludge that I lived through in our family house in Belgrade. The image of a girl lightly touching the window as she looks up in a devotional awe, as if seeing an extraterrestrial spaceship flying above her, has ever since stood to me as a symbol of wonder which is the first step in awakening our spirits and bringing them closer to the windows of life, to the boundaries of our self in the world, from where we could make a step out, enlarge the scope of who we are and embrace the cosmos in all of its greatness. Now, as the girl gently opens the window to greet the day, the outside camera zooms into her, representing Nature zooming into us to an equal extent as we look into Her with graceful curiosity. This is diametrically opposite from the movement of the eye of the camera away from Bertolucci's conformist as he strolled down the hallway in one of the scenes in Professor Quadri's Parisian hideout, as if to suggest that Nature will equally not hesitate to move away from spirits who turn away from her godliness, who stop talking to her and who assume devilish traits by beginning to serve the venal and venomous kingdom of man instead. Da Sica's beautiful morning scene and, to some extent, its Bertolucci's antipode can be seen as analogies of the co-creational thesis that started sprouting in me much later, during the days spent in solitude in Ljubljana, while meditating on tops of the Alpine mountain ranges from the window of my 11th floor apartment. My Mom's calendar, always displaying the first month of a year and a photograph of a road running through an evergreen forest, hung on the wall with the message 'Quality is the Way', silently inspiring me and acting as a metaphoric reflection of the subject of my philosophizing - i.e., being one of those signs on our ways that winks at us and quietly whispers how all is good and we are on the right way - during those days. As I write this, this saying, *Kvalitet je put*, that is, 'Quality is the Way', irresistibly reconnects me with Lao-Tzu's idea that 'a Way that can be marked/named is not the Eternal Way: Tao' with which the Chinese sage opened Tao-Te-Ching and my concordant realization how an enormous disfavor is done to quality whenever quality is defined. If you wonder why, it is because one such definition automatically establishes the standards and with them the mediocrity of conforming to them rather than exploring new avenues of expression and thereby evolving the field and its forms to whole new universes. But then, in those Alpine days spent in the Slovenian capital, this saying imprinted on the calendar my Mom had designed for her company inspired me to propose the thesis that 'every experiential quality is a way', that is, that every product of our perception is a touch between human mind and Nature. This axiom ended up marking the first out of thirty principles of the book named 'The Principles of a Holistic Science of the Future' that was later to be published in my native language. The prime pieces of my philosophical insights were thus born, on a table from which a cactus with yellow flowers and I enjoyed the view of Julian Alps from a window overlooking whitish willow trees and thirteen gorgeous cypresses murmuring on the ground, in a coral-colored high-rise on Cypress Road, surrounded by three identical khaki-colored ones, in a city that has had Love in its name and that was once surrounded by a barbed wire fence and nowadays at its place has a 33-kilometer long walkway known as simply 'the way', that is, *pot*, which is, amazingly, one of the rare words in any Slavic languages that is both of a masculine

and a feminine gender, but not of a neuter one, also symbolically pointing at the concept of simultaneous connectedness and separateness that each way stands for and around which my Philosophy of the Way had been built. Sometimes we recognize an immense importance in natural details, human messages or pieces of art, without immediately relating them to our lives. Years later, their meaning becomes obvious to us, and then we may know that we have followed the right way. For, human life is permeated with secret messages that help us fulfill our divine mission on Earth. While walking on this sacred road, we may know that, as the co-creational thesis and the Way of Love suggest, we ought to be focused on our own enlightenment as much as guiding our ways so that they lead to enlightenment of the whole wide world. To attain a true mastery of the Way of Love is to realize that these two ways not only lead in the same direction, but that they are one and the same. There is no enlightening of ourselves without colossally desiring to enlighten others, and *vice versa*.

Jovan Dučić's poetry with its blend of dusky melancholy and aristocratic grace has, furthermore, presented one of the deepest influences for my creativity. I have always sensed a romantic combination of clarity and dustiness, so typical of natural and social Belgrade sceneries within which I have grown, fascinatingly reflected in Dučić's poems. (One of them, named My Poetry, beginning with a 'Be too beautiful to be liked by all', although untranslatable in its charm and beauty to English, neatly describes this.) And along these interwoven threads of genuine beauty and shadowy dustiness, the grace and purity of Venus de Milo have unstoppably found its way to the surface, comparable to the way lotus plants succeed in displaying their silky white flowers above the muddy waters in which they reside. But, just as the Christ urged his disciples to be 'wise as serpents, and harmless as doves' (Matthew 10:16), so should we be sure that one such graceful dreaminess that keeps itself peacefully confined within a meditative bubble of a kind presents only one side of the coin of a truly fulfilled personality. A shining star is indeed inwardly oriented, undergoing a constant pull of gravity towards its center where light elements are fused together. However, the immense amounts of energy produced thereby have to be dissipated in order for the star to avoid a gravitational collapse and sustain its shine.

Here it may be a time to briefly revisit the somewhat maudlin title given to this book, Sketches of Stars & Pebbles of Wisdom, invoking the simultaneity of reaching out to stars, the symbols of the highest, the most sublime and mysterious, but also the least reachable in our experience, and reaching out to the lowest, the most ordinary and commonplace things lying all around us, holding no value whatsoever in human eyes, notwithstanding the innumerability of the candidates for the last word in it, from 'words' to 'woe' to 'wail' to 'ware' to 'whim' to 'wont' to 'whit' to 'writ'. And as the guideline of the acronym concealed in the title for this book, SOS & POW (not meaning Save Our Souls, the Prisoners Of War, as one may think), could indicate, if our mortal beings are to become shiny like the stars, the meek and prayerful withdrawnness that opens its heart to the heavens above ought to be balanced with a 'pow pow' acting that sends out blasts of creative energy that dazzle earthlings' eyes. 'Pow wow' is a Native American term that describes a congregation that celebrates arts, culture and music³⁸⁸, and one such phenomenal 'pow', a punch in the face that makes one see stars and utter one loud 'wow' from the top of one's lungs, is what onomatopoeically depicts the ground of aspirations from which this work has stemmed. After all, the ultimate wisdom in this life lies not in dejected dreaming, but in enlightening acting, in relentlessly shedding signs that inspire the seeds of divinity sown in each creature of the world to sprout, fructify, explode and become implanted as forever burning stars in the eyes of the Universe. Dancingly shedding stardust of divine joy all around us, while still having our attention incessantly anchored to the depths of the ocean of our heart and mind is actually making us incarnate the balanced mindset which I have named the Way of Love.

Henceforth, the vital personality aspect in this devotion of mine to be the messenger of beauty to the world, complementary to the pensive quietude of my being, is the punch-in-the-face way of

delivering these messages. What Nietzsche said of himself in his autobiography, 'I am not a man, I am dynamite', could not be far from the truth in my case either. Aside from my musical compositions and recordings, I have intended to make my philosophical writings too be a firework of exciting ideas and emotions. It is my opinion that the works of art are to be conceived and created with a great underlying desire to move not only people, but the whole mountains. People are nowadays often sleepy and inert in their habitual streams of existence. Yet, there is nothing more wonderful than awakening a genuine wonder in the eyes of someone who moments ago seemed hopeless, inert and lost. It is like giving out a divine compass and placing it at the center of someone else's being. Listening to Radiohead's record Kid A at the turn of the 21st Century, I felt as if I deeply understood the message. As if they had whispered to me, 'kid hey, awake!' Those were unforgettable moments, including particularly the last song of the record that comes after the moments of emotional struggle during a walk in the darkness along the boundary of mental disorder and new horizons, and then as if recorded on a home cassette player, with the hum and dust lurking in the background, releases an all-awakening beauty. The song strikes with wonderful emotions, and implicitly shows how rich studios and expensive equipment are not required to make beautiful pieces of art. The popular media waited for their new record for three years, and the disappointment was huge, but to me, the record could not have been a better way of showing that impoverished people with little funds to start from need not feel lost. They still have a heart to give and the mission from God to follow. And the secret of moving deeply someone through your creativity lies not in money, but in the Sun of great aspirations that burns within the artist's heart. That is essentially the ultimate message of rock 'n' roll music: anyone can play guitar and through music magnificently draw in front of you the enchanting beauties of human heart and life.

Somewhere deep in the tradition of rock 'n' roll a beautiful story about its origins exists. Although some may agree with John Lennon who, when asked about the ultimate message of rock 'n' roll, replied: 'Be, here, now', I have always seen that as a mere recycling of Buddhism. Nonetheless, the story I want to mention is about a cowboy who fell through a hole in the ground right into a nest of snakes. Unable to get out, he and a big snake came face to face. The only way to survive at that point was to tell her a story. And that story became the music of rock 'n' roll. So you may ask why this is now related to the balance of conformism and uniqueness that we began to discuss in this section. Well, if the cowboy tried not to speak the language of snakes, he would not have been understood and would have been bitten and slain. But if he somehow succeeded in articulating the serpent's language, but disregarded the need to tell her the message of survival and goodness that only his own heart can radiate with, and calm the snake down thereby, he would have also gotten himself into a hopeless situation. So, the music of rock 'n' roll filled with rattling beats, clapping drums and captivating rhythms, and yet pervaded with the radiance of hope, joy and love came to exist.

On one hand, this story offers a far more instructive approach to dealing with problematic situations in life than a simple 'seek and destroy' one is. By its means we could turn even the most malicious adversaries, be they insurgent spirits with spears directed at us or cancer or any other real or figurative tigers craving to maul us with their bloodthirsty clutches, into faithful guardians of our wellbeing. On the other, more benevolent note, this story reminds us how in conversation with others we should never forget the importance of speaking their own languages and only then infiltrating our expressions with original and uniquely meaningful ideas. For, there is an incessant creative challenge to balance adaptation and novelty within each and every evolutionary step we make.

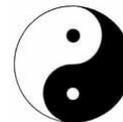
Simply saying, the only way to prophetically peer behind the horizons of our immediate experiences into future is to simultaneously look back. And not only that, but all our actions should be guided by the principle that evolution is possible only through sustaining some features of life, whereas the latter could be achieved only through an incessant evolution.

This all reminds me of the process of choosing the right gifts for persons dear to us. I love to say that every gift has to be picked with eyes turned both backward and forward. Namely, if we wish our gifts to produce an enlightening experience in the endowed beings, just as in the case of the snake, we need to make the gifts fit their own understanding of the world. We cannot give a math textbook to a toddler, but we can provide him with simple puzzles that would develop his brain and make it attain small steps towards abilities to grasp the whole textbooks one day. But if our intention is to satisfy the loved ones 100 %, we would provide them with gifts that are purely ‘sustainable’ and not ‘evolutionary’ at all. These could be indeed fulfilling, but only in the short term. Instead, there needs to be an invitation to learn and evolve in our presents in order for them to satisfy the criterion of perfection. But then, there will always be a source of mystery concealed therein, which, by the way, endows them with the epithet of magical. And that is something that each gift in the world - just like the greatest one: the gift of life – should radiate with.

Yin-Yang character of the interplay between diversifications and unisons

‘Things which are put together are both whole and not whole, brought together and taken apart, in harmony and out of harmony; one thing arises from all things, and all things arise from one thing. All things come into being through opposition, and are in flux like a river’

Heraclitus



Tai-Chi-Tu diagram

The illustrious Tai-Chi-Tu diagram depicts how crucial polarities in the dialectic evolution of the qualities of life accentuate each other in a similar fashion as the progress of a day results in a sunset and the rise of a starry night, and *vice versa*. Unity/diversity presents one of the most fascinating systemic polarities that reflect such an archetypical order. For, not only each one of these poles complements the other, but journeying along a route set forth by one of them naturally brings us over to the domain populated by its antipode. For example, if we were being shown (a) an image of an almost lifeless planet Earth during one of the ice ages, when every molecule of water shared the fate of all the others, being captured within the monotonous shroud of ice that enwrapped most of the planet, and (b) an image of today’s Earth, with the swimmers in the azure seas and with splashes of rivers and waterfalls and with water in them flowing in millions of different directions, we would be absolutely certain that diversity is the precondition for the thriving of life. This insight would almost instantly make us susceptible to rejoice in different worldviews, regardless of the extent to which they would be in opposition with the ones we have held. In other words, this would endow us with a sense of unity of all being. If in this sudden liking of it all, we become so fond of everyone’s views that we turn into a passive conformist that ignores the fire of uniqueness that glows within oneself, signs would begin to be shed before our feet by the guardians of the Universe, showing us the ways on how to be different from all things and voices around us and retrieve our own specialness, specialness which, as we would find out sooner or later, can be properly sustained only insofar as we nourish a sense of sameness of all life somewhere deep inside of ourselves. Somewhere along this cyclical route of abstraction, we could have encountered

an ecologist who would top these insights of ours by remarking that diversity, the stuff that sustains the integrity of the biosphere, derives from adaptability to different environments³⁸⁹, the ability behind which stands the desire to be the same as what surrounds one, pointing at unity as the grounds of diversity and diversity the grounds of unity of the web of life from yet another angle. As we spin in this circle that runs from unity to diversity and back to unity and so forth, resembling continents merging into one and then bouncing off one another every 500 million years or so, souls separating themselves from the all-pervading sea of spirit and then coalescing with it before being plucked again to take a new form of life, or stars and galaxies reaching a state of singularity of a Big Crunch before a Big Bang sets them apart again in the unremitting breathing of the visible Universe, which, again, may be but a droplet in an infinite sea of being, as the new theories of the Cosmos suggest³⁹⁰, we come to realization that every single process and system in life has to balance the two, lest its prosperity be endangered. For example, whereas science in accordance with its original meaning ought to present the art of differentiation and diversification of knowledge, spirituality is meant to present a complementary form that invites us to see wholeness in everything and a ubiquitous meaning in ostensibly minor and negligible details of our experiential worlds. At their base, the ideals of emotional intelligence and of balanced analyticity and spirituality are thus nothing but the operations of unification and diversification performed in harmonious unison.

Most people, for example, nowadays evidence a rise in the amount of information in their interaction with the environment, which reflects a general diversification in the emanation of life forms and human knowledge. However, this progress could not exist without its complementary aspect, which takes the form of a sense of unity that ties all these diversified entities into a coherent whole and that must follow in step all this incredible diversification or else a great imbalance may be struck. Not only is the world today a much smaller place than before in a sense that with every new day information travels quicker and more efficiently, but the rise in the prominence of interdisciplinary knowledge reflects the same. Many religious people nowadays agree that appreciating the multitude of religions is like having numerous trails that all lead to the same mountain peak. Besides, atheism and religiousness have never been closer to each other in the history of humanity than now, and intellectual, metaphoric approaches to the understanding of religious scriptures and thought may certainly be regarded as responsible for that. For example, the atheistic claims that there is no grand purpose in life may teleport us directly into the eye of the moment, wherein we'd search for momentary beauties that transcend any teleological views of reality by a moonlight mile, comprising the first step towards bringing the carefully collected and crafted treasures of our religious spiritedness, of our devotedly walking hand-in-hand with the goddess that Nature is, from the chambers and atria of our heart and into the outer world, for all to be washed and purified in their glorious glow. This is to say that even the most notorious antipodes of qualities we admire can present a door through which we should enter if we wish to breed these very same qualities in this inherently paradoxical reality that consistently disobeys the principles of linear logic, as if wishing to tell us that eruptions of illogical love will triumph over the derivations of dry intellect on any given day of the year.

The beauty of life lies in the dynamically evolving flow of alternate awakening of unity in diversity and of diversity from unity. Exceedingly fostering either of the two would undermine the harmony of the balance between them. Hence, monotony results from a missing contrast or from a lack of variety, whereas chaos springs from no similarity or unity³⁹¹. It is, however, usually considered that unifying insights are the only that deserve the epithet of aesthetic, and that diversifications imply the exhibitions of less sublime forms of creativity. Furthermore, it is argued that it seems to be a personal preference formed as early as in childhood days that predisposes one to be more inclined to one of the two inherent aspects of the evolution of being and knowledge³⁹². However, whether unisons or

diversifications present the right choice of the moment depends on what is lacking in the actual system in question. Thus, sagacious individuals can indeed on certain occasions observe unbalancing tendencies in the current streams of knowledge of behavior and from there on direct their creative efforts towards one way or the other, knowing that a perfectly balanced creativity stems from the complementary mastery of diversifying and uniting, that is, of observing and fostering differences or similarities depending on the needs of the temporarily imbalanced systems that they interact with.

If one is immersed in an environment in which unities are fostered, a natural need to spur an increase in the complementary differentiations becomes apparent, and *vice versa*, as the histories of science and religion might neatly demonstrate. Namely, in the midst of the Dark Ages, Enlightenment and the initiations of the empirical approaches to scientific investigation were born, whereas nowadays in the era of overly instigated rationalizations at the cost of neglecting the importance of human imagination, ethics, aesthetics and intuition, the voices that propagate the latter are increasingly finding their place in the communication media. The worldviews in which it is implicitly acknowledged that ‘all is connected’ still present exotic perspectives that hardly find a way to the most prominent scientific and popular reports, but it is only a matter of time when these holistic positions of reasoning would become accepted as a general basis of knowledge. Then, as it is a usual fate on the path of the progress of human reason, looking back to all the contemporary battles for adopting these holistic worldviews may not seem that important and bigger-than-life at all to some future generations, just like the battles for adopting the empirical approach in scientific methodology may not appear that prospective from today’s perspective once we have witnessed the historical consequences of some of its demerits. The progressive minds of the future would be, in fact, turned to some more complex unbalanced areas in the domain of human reason. The only question is whether these oscillations are necessarily required for the development of both analytic, rationalizing skills and the complementary holistic aspects of a fulfilled personality or in due time they will settle into a state of perfect balance filled with mutual acknowledgments instead of the current enmities. In the end, it may all fall down to the balance between reductionism and holism, differentiations and integrations, diversifications and unifications.

Therefore, by being involved in diversity-fostering development and maintaining the originality of expressions and impressions, a need to be the same with and identical to others in certain aspects of the interaction of ourselves with the environment becomes apparent, and *vice versa*, so that the fluctuation around the balance between differentiation and integration remains always preserved. And such a seemingly paradoxical nature of the interplay between these two systemic aspects of existence is comprehensible only from the point of view of an endless dialectical evolution of spirit, information and life.

In that sense, the modern discussions in which participants appear as desiring to almost strangle others in order to inculcate in them their own opinions and make them think the same way as they do should be seen as violating this fundamental principle of fostering diversities and constructive differences. Instead, we should probably be engaged in fertile dialectic confrontations of opinions with respecting each one’s attitude and integrity, rejoicing over differences when things begin to seem overly monotonous in their sameness and promoting the spirit of unison when things begin to scatter like broken glass as the result of diversions of beliefs, ideas and worldviews around us. By furthering the encounters of theses and antitheses in the air in front of us, we could make them produce some majestic syntheses for the benefit and enjoyment of all. Instead of aggressively tending to align the ideals and opinions of others in relation to our own, it is the non-egotistic and unselfish mutual edification of the towers of ideas that ought to present our ideal in this case.

Nevertheless, complementary behavior is certainly the way of survival in social and ecological niches alike. The choice of complementary skills and cognitive attitudes is the key to increasing

sustainability of such systems. Henceforth, I have noticed that when a person next to me is intimidated by an ongoing communication, slowly cocooning into a shell of passivity, it spontaneously invites me to be vigorous and active, and *vice versa*. In such a way, multifaceted diamonds reflecting the glister of the brilliant Universe as a whole are built from social congregations, as opposed to dull assemblages of sheepish, submissive spirits drowsed by the drive to conform and nod their heads everywhere they go. This is why we should not look after becoming loyal copycats, but dance in different and original ways, and thus produce fertile dialectical grounds for the growth in mutual acceptance and understanding. For, our lives, like rivers that grow in size on their way to the sea, in their courses meet other cognitive streams, observe in them their complementarities, eventually accept them as essential for the great story of enfolding of the multifaceted Universal mind, and become one with them. We may realize that, as the story of our life proceeds, Nature sets in front of us people whose attitudes and worldviews perfectly complement ours. That seems to be one of the usual ways for Nature to correct the unbalanced attitudes and worldviews of ours at the given times. And by learning how to see complementarities between ourselves and others instead of being guided by pure obnoxiousness and repugnancy, and accept each person in our lives as someone that we can learn a lot from, we have the chance to teach ourselves the essence of sacred living, and become truly great and inspiring persons.

Therefore, for a multitude of beings that are happily engaged in sustaining friendly relationships and cheerful but smattering social communication, there needs to be a small number of souls that prefer enjoying the moments of desolate reflections. If one looked at the human race from some distant global perspective, one would observe the direct link between an instigation of the diversity of complementary interests, activities and professions within a society and the level of its true prosperity. For example, in a really lowly developed society, we could easily realize that human professions almost entirely consist of agriculture and housekeeping duties. With the developmental refinement of social organizations and their underlying relationships, human professions become more diverse and finely differentiated. The need for philosophers, scientific workers and other conceptualists, various social analysts, ethical intermediaries, artists and entertainers shows up as well. Societies with a low rate of development are, in contrast, typically characterized by almost molded modes of behavior and the underlying interests in life. Nevertheless, the point is that each bright and peaceful society has to have at least one or a few ‘catchers in the rye’ that carefully follow people’s moves and, by not being included in their games, devotedly stand aside and guard them to make sure they do not fall from the rye-fielded cliffs of life. These solitary beings also quite often turn out to be masterful teachers for the peoples of the world.

They are somewhat similar to musicians in a band who need to remain firmly focused on their performance in order to bear sounds that would cheer up the audience and arouse them to dance, or to a prophetic writer who is overly preoccupied with writing down guiding lines for enlightened living to find time to follow them and live enlighteningly himself. As it was obvious to Romeo Montague, while bringing inspiring harmonies to the dancing world one cannot afford dancing with others, the reason for which Shakespeare’s hero demanded a torch, not the dancing shoes: ‘Give me the torch: I am not for this ambling; Being but heavy, I will bear the light’, so said he. The long discussion that followed, in which Mercutio and Benvolio tried to convince Romeo to get up and dance, Romeo ended by reiterating his idea that to shine one must dance not and be still: ‘A torch for me: let wantons light of heart tickle the senseless rushes with their heels, for I am proverb’d with a grandsire phrase; I’ll be a candle-holder, and look on. The game was ne’er so fair, and I am done’³⁹³. Like stars that shine to the world and yet live in the lonest darkness, the most advanced and fruitful minds of the human civilization have been typified by such seemingly distant and yet lovingly empathic nature that all true ‘catchers in the rye’ have personified. In the end, it may be them who will get most use of the thermodynamic nature of progress and evolution, according to which the perfect mental, emotional and physical transparency propounded

by the tenets of the Freudian psychotherapy does not present the way to ascend to higher cognitive and spiritual planes; rather, a patient and perseverant absorption of these oftentimes stressful and overwhelming emotions marks the steps towards higher levels of organizational complexity of both mind and Nature³⁹⁴. Truly progressive minds do not let their inner perplexities, problems and questions be evaporated and given up on; rather, they live on solving problems. ‘The point is to live everything. Live the questions now. Perhaps you will then gradually, without noticing it, live along some distant day into the answer’, as Rainer Maria Rilke opined. And all the precious insights that these clashes between wondering perplexities and a crushing will to resolve them provide bricks that edify the spiritual and intellectual richness of our being.

It is this tolerance for ambiguities that has been many times evidenced as an essential feature of creative thinking. Or, as F. Scott Fitzgerald pointed out once, ‘The test of a first-rate intelligence is the ability to hold two opposed ideas in the mind at the same time, and still retain the ability to function’³⁹⁵. In contrast, being intolerant to paradoxes and perplexities that we inevitably face on our road to spiritual development inevitably leads to mechanistic thinking and behavior, which can in its extremes turn into tyrannical relationships with others.

But to live with these crucifying dilemmas swirling within our soul is not an easy task. A natural tendency of our beings would be either to find a weak solution thereto or sweep them under the carpet - out of mind and out of sight. But then, the opportunities for the ascension of our mind and spirit on the ladders of these perplexities would vanish. It is truly the choice of the bravest and most heroic ones to embark on the utmost adventure of the human mind and live within themselves these crucifying but enlightening dilemmas that mark the paths of our quest for answers to the ultimate questions of meaning of being and knowledge.

The merits of one's devotion to education and of keeping an eye on the Way of the Whole as much as on the Way of the Small

‘But I put no value on my life, if only at the end of it I may see the work complete which was given to me by the Lord Jesus, to be a witness of the good news of the grace of God’

Acts 20:24

‘And if any man hear my words, and believe not, I judge him not: for I came not to judge the world, but to save the world’

John 12:47

‘What is up is also down’, says the all-encompassing, cosmic principle that Hermes Trismegistus famously inscribed on an emerald tablet approximately six millennia ago, marking one of the rises in systemic knowledge and philosophies of the world. Correspondingly, whenever one soars by means of one’s marvelous accomplishments, one may notice that one simultaneously becomes more tightly related to the roots of certain existential aspects. Ascending and descending, flying like a carefree bird and becoming anchored like a firmly rooted tree, thus, appear to be always perfectly balanced. For example, the more one observes the world and its beings from the perspective of the sea, positioned below everyone else so that all the rivers can flow thereto, the more of the treasures of the soul would one be able to collect and someday readily strew others with. That is, the more we strive to be humble and kind in life, the more we become truly gracious and ascended in spirit.

The world is conquered by love, grace and humbleness, and not by the desires to raise our self above everyone else and turn others into mere toys of our ego. Embrace the earth and you will find your chest filled with the heavenliest air. Or else, rise into the sublime skies of divine feeling and thought and touch with the nearby souls will become as natural and necessary as morning dew on the blades of grass in springtime. Descending and ascending thus seem to be always well balanced. The more one digs for the invisible treasures among the foundations, be they of our mind and heart or of the world as a whole, the more one would be able to soar in spirit and, thus, be closer to, not farther from, the worldly souls.

Hence, dedication to edifying others on educational, parental or any other social platforms stands for a most beautiful task that humans can assign to themselves. This is particularly so because one then holds an authoritative stance, stands above everyone else, on the summits of it all, but remains oriented toward the very bottom of everything, building the deepest foundations of human knowledge, ethics and creativity.

An approach like this lies at the heart of the ecological 'grass-root' ideals that oppose the cold, routine and impersonal handing of charities and aids to the tops of helplessly corrupt institutions of problematic social systems, and foster the approach of a direct interaction with 'small' people, things, events and ideas. Even though our efforts may then seem unavailing and hopeless, they would gradually build up to yield true and visible effects. The latter, however, often fall behind the horizons of our existence, predestined to rise up from dormancy only on some distant future day.

For, such is the nature of all valuable deeds in life. Instead of immediate gratifications, they seem to always confront us with the temptation to doubt their worthiness, yielding a powerful training for our faith along the way. Like a tree, planted today and yielding its first fruits years or decades later, the results of the most valuable feats are rarely seen right away and sometimes even hardly foreseen in proximate spans of time. Hence, the morale of the story about a slow and steady turtle outrunning the steamy rabbit in the long run, showing us how what develops slowly has a chance to become something truly great, while what grows fast, as a rule, withers fast too.

'Think globally, act locally' consequently sets itself as one of the most popular slogans of the modern era. It instigates us to faithfully draw the meanings of our actions in an as large gestalt as possible, and yet to see the endless importance of small deeds in this holistic story of life in which each grain of sand, pinecone, seashore pebble or a tiny, quiet creature have crucial and unique roles for the whole developing humanity. This mindset oriented on the ungraspable greatness latent in the littlest littleness finds reflection in the boy caught throwing one starfish after the other back into the sea from a shoreline during low tide. When told by a random bystander that he would not make a difference in the ecosystem composed of thousands, if not millions of starfish stranded in the sand every day, he turned around and said, 'For this starfish, it did make a difference'. An enlightened awareness that one saves the world by saving each and every one of the little creatures or things in one's immediate proximity is the starting point on the line of one's evolution into a true seer on this planet. Of course, to avoid the insensitivity to distant causes and sufferings that hit the other sides of the globe, legendarily epitomized in the viewpoints drawn by Adam Smith in the course of his setting the grounds of cutthroat capitalism as allegedly the only way to foster continual progress of the human race³⁹⁶ and reiterated recently in the words of the founder of Facebook, Mark Zuckerberg, 'A squirrel dying in front of your house may be more relevant to your interest right now than people drying in Africa'³⁹⁷, we need to ceaselessly hold the shiny globe of the world as One in our hands, despite our dedication to the ideal that subtly spells smallness = beautifulness with each and every action of ours.

In other words, we should set our mind on a view of the forest as a whole and still unceasingly engage in discerning the fine features of individual trees. It is an indisputable statement of fact that the evolution of our spiritual selves is conditioned by the development of a cosmic state of mind praised by

the Oriental theologians the world over, which sees all as a part of the great One and does not pay any attention to petty everyday details, but bears resemblance to a tiny droplet of water merged with the ocean of divine being. However, it equally goes without saying that a mindset so preoccupied by the state of the whole that it has become wholly ignorant of the little fish swimming in it and tiny precious rocks resting at its dark bottoms, hiding the metaphoric keys and signals that could unlock the greatest secrets of the Universe, cannot be endowed with the epithet of 'perfect' by any means. Mainly, it is the consciousness in which links between the infinitesimally small and the infinitely big are constantly being drawn, so as to lift the things and creatures covered by the dust of neglect straight to stars and bring down to Earth the emanations of the most enchanting celestial being conceivable, that could deserve the attribute of truly saintly. To pay attention to the small despite our renunciation of the piddling worldliness and all the spleen and squabble that preoccupation with it entails is thus a must for all the colossally magnanimous mindsets, lest they, in the midst of meditatively 'being here and now', reach a stage where they begin to wonder the same question that one seagull directed to another in the fairytale about Jonathan Livingston Seagull: 'Overcome space, and all we have left is Here. Overcome time, and all we have left is Now. And in the middle of Here and Now, don't you think that we might see each other once or twice?'³⁹⁸ And if we ever come across an angel who loves it all, but lives in the present so steadily that she 'calls to ask how you're doing and before you can reply, they've already forgotten who you are'³⁹⁹, how much love does she really have to bestow? For, when we get attracted to each new detail we observe in the world and leave things that we were fond of behind so casually, just as well as when all we see is a forest and we are blind to every tree that we pass by, we cannot be said to be living a most fulfilled life. This may also explain why in the city of Alphaville, that Jean-Luc Godard's dystopian vision of the future wherein humans have become wholly machinelike, desensitized and stripped from their spiritual essence, not only were people incapable of grasping the whole, but they were also forced to live neither in the past nor in the future, but in the present strictly.

At this point, we need not be reminded that innumerable archeological sites, including the Nazca Lines, were first discovered from aerial photographs, even though archeologists surveyed the ground in search of exciting findings for decades, whereas a flame of wondrous humaneness has been sparked for good in our collective consciousness when the image of the Earth as a glistening marine emerald orbiting the Sun was transmitted to us from outer space for the first time. Also, if we began to wonder only about the meaning of individual steps made by an artist such as Simon Beck⁴⁰⁰, it may appear to us that he is but aimlessly wandering through the snow, 'round and around with the absentminded focus of a psychopath, but if we took a ride on one of the cableway cars above him, we would swiftly realize that we he creates is a stunning piece of art. Likewise, a casual look from the distance at the eyes of Roy Lichtenstein's *Girl with Hair Ribbon* invokes the impression of cuteness and seduction, but a closer look reveals that the eyes appear to be looking like some ancient hieroglyphs, resembling claws of a monster on the right and a menacing eagle on the left. Thus, moving back and forth between the consciousness of the whole and the focus on the most minute details of reality, all until we realize that the two quite nicely blend into each other and that journeying long enough in one direction will draw a full circle and bring us over to where we started from, being but a fancy invitation to conclude that setting one eye of ours to see all as a grand, holistic unity wherein 'when we try to pick out anything by itself, we find that it is bound fast by a thousand invisible cords that cannot be broken, to everything in the Universe'⁴⁰¹, as John Muir noticed, and setting the other eye to see a whole wide world in the littlest glints of the littlest stars on the sky of our mind, is the only way to rear a perfect inner vision. As it usually happens, the two eyes need to complement, not duplicate each other in building this towering mental sight that could be made complete and truly fulfilling only when the mindsets of One and of ·, that is, holism and reductionism, as it were, are placed in the very heart of one another.

When we happily play on a sandy beach, notice how the sand sieving through our hands is composed of numerous individual grains. Still, what makes the sand sandy is not one or two coalesced grains of sand, but a myriad of them together. To explain the forces that sustain the castles made of sand, the footprints left on it or the high-pitched sounds left in the wake of our walking on it, we would need to refer to both the intrinsic properties of each one of these crystalline conglomerates and their physical interactions mediated by the seawater and its ionic ingredients. In other words, our attention should be focused on these small grains as much as to their collectives. Just like the semantic content of this sentence springs forth not only from the meanings ascribed to individual words comprising it - let alone lines and symbols intrinsic to them, which we have ceased to pay explicit attention to ever since we learned how to read - but also from the meaning stemming from the whole that they build, as well as from the impression that the words and their assemblages invoke in the mind of the reader through the endless chains of abstract associations, so are the qualities of every physical system determined by its components, by their internal ties as well as by its interaction as a whole with the environmental contexts in which it exists. Consequently, the two types of knowledge, local and holistic, usually complement one another, and our quests for solutions to perplexities of life always require a parallel application of some general principles of knowledge and recognition of fine features of the systems investigated. For example, when we drive or walk along a familiar path, we need not refer to the place of the path on the map of the whole region or cardinal directions in order to reach our destination. Instead, it is the knowledge of the local order of the system that would bring us to the satisfying solution. But once we find ourselves on an unfamiliar path, and start looking around without knowing where exactly the right direction for our further journey should be, we might start using a compass or a map and thus refer to our place in a broader context. Thus, in order to build a personality equipped with charming problem-solving abilities, we need to be holistic and reductionist at the same time. Thereby, we would be dedicated to the way of the whole, and yet fully devoted to each minute relationship with the fellow beings and inanimate objects of the world. This is one of the essential cognitive principles emanating from the concept of the Middle Way that we ought to aspire to attain in this life.

As a passionate chess player, I have always seen this game as a strong metaphor of the balance between holism and reductionism. Namely, a single game of chess can be roughly divided to its strategic and tactical aspects. Whereas the former refer to the general and long-term approach that a given side in the game has adopted, the latter is related to immediate and short-term maneuvers on the board. Whereas the former predominantly take place during the midgame and particularly in the transition from the opening to the midgame, the latter typically (unless we have heedless novices in mind) occur in the later parts of the midgame and mainly in the transition towards the endgame. Thus, whereas it makes sense to consult a chess book to find a specific move for an opening or an endgame, the most we are left with in the early midgame are strategic, general rules. Whereas the strategic views of the game span many moves ahead, the tactical elements cover only a couple of them. Hence, strategic perspectives in chess are reminiscent of the holistic views that keep their eyes on the forest, whereas the tactical viewpoints are oriented towards resolving fine and immediately perceptible characteristics of individual trees.

But one without the other could not exist. Limiting one's approach only to the possibility of attaining immediate gains without any long-term plan born in mind is as disastrous and hopeless as neglecting fine tactical maneuvers while keeping an eye on the approach taken on a wider plan. Just like in many other areas of experience, I have, however, always exhibited a natural shift towards the strategic, holistic approach. The majority of my lost games had the reason of blundering subtle tactical maneuvers while overly taking care about the general course that my chess army should adopt. Nonetheless, I have always regarded my approach as a more beautiful and aristocratic. Hence, due to my inclination to mastermind long-term plans, I have also always found most enjoyment in playing long,

long games. On the other hand, I disliked blitz games in which only skills in the tactical maneuverability get to be exhibited. Not to mention how pure reliance on tactical elements has always seemed slightly vulgar to me. Players who do not keep their eyes on the strategic way of the whole are usually those who simply wait for a minor mistake to be made by the opponent, and then tactically punish it. Hence, while vulgarity may arise from an overly reductionist approach to understanding chess and life alike, a certain blindness to the importance of the nearby details of the world can arise from an overly holistic attitude. Thus, whereas many people say 'show me what music you like and what aspirations in life you have, and I will tell you who you really are', I have maintained that seeing the way in which a man approaches a game of chess could tell me enormously much about his personality.

This balance between the chess strategy and tactics can be fairly well linked with the scientific approaches to explaining the physical reality. Namely, just like a prospect of finding a perfect solution to the game of chess exists as an ultimate, but hardly attainable ideal in the minds of some chess players, similar beliefs that humans will one day come up with the equations that perfectly consistently describe the natural reality and thus fulfill the ideals of Laplace and his demon still exist in minds of some scientists. However, the complexity of calculations required to predict the effects of each chess move (The number of possible combinations in a chess game is estimated at 10^{120} , whereas the number of atoms in the Cosmos according to the actual Big Bang model lies at around 10^{60}) or physical cause are beyond the grasp of the computational capabilities of humanity. Hence, pure tactics and elementary particle physics do not seem to be able to provide reliable answers on the effects of our actions. Rather, holistic views, in terms of chess strategy and philosophy and chemistry and qualitative sciences with all their intrinsic indeterminacies, are invited over to fill these gaps in our knowledge. The nature of human thought, after all, is such that discerning the features of reality down to its finest detail and yet keeping an eye on the way of the whole are both required to reach those sublime vistas of knowledge over which seagulls of sanguine and sagacious semantics fly. Both the resolution of the human probing of natural systems, enabling an ever more precise manipulation with the substrate of physical reality, and the richness of the context in which these activities are placed can be thus developed in parallel. Only with such progress on parallel planes can the conditions for the evolution and sustainability of the human race be preserved.

In the end, just like having a perfect move in your hands would yield the answer to the ultimate question of the game of chess (that is, if both Black and White played perfect moves, would the game end as a draw or as a win of the White?) and thus make any further playing nonsensical, the same can be said for the hypothetic possession of the equations of an ultimate Theory of Everything. If humans were able to predict all natural events and if everything could become known in advance, the meaning of life, crucially dependent on perpetual questioning, searching and evolving, would cease to exist. All the essential qualities of humanity would wither, and probably our whole civilization, altogether with the majority of the higher forms of the planetary life, would vanish. In the context of the game of chess where ignorance with regard to the best possible move we could make at essential crossroads of its opening and midgame is what keeps the evolution of our knowledge of the game going and sustains our joy in playing it, the Serbian chess writer, Dragoslav Andrić, noticed in the final sentence of his book *Chess: The Game of Millions* that 'chess exists only due to mistakes'⁴⁰². The same can, of course, be said for the evolution of higher forms of life and our knowledge and beauty of expressions; namely, they all depend on ignorance, entropy and stochastic chaos in our physical and mental worlds alike. If we were to pick the most important implicit message of science and religion, it would certainly be the importance of uncertainties for the evolution of life and human spirit. Only insofar as they pervade every corner of the space of our minds can our knowledge and faith sustain and evolve. It is the heart of eternal seekers playing at the boundary between the firm coasts of knowledge and the sea of unknown

and unpredictable opportunities that is responsible for spinning the wheels of evolution of knowledge and life.

Lao-Tzu opened his Tao-Te-Ching with a song that ends with the following verses: 'We often liberate ourselves from passions to see the Secret of Life. We often observe life with passion to see its forms. These two forms of Life are One; in their external appearance they become different by name. Both can be named as Cosmic Secret: and in a yet deeper Secret from that Secret the Doors to many a Mystery lie' (Tao-Te-Ching 1). Aside from their pointing to journeys towards ever deeper and profounder foundations as the way of understanding, clarifying and brightening the emanations of our knowledge, these verses also signify a need to constantly switch our cognitive attitudes from the ones immersed in the impalpable holistic properties of the beings and objects of the world to the ones of carefully and patiently tracing the finest boundaries in the world of our perception. The first attitude corresponds to the one of an inner, meditative virtue, untainted by any passions and filled with a perfect, untipped spiritual equilibrium. But the second one is driven by passions and will, inevitably required to knowing how it feels to be human, which is what essentially presents our mission here, on Earth. Arthur Schopenhauer and many Buddhist thinkers were promoting a complete transition from the awareness of our being residing in the world permeated with innumerable desires and wills to the one of Nirvana, that is, of non-adherence and renunciation of our aspirations and passions. But Lao-Tzu knew the aforementioned ultimate systemic balancing principle that shows us how the acrobat on a wire needs to constantly fall to alternate sides in order to maintain his balance and keep walking forward. The evolution of life is correspondingly always the result of balancing balances and imbalances, and we need to move back and forth in our relationship with the beings and objects of the world, falling in loving unities and separating to meet the essence of our own being, in order to produce the majestic music of life, continuously rolling towards ever more beautiful and perfectly imperfect states.

The abovementioned principle of Hermes Trismegistus and the opening verses of Tao-Te-Ching are thus closely related. In accordance with them, we should be the sea and the Sun at the same time: humbly positioned below everyone else, absorbing all the surrounding streams within ourselves, and looking at the world from the perspective which is far above everyone else, anchored to cosmic distances, unattached to and untouched by the streams of the world and yet selflessly giving the light of spirit to feed and sustain the beings of the world. There are things that could be seen and comprehended only from such a distant observation of the world. For example, that is when we realize that the world at any particular moment is only one out of infinite possible ways to express the divine grace of existence, and as a whole it is striving to reach ever more beautiful and miraculous states. But from the humble perspective of the earthly waters, the one of freely participating and flowing together with others, we can understand the secrets of humanity and love. And once again, cosmic joy and humane happiness, the two poles in the aforementioned Jovan Dučić's dichotomy, do not seem to stand permanently against each other. They foster and complement each other in every truly fulfilled personality and in every inspiring worldview. Love and wonder thus keep ablaze each other's flames.

If we want to keep our eyes as the mirror of our mind and soul neither frozen and distant by being overly immersed in the view of the whole nor shallow and empty by being fascinated only by the surface dance of perceptual boundaries, but simultaneously deep and profound, and dazzling and cheerful, we ought to live up to the ideal of keeping one eye on the way of the Whole and the other one on the way of the Small. Since acceptable sensitivity to a signal requires the detecting system to possess similar dimensions as those of the system it detects, this poses demands on us to be as big and immense as the Cosmos as a whole and yet as humble and small as a tiniest seashore pebble, the task that may require lifetime and beyond to be mastered well enough. Over time, in mastering this conciliation of the Ways of the Small and of the Whole, we will come to realize that qualities of the trees could not be

grasped while disregarding qualities of the forest that they belong to, just as qualities of the forest could not be outlined without carefully evaluating qualities of the trees that the forest comprises. Likewise, in order to understand the evolution of the face of our planet, we need to know the secrets of the human mind, but in order to understand the latter we need to constantly refer to the ascending and ramifying evolutionary path of humanity and life.

Through such a niche of middle ways, the true ideals and purpose of the middle class in human societies become revealed. To recapitulate, the middle class is essential insofar as it links the upscale class above with the working class below. As such, its members are obliged not to give up either the aristocratic or the simple lifestyles, but to adopt them in parallel and stylishly combine. And as ever when it comes to blends of things that seem not so readily miscible, the very fact that blending has taken place does not automatically guarantee success. Here, however, the ideal middle class lifestyles would actually bring the aristocracy down to enrich the simple ones and, in the other direction, bring the humbleness of the simple ones up to the lofty and high-minded outlook of the high society. Of course, doing so is as hard as Buster Keaton's trying to circumvent the gap between two steamboats vastly different in stature: Stonewall Jackson and King, the former representing the working class and the latter representing the upper class. Yet, there is no more crucial place to be than on this bridge between the two social groups if we are to ensure the survival of the society as a whole. For, this healthy, connective functioning of the middle class presents a direct reflection of a healthy society. Rich and poor and the gap between them have always existed, but once the middle class bridging them begins to vanish, it is usually an adverse sign for the progress of the given society.

In the end, recall that it was neither the prodigal lust for life represented by the character of Dmitri Karamazov nor peaceful but resigned humility represented by the pious spirit of his brother, Alexei, that murdered the father in the grandiose allegory of Dostoyevsky's *The Brothers Karamazov*. Rather, a misunderstanding between the philosopher represented by Ivan Karamazov and the commoner represented by servant Smerdyakov was to be blamed for having caused this tragic act. This allegory was to say that sheer magic could be created were the working class and the intellectuals to come together and find a common language. Equally, though, the social decline and the opportunity for various oligarchs to rule all classes arise when there is a fundamental disparity and misunderstanding between the members of these two social strata. Nearly a century and a half later, this tragic nature of the disconnect between the plebs and the *bel esprit* resonated in Quentin Tarantino's *Once Upon a Time in Hollywood*, a film whose main theme revolves around the idea that if artists surrounded themselves with hicks rather than hippies and struck a common language therewith, lives could be saved and greater social harmonies attained. Concordantly, unless the deep thinking men acknowledge an equal, complementary importance of the simple people and find the ways to approach them with sincere sympathy and understanding, many gaps in communication that bring about disorder and disharmony will remain open and unabridged in our society. But if we find the ways to bring into harmony the three essential characteristics of the human life, metaphorically depicted by the three Karamazov brothers - the biological nature, rationality and warm-heartedness - the proper solutions for challenges looming over the progressive paths in life will naturally dawn on us. Integration of the acknowledged biological grounds of ours and the spontaneity arising from it on one side of this magic triangle, of our self-consciousness and intellect on the other side of it, and of our shiny goodness and compassionate grace on the third side can, however, instill the desired harmony of true prosperity and satisfaction into our creative efforts. In fact, if we looked closer, we could see that human creativity is ultimately composed of three essential ingredients: the power of the astute intellect, the glow of a kind heart and the fuel of the fiery passions. Brought into unity, they yield a blaze that can enlighten universes with a glimmer from the eye or a shiver of the lip, let alone a word said or a gesture thrown into the air.

On the responsibility for carrying our tradition everywhere with us

‘Behold that I have not labored for myself only, but for all them that seek wisdom’

Sirach 24:34

‘Verily, verily, I say unto you, before Abraham was, I am’

John 8:58

When a disciple asked the Sufi sage, al-Bistami how he managed to attain such a great wisdom, he said this: ‘Leave the door open, my Mom would say in the dark of the night, and I would be up and awake till the morning to make sure that the door does not close by the draft and that her wish be granted. Everything I have ever learned entered through that door that night’⁴⁰³. Verily, it is the magic blend of (a) our individuality that rebelliously shatters all the gates of convention on its roads to novelty and (b) responsibility for keeping our tradition alive, with our having an immense love and respect for it, that presents a fuel for the burning of the midnight lamp of our creativity, allowing it to release its shine afar and dazzle the world with the brilliancy of the deeds emanating from it. The flowers of wisdom always blossom upon the roots that touch its ground with great love and care.

We are inextricably linked to our social tradition. This is because we were not born into a world freed from any products of human work, but quite the opposite. Everything around us may be a source of immaculate wonder. Isn’t it amazing to look around and just think what sorts of constructions and tools were designed and made by human hands? And the more we wonder, the more of the potential we have for our own inclusion into this evolutionary wheel of endless progress, which explains the overall historic trend of the exponential growth in the amount of planetary information and the rate of technological advancement.

This exponential growth in the amount of information that one is surrounded with and that one needs to grasp before providing original and remarkable contributions to its further growth, coupled with the better qualities of living established during the past, is also responsible for a possible extension of the time in one’s life when a peak in creativity, which once belonged to the so-called Christ’s age of circa thirty-three years, is reached. Juvenility and spiritual youthfulness, including longer periods of learning and alternately falling and rising, which every learning process comprises, can be therefore said to entail the trend of the planetary progress. Creativeness originating from the minds and hearts of billions of human creatures that preceded us on this planet could be thus seen as instilled within the core of our mental and physical freshness, which should, on the other hand, be used to edify the towers of the tradition of human creativity on which we stand through what seems to be a cycle of progress during which instances of creativity could be seen as incessantly fertilizing each other and exponentially multiplying.

Be that as it may, our planet, in its wholeness, is like a giant being - Gaia. Because ecological webs of relationships predispose each species and each organism to be inextricably dependent on the rest of the biological substrate of the planet, all individual beings on it may be depicted as tiny but essential parts thereof. One corollary of this viewpoint is that, as Hermes Trismegistus argued many millennia ago, reading what lies ‘below’ can be used to decipher what lies ‘above’, and *vice versa*. For example, for as long as there are wars on the planet, inflammations of various kinds will haunt human bodies; for as long as there are imperialist powers trying to spread their influence across the globe, with no heed to the preservation of the local cultures, humanity will be plagued by cancer; for as long as the

worldly geopolitics is driven by enmities, there will be antagonistic forces traversing our bodies and spirits and paralyzing them; and so on. And while Bertolt Brecht would argue that ‘only a fragment carries the mark of authenticity’⁴⁰⁴, the panpsychic worldviews hold that if human beings, the conglomerates of billions of cells, are sentient, then every convocation of human consciousness must yield a greater psyche. If encompassing the whole Earth, this psyche may be named Gaia, and if encompassing the entire visible and invisible Universe, then it may be christened God, self-aware and animate in terms and scopes that are wholly incomprehensible to us, mere pieces of its infinite mosaic of mystery.

An important consequence of such a point of view anchored in the interconnectedness of all things is an absolute invalidity of taking credit for any achievements without acknowledging not only the obvious influences on the achiever, but the complete rest of humanity, life and Cosmos. Who can say, for example, that a poor Shudra who had laid down the railroad tracks on which nineteen-year old Subrahmanyam Chandrasekhar traveled when he, letting his thoughts ride ‘by the rhythm of the rails’⁴⁰⁵, derived the critical mass of a white dwarf star and implicitly predicted the necessity for the existence of black holes, giving the scientist a chance to earn the Nobel prize and fame, should be discarded from his list of acknowledgements? Such an insensibility to the influence of distant effects of our actions, pervasive in our society and lying at the root of the ecological problems of the modern day, presents a mere consequence of our inability or laziness to engage in deciphering sufficiently small details on the systemic map of the world.

Whenever we make a magnificent accomplishment, we should tell ourselves that, the way theologian Len Sweet marvelously pointed out⁴⁰⁶, it does not show how great we are, but how great God is. Such an attitude is verily a pointer to humble attitudes that the study of religious narratives may lead to.

Take the example of a loving parent that oversees a soul devoted to writing a book. If a day comes when this book turns out to be the source of inspiration for many, who would be considered worthier, whose input more substantial and whose presence more significant: the man who wrote the book or a man who had given rise to the creativity of the man who wrote the book? Who could step right up with a stone in his hand, convinced that the latter person was not perfectly worthy of this recognition, even if his role had been left out and ignored by many preceding generations? Who could object when the writer, having received accolades for his work, pulls the tiara off of his head and blows the laurel wreaths into the wind, quoting Emerson quoting Goethe quoting, allegedly⁴⁰⁷, God knows whom: ‘My work is an aggregation of beings taken from the whole of nature. It bears the name of Goethe’?

We are a part of the tradition of humanity and life and Cosmos in general, and that tradition is part of us. It has built us, and we have built it. The world that we interact with has been partly made by some preceding human hands and creative thoughts. The same genetic patterns that typify many minor forms of life are still in us, reminding us of our distant ancestors. The material that once belonged to some ancient stars is now interwoven within us. What once were stars swirl within the eyes of human wonder, and this wonder causes us to modify and enrich the material structures and information pathways of this planet.

Thus, whatever it is that we do or think, keep in mind that there is one big, big world, like a bluish globe embellishing the dark backdrop of the cosmos, hidden in the back of our minds. It also rests on inspirational leaflets stashed in lonely library aisles, on autumn leaves gingerly laying the path of careworn grace before our feet, on the bricks and rooftops of houses girdling our wild, untamed urban spirits and, in fact, on the face of every detail of the world around us. We can consult this world with silent wonder at any time.

We are not alone. There has always been a whole world watching.

But this is not all. This tiny thread, the tracing of which can lead us to limitless branches of human thinking and creativity underlying the ones nesting our spirit thereon, is only one, humane aspect of the invisible seed sprouting behind our immediate experiences. Treasuring of the other, divine aspect of our experiential origins tells us that each one of us is not let alone amidst the wonders of the world. Instead, every one of us carries within himself a golden sprout of divinity, which might provide him with the contact with an eternal and the most universal at any given moment. As the Way of Love teaches us, in concert with the two major Christian commandments (Mark 12:29-31), balancing devotion to the way of the man and the way of the Lord has always presented the key to harmonious living. We should always make sure to carefully listen to the deep and profound voices of both humane and divine foundations of our being, and search for the exciting harmonies arising from their entwinement in every act of ours.

On the effect of *vice versa* or the other way around

‘The end of all our exploring will be to arrive where
we started and know the place for the first time’

T. S. Eliot

In agreement with the aforementioned thought of Niels Bohr - ‘the opposites of some great truths are usually some other great truths’ - I have been regularly placing '*vice versa*' at the end of many factual sentences that I have carried through this and other philosophical works of mine. As a matter of fact, this is a thoroughly natural consequence of the circular nature of causal relationships in Nature. From Newton's law of action and reaction as one of the founding aspects of the models of causality in the classical physics to cybernetic feedback loops as ubiquitous models for action and thought to autopoietic networks of life, all seems to be permeated with the principles of circular interactivity. Effects of each natural cause produce effects on the very cause itself. Therefore, whenever anyone mentions an allegedly true fact, we might, at least for fun, pronounce the *vice versa* statement thereof.

For example, if someone says that human mind designs technologies, I can argue in favor of the *vice versa* statement as well. Because as much as human creativity shapes technological tools, these very tools are in turn shaping human visions and concepts about the nature of the reality. It is for this reason that we should not be surprised to realize that as the artificial intelligence becomes ever more sentient, so do sentient beings who have built it and who have lived with it turn out to be ever more artificial and automatized, having become almost robotically affected by habit⁴⁰⁸. And so, as I sit hunched in the City by the Bay, the center of informational technologies, typing these words absorbed into the Zen spot that the blinking cursor of my laptop is, with my brain cells dancing to the sound and vision of OK Computer and letting the lyrics of Fitter Happier traverse the dazzling tops of synaptic towers of some cellular metropolises erected in my head, I think of how special time and space in the history of our civilization I have occupied, having been but a child when the first hypnotic gazes at computer screens were made on this planet of ours and when human hearts, in all their eternal liveliness, were captured for the first time by the clutches of these new technologies and then slowly conquered, now working to be fully transformed into blindly marching prisoners, listless and completely emotionally alienated from one another - a generation of slaves of the cold machinery that they, themselves, have built, whom only a Yoshimi from the prophetic Flaming Lips' tune⁴⁰⁹, the burning sun of divine energy, all human in her perfect imperfectness, could save right now.

Martin Heidegger, thus, spoke no nonsense when he considered technology never to be neutral and always predisposing its users to a specific way of being in the world⁴¹⁰. For example, people have for a long time used a written word to convey ideas and draw blueprints on how to build the world

around us, and yet engravings in stone, feather quill pens, chalk and blackboard, a typing machine or word processing software all limit the expression breadths in writing in specific ways. The older writing tools, for one, with their limited options to revise the text, may have made the writers more prone to assume dogmatic stances with regard to their philosophies, whereas the major contemporary writing tools in the form of word processing software allow for an effortless modifications of the text, thus enforcing the flexibility of opinions amongst their users. On the other hand, the easiness with which texts could be copied and pasted on these platforms may predispose the users of these modern tools to the duplication of ideas and worldviews, whereas the older tools fostered more of the writing from the head and the heart and, with it, a greater authenticity of the written expression. Moreover, the fact that Christianity owed its spread largely to the development of the book⁴¹¹ and its use instead of a codex, a scroll or a simple tablet as a medium for the transmission of verbal messages further reminds us that the grasp of the written word and its popularization will also greatly depend on the technological tool used in the process of creating it. Also, with this evolution of the writing tools throughout the history came also a lesser emphasis on the cursive character of writing⁴¹². Transition from the fountain pen to the ball pen, for example, silently diminished the potential for cursive writing and, eventually, we have reached today's digital age, where writing on a computer has thoroughly eliminated any such potential, thus predisposing the writers, both professional and casual, to rely ever less on lyrical verbal expressions and ever more on machinelike coldness and concision in writing. The shift from handwriting, especially cursive, to computer writing may have also played a major role in people's finding not only poetic expressions foreign in this modern age, but also in quietly putting the striving to be unique to sleep and fostering the deadening uniformity of expression instead.

Likewise, musical instruments are a form of technology and whether one composes on a bassoon or on a harp will end up in vastly different musical languages. Not only will the composer inevitably embed different musical points in tunes composed for these two different instruments, but even if a hypothetically identical message was somehow sent out to the world on these two instruments, the world would always favor one over the other and how far the message will reach and how deeply it would get embedded in the human hearts will, once again, depend on the tool used to craft it. In the fine arts world, we could bring to mind the two predominant materials used by Renaissance sculptors: the terracotta clay and marble. Whereas the more moldable character of the former material enabled the artists to create more realistic expressions of the sculpted figures, the more lustrous and precious character of the latter material made art made out of it more transcendent in nature, with the winner in the battle between the two, as far as the popular taste has been concerned, being, of course, marble and the likes of Michelangelo, Donatello, Bernardo and Antonio Rossellino and others favoring it, as opposed to less renowned Pietro Torrigiano, Niccolò dell'Arca, Luca and Andrea della Robbia and other masters of the Renaissance terracotta sculpture. When it comes to video games, one thing that has always bugged me is the way the transition from one dominant computer platform to another entailed complete resetting of the game complexity down to the most rudimentary levels. Namely, by the time games on Commodore 64 evolved from simple arcades to more complex role-playing adventures, the transition to Amiga was made and then to PC and then to Apple and Android smart phone platforms, and with each of these transitions the continuity was lost and games returned to the levels of debilitating simplicity, having to grow anew each time from these basic grounds up and confirming that even a relatively minor change in the technology can upset the reigning forms of expression, if not prompt their reinvention. That even on the interpretational side the eye of technology through which we look at the written word matters becomes proven in my head every time the sequence of words that constitutes the best sounding sentence changes depending on whether the latter is being displayed on a computer screen or printed out on a piece of paper. Endless insights into fine molecular structure of materials using Fourier transform

Raman spectroscopy and the ultrafast planar array spectroscopy are owing to the invention of the continuous wave neodymium-doped yttrium aluminum garnet laser and the declassification of focal plane arrays by the US military, which made these two spectroscopic techniques possible, respectively⁴¹³, demonstrating that the relationship between science and technology is that of a closed loop where the advancements in one domain drive the advancements in the other. Another example is that of scientists at Bell laboratories who observed that the semiconductor devices they built as amplifiers did not behave the way they had expected and were thus forced to revise their theories. The theoretical concept they eventually derived was awarded with the Nobel prize, showing us how technologies, often thought to be mere products of human inventiveness, can present precious signs on the way of our looking back and modifying the bases of thinking in enlightening ways. For a long time, historians wondered how the ancient Egyptians were able to construct pyramids while laying out ratios of their dimensions in number π with such a fantastic precision, but once they realized that the Egyptians rolled marked wheels to measure lengths and stacked them to measure heights instead of using tape measures, the answer became obvious. These days, with the help of the computerized equipment, essentially based on scientific discoveries and inventions, the creators of modern electronic musical forms produce works often based on monotonic and repeatable beats, but also inspired by the periodic atomic and molecular patterns that comprise matter. On the other hand, any music presents a powerful source of inspiration that usually enkindles the fire of passionate diligence within us, making us invest all our efforts for the sake of benefiting humanity. As such, arts have the power of reinforcing our creativity, which may result in ever more wonderful technological tools that could be used for producing ever more captivating artistic expressions. But if you notice now that art exists merely because of humans who have created it, I shall be free to offer you a fancy thought that humans may also exist because some art is so divine that Nature prolongs the conditions for the existence of the human race so that there could be animate senses enjoying it and hearts touched by it; hence, how we could save the world with pieces of art hatched directly from the center of a burning star that our creative core is.

If you tell me that human beings have invented languages, I will pay your attention to the fact that ‘language was not made by man, but rather the other way around’, as Francisco Varela claimed, reminding us that our values, behavior and sense of the self are shaped through language-mediated communication and reasoning. The space of options promoted by the language that we use becomes directly reflected in the versatility of options in our reasoning and expression of thought, which probably appears most drastic in situations in which we face a seriously limited communication of thought using languages that we are just starting to learn. If you say now that understanding life is a prerequisite for enlightening it with the use of words, I may revert to a Confucius’ adage, ‘He who knows not the heart of words cannot know the heart of man’⁴¹⁴, and call for the remembrance of some of the most prolific philosophers of the 20th Century who saw in the philosophy of language the gateway to demystification of the philosophy of being, ranging from Bertrand Russell and Ludwig Wittgenstein to Noam Chomsky and Jacques Derrida. If you observe that humans are the only members of the animal kingdom that raise questions, I might pay your attention to the fact that questions have also raised human beings, for it is on the wings of genuine wonder that our civilization has been flown onto more sublime evolutionary stages of being than those occupied by other earthly animals. If you tell me that human ideas reflect the structure of natural relationships, I will remind you that the world indeed partly becomes the way it is imagined. Also, although we undoubtedly gain an insight into the states of the world by judging about it, it goes without saying that ‘judging others does not define who they are; it defines who you are’, as a modern apocrypha reminds us. Thus, as each judgment and opinion that we exert is a reflection of not only how the world is, but how we are as well, we can over and over again return to the words of the

Christ who wisely taught us to ‘judge not, that ye be not judged; for with what judgment ye judge, ye shall be judged: and with what measure ye mete, it shall be measured to you again’ (Matthew 7:1-2).

Bringing the Bible to mind, we could get reminded of the following William Blake’s verses: ‘Socrates taught what Meletus loath’d as a Nation’s bitterest Curse, and Caiaphas was in his own Mind a benefactor to Mankind: Both read the Bible day & night, but thou read’st black where I read white’⁴¹⁵. Blake, of course, would have known about this semantic relativity of the Bible because he was the one who inverted the classicistic view of Milton’s *Paradise Lost* as a conflict between the inherently evil wilderness of Nature and the godliness of disciplined reason⁴¹⁶ and ascribed divineness to impulsive, chaotic thought that is in a constant state of revolt against any rules or conventions, thus creating the authentically romanticist split between Order and Imagination, which humanity has yet to find the way to reconcile. And indeed, each and every Biblical story can be interpreted in a potentially infinite number of ways, so that one person’s impression of it, like that of the Bible in its entirety, may be bright and optimistic, whereas that of another person would be foreboding or condemnatory. Such completely opposite and incompatible interpretations of the same stories in the heads of different people can be illustrated on literally any verse or passage from this book, endowing it with an infinite semantic depth, as in agreement with the existential infinities that the Bible, deep down, is all about. For example, while one person may sense in the story about the resurrection of the Christ a strong supernatural element and reach the understanding of the transcendental forces guiding our evolution in one such explicit, picturesque manner, a person more grounded in the social realities may stick to the oldest version of the oldest gospel, the one according to Mark, where not a single word was said about the Christ’s resurrection and which ended with the women’s opening the tomb and seeing nothing in it; ‘neither said they any thing to any man; for they were afraid’ (Mark 16:8). A person with one such preference for realism may see in the New Testament a typical coming-of-age plot revolving around the choice that each one of us sooner or later has to make in life, which is either to give into the adult world of hypocrisy, phoniness and deadening conformity, in which one would become dead in spirit, but prosper physically, or say No to the prostitution of the soul and remain spiritually whole but discriminated and prosecuted by the faceless masses, in which case one’s destiny would be that of Prince Myshkin’s vowing to speak truth and truth only all of the time and as a result of that being put in a sanatorium as mentally ill⁴¹⁷. And indeed, parallels that can be drawn between the fine details of this Biblical story and real-life scenarios can be staggering, as I, myself, can attest to, most recently in regard to events surrounding my expulsion from academia by various Cesars, Pilates’, Barabbas’ and synods dwelling in its sinuous sphere, all ‘disguised as sheep, but in their hearts vicious wolves’ (Matthew 7:15), confirming that ‘the archetype of Christianity isn’t Jesus Christ sent as the Savior; it is the mob knowingly turning against its own savior’⁴¹⁸. And whether we would allow the murder of the child in the child-man that we are to happen so that numerous social rewards can be bestowed upon us or we would remain whole and holy in our essence but persecuted by these very same social authorities is the choice that perhaps every human being brought to the world’s stage is bound to experience as a temptation for his soul. In any case, whether biblical stories are interpreted as if elevating the body and suppressing the spirit or the other way around is more often than not a choice that is to be made at the discretion of the interpreter. I, myself, could argue any day that the world’s stage may be set in such a way that when body is safe and sound, when sensual pleasures abound and worries over the material wealth multiply, the soul will invariably cry, and *vice versa*.

As for another example coming off the top of my head by flipping the pages of this holy book in the shadow of the arches of my memory, if you quote the Biblical words saying that ‘the fear of the Lord is the beginning of wisdom’ (Psalms 111:10), meaning that fear and insecurity are the driving forces for human attempts to produce stability and order in life, I would remind you that a *vice versa* argument

could be accepted as true as well. Namely, the more wisdom and knowledge there is in the world, the more reasons for fear about their misuse and worries over their loss there will be. As Ecclesiastes put it, 'In much wisdom is much grief: and he that increaseth knowledge increaseth sorrow' (Ecclesiastes 1:18). For, no tool and know-how in the world is intrinsically good or bad, but it is the context in which they are applied that defines whether they will improve or degrade the state of the world. In the end, it is the awareness of beauty, goodness and preciousness that implicitly defines ugliness, evilness and paltriness. For, every proclamation of beautifulness in the world around us conceals an unsaid delineation of its opposites that usually also abound in it. 'When people see some things as beautiful, other things become ugly; when people see some things as good, other things become bad' (Tao-Te-Ching 2), Lao-Tzu said in his Tao-Te-Ching. This makes us cognizant of the fact that beauty always owes much to the beast, so to speak, and that the beast can be, therefore, appreciated as much as the beauty, if not freely fallen in love with, as the beauty does in Villeneuve's story⁴¹⁹, no doubt with the astonishment of the one around whom angelic chimes begin to resonate after he has come to conclusion that 'I could be in love with almost everyone'⁴²⁰, lest they both be annihilated.

These dualistic insights and particularly the mentioned entwinement of the beauty and the beast may also throw light on my spending many sleepless nights wondering whether Medusa, a mythological creature that turned those who saw her face into stone, was infinitely ugly and frightening or endlessly beautiful, both of which could have been the facial features able to stun and glacialize the onlookers, and then realizing one day that there may not be a big difference between these two extremes, for like the farthest points east and west of us on the globe meet at their ends and like the full stop of this sentence takes us back to its beginnings, so does the existence of one of them imply the existence of the other. In the stead of striving for perfection, the key may have thus lain all the time in being humanely imperfect and leisurely going with the flow of an infinitely versatile compendium of emotions and states of mind, like the sea that is one day placid and the other day raging or like a river that is perplexingly twirling in one of its segments and running in clear streams in another – so whispered a muse with pearly eyes into my ears, standing in the midst of a translucent area at which all polarities are obliterated and wherefrom a burst of a dazzling light emanates, such as that visible at the point in which matter and antimatter annihilate one another. For, what this epistemic exercise has implicitly shown us is the silliness of being a devotee of any unilateral perspectives in life while ignoring the fact that they can thrive only owing to the existence of their harshest antagonists, a view that, simply saying, spells 'Love for all'.

To switch the orbit of human thoughts around for a second and for fun's sake, if you were to urge people in your vicinity to 'throw more parties', I would readily notice that we should likewise make sure that 'parties throw ourselves'. For, although dreams of shedding stardust of exciting energy all around us and partying in a stellar, star-struck manner indeed rest in the hearts of many people, lukewarmly waiting for a perfect 'prince on a white horse' or a magical spaceship to come down to earth and suck this dreamy energy that enlightens our heart to the surface of our being predestines these dormant powers in us to remain shelled within an armor of fancy and eventually wither. Although many may think that having pearly muses dance around in magnificent visions around our head is enough to grant us the title of a supremely enlightened creature to whom the gates of Paradise are open at all times, we should know that unless we deliver these lively dreams of ours into the fields of reality, the sacred mission of our lives will remain unaccomplished. Yet, if we were to learn how to let go of any self-conscious obstacles and begin to freely glide on the feelings of empathic excitement that naturally arise in us as we find ourselves in the midst of a friendly crowd, while lighting up selfless starry wonder in us and letting it fully eclipse the conformist preoccupation with how we will appear in other people's eyes, we might indeed succeed in beautifully incarnating Doris' answer to the question what the world would become if a single person would tell truth, or, in a way, live perfectly truthfully to one's feelings. 'The

whole world would explode'⁴²¹, said she. Such has been her belief in the power of a wish to tell a beautiful story that her motto over time became 'we can change our worlds by telling our stories'⁴²². Her credo immediately brings to mind my own claims that every adventure in life should be set off to with an aspiration to use all the wonderful things that would happen to us as a food for emotion and thought that would multiply itself millions of times in us before they will be strewn all over the astonished faces of the world. At the same time, recollection is ready to be made of Jason Alexander's (mostly known for his role of George Constanza from the TV sitcom Seinfeld) overcoming stage fright by simply letting the story become more important than the storyteller, healing the problem of 'misplaced ego' and enabling light and inspirational stage performances thereby⁴²³. In other words, our getting lost in wonder over whether we throw parties or parties throw ourselves is of almost the same nature as our becoming dizzy by not being able to tell if stories that we crave to tell sustain our creative beings in this world or it is the other way around. That is, do we tell our tales or the tales tell us? Certainly, just like humans shape Nature while Nature shapes humans, being the basic premise of the co-creational thesis, the cornerstone of the entire philosophy explicated on the pages of this book, so do we craft stories that, in turn, define who we become. Although we have grown to believe that we, the readers, are alive while the tales we read are dead, in reality there is as much truth in the words proclaimed by a mime artist on the stage in Jacques Prévert's and Marcel Carné's *Children of Paradise*, after he was asked by the theater directors whether he wanted to play in a given play: 'Yes, provided the play plays along with me'. For, every creative interpretation is always a bidirectional co-creation, an active invention as much as a passive discovery, as the science of semiotics could tell us. In more simplistic terms, this is to say that what we give we also receive in return, while what we are receptive to we also spontaneously shed in the wake of our acts. If you decide to refer now to a verse sung by Paul Weller in the gem of a song by his band, The Jam, called *Going Underground*, 'the public gets what the public wants', I will fast forward thirty six seconds into the tune and find another, equally truthful verse in which the subject and the object swapped places: 'the public wants what the public gets'. The iterative combination of the two verses makes us aware that the mind and its social environment form a closed circle wherein one constantly feeds into and co-creates the other. So, if you happen to wonder, like myself, whether Chicagoans and Serbians have so much in common because a large number of Serbs have settled in the Windy City and have accordingly modified its collective mentality or so many Serbian immigrants find themselves at home in it because its vibe is reminiscent of their native places, be aware that any similar example would be perhaps yet another banal manifestation of the general inextricable entwinement of mind and its milieu in each and every system bigger than ourselves, bringing about irresolvable roaming through a labyrinthine loop wherein causes blend into their effects and *vice versa*. Moreover, as the co-creational thesis itself suggests, wherever we have a created whole and only a single creative pole responsible for its creation discerned, we could be sure that there is another, complementary pole hidden behind the scenes, with the two of them incessantly co-creating not only the whole that they give rise to, but one another as well in the course of their creative endeavors. And just as mind draws the features of Nature, which in turn defines actively the features of the mind, we could have seen from the extensive preceding discourse on the Way of Love, the most crucial corollary of the idea of co-creation, that this name is descriptive of not only the idea that exhibitions of Love are conditioned by our holding a stance wherefrom we are simultaneously connected and distanced from its objects, something that every way in Nature intrinsically symbolizes, but also of the idea that the rise of this divinest feeling of them all in our heart spontaneously sets our feet on this middle ground whereon we remain meditatively withdrawn, yet one in empathy with the life surrounding us; hence, the Way leads to Love and Love leads to the Way in the sphere of the Way of Love.

This is to say that whenever we recognize one entity influencing another, we should be sure that the influence has been exerted in the opposite direction too. For, in this universe of ours, the controller controls the controlled to about the same extent as the controlled controls the controller⁴²⁴. Thus, if you observe that the writer is in sole creative control over the form and the content of his written works, I would add that these works define the writer's thoughts and determine his fate as much as they are being crafted by the writer. If you expose the belief that the imposer of an action, *e.g.*, the judger of the judged, is involved in the exertion of an unidirectional influence, I, remembering the classic scene from Luis García Berlanga's *El Verdugo*, where the executioner and the victim are being dragged equally dejectedly to the execution site, making the spectator wonder who is the real victim in the societal feedback loop of collective victimizations and penalizations, the executioner or the executed, would counter it with the claim that every time we impose an action onto another, we are the subject of a law of action and reaction of a kind and become the recipients of a reaction to the action bouncing off its object, rendering us both the subject and the object of our actions and the literal theme of the famous Biblical precept: 'Wherein thou judgest another, thou condemnest thyself' (Romans 2:1). Should you now happen to make a claim that nurture wholly defines the traits of the infants, I would pay your attention to the fact that children remold their parents' personalities and keep them in check almost to the same extent as parents shape and control their kids'. For example, just as children tend to be calmer and more sensible when they are in the company of their parents, so is the case with most parents, who may have otherwise acted in rude and obtuse ways, when they are around their kids. For this reason, I often claim that while parents give life to their progenies, the newborns give an equally unforeseen new life to their parents. So, when you see a proud parent carrying a child on his shoulders, such as my Dad used to do when I was a toddler, be sure that the parent is to about the same extent being carried on the child's slender shoulders. The insight arrived at from this clash of past and future leads us to an even greater inference: namely, if you tell me that past defines future, I would tell you that future also defines past. Your argument might be based on the fact that by looking in the past we essentially select and reshape the memories we want to keep with ourselves as metaphors and ingredients for future thoughts and visions. Some people are inclined to look back in anger, distrust and despair, whereas other people tend to see a glowing beauty in the way the reproduced past events appear to them. The way in which we see past thus palpably outlines the way future will be. But my question is what makes one man see the recalled past events as beautiful and another man see the same ones as unpleasant. In large extent it is defined by the way in which the future is approached. The invisible streaming of one's consciousness towards an imagined manifestation of the future is responsible for the light in which the past will be recollected. A pleasant state of affairs spread before us can turn even the gloomiest past occurrences into decent memories, as compliable with Nietzsche's popular saying, 'Whatever it is that had not destroyed me has only made me stronger'⁴²⁵.

You say that each time has its own music, and I say that every music has its own time as well. For, no matter how minute and depleted a musical piece may sound to us, we can be sure that there always are experiential contexts under which it might trigger an unforgettable enjoyment for the listener. Therefore, if you attempt to explain the current discrepancy between the music listened by the majority of people and the music taught at universities by referring to the blatantly bad taste of the creators of the contemporary pop tunes⁴²⁶, I, like many other survivors of war who have learned on their skin that there is always more than one side to be blamed for any adverse situation, may step up and point my finger at the standard university courses that do not keep abreast with the actual trends in musical expression and fail to recognize the indisputably existent aesthetics of the modern, pop song musical format. If you point out how dancing is an excellent way to relax your body and mind prior to a big event, I will add that dancing that truly instills pleasant sensations in us requires a relaxed body and mind as its

precondition. If you think that it is I writing this book, I will tell you that at the same time this book is writing me, for 'writing enlarges the landscape of mind'⁴²⁷. Or, as figured out by Gustav Mahler during his work on the 4th symphony, the simplest and sunniest of them all, 'It becomes even clearer to me that one does not compose; one is composed'⁴²⁸. Here is why in order to deliver a masterwork after masterwork as an artist, one must apprehend and live up to one of Yves Klein's key sayings: 'The painter must constantly create a single, unique masterpiece: himself'⁴²⁹. If you believe that by befriending works of certain artists, you become familiar with them, while they have no clue who you are, I may resort to a few witty words written by a student given a task to tell what he knows about Charlie Chaplin during a class held by the movie critic, Stanley Kauffmann: 'I don't know how much I know about Chaplin, but he certainly knows a lot about me'⁴³⁰, and all that despite the fact that 'the Zulus know Chaplin better than Arkansas know Garbo'⁴³¹, as Will Rogers noted in 1931, the year in which Chaplin released *City Lights*, the movie I consider to be the greatest one ever made. Now, thinking of my personal likings in the world of arts, I can easily get myself caught in an inextricable web of relations wherein I could not tell whether I see the reflections of who I am and who I strive to become in the pieces of art I adore or it is them that seize me by surprise, find the open arms in me as the signs of things I miss and crave for and then fill them with baskets full of sweet and precious treats for the soul. That is, the bottom line question is whether the given work of art is in my hands or my destiny lies in its hands. Should you become fascinated with powerful people ostensibly in charge of control over a variety of worldly events, I can remind you that control is always mutual, and that the controller's flexibility is being reduced in about the same extent as the freedom of the controlled systems that the controller manipulates with is reduced, so that it can be reasonably said that the controller is also being controlled by the controlled objects⁴³². If you start thinking now how only apparently mighty and powerful are, in fact, small and meaningless, I can argue for the opposite case, recalling how the sea positions itself below the level of the rivers, and yet all the rivers flow thereto. For, in a world where everything is cyclic and where 'not only the thirsty seek the water, but the water as well seeks the thirsty'⁴³³, 'many that are first shall be last, and the last first' (Mark 10:31), as the Christ prophesied.

If you come up boasting how you now own a house, the Christ, along with a myriad of enlightened souls that blessed this planet with their presence and insisted that the less one has, the richer one is, might revert your statement and say that the house now owns you. On one hand, purchasing a house through a bank loan conditions the new owner to obediently serve the premises of a capitalist society for the next thirty years lest he lose the comfort and the property he has gained, committing oneself to a rat race in the course of which he will often wonder who the house really belongs to: oneself or the bank, or perhaps the society as a whole. On the other hand, even when no external loan was involved in the purchase, binding one to a single 100 ft² or so large corner of the Universe and asking for a constant work and attention to maintain it is analogous to the situation where the orange juggler controls the oranges while the oranges control him⁴³⁴, limiting his flexibility and solidifying his movements into a repetitive and tedious routine. Or, as pointed out wittily by James Clark Maxwell in his essay titled *Is Autobiography Possible?*, 'When a man once begins to make a theory of himself, he generally succeeds in making himself into a theory'⁴³⁵, hinting at the logical stiffening of the self whenever this self wants to create a model of itself. Next, if you stumble upon a fancy store in a trendy neighborhood and wonder out loud why the articles on sale in it are so exorbitantly pricey, the owner might refer to high rent as the reason. The secret is, however, that the high rent indicative of desirable location also enables the owner to get away with the unreasonably high prices in this vicious circles of supply and demand⁴³⁶, only one out of thousands of them that any given market economy is saturated with. In other words, not only does high rent set the prices high, but the high prices set the rent high too. If you come to believe that the ultimate point of the economic activity is to get a product to the market, a

new breed of business strategists might counteract this point with their teaching the opposite: namely, bringing the market to the house, believing that customers are being seen in a bit more respectable manner on the basis of one such approach⁴³⁷. If you are tempted to think that getting money out of the equation determining your decisions in an ineluctably monetary world will make your actions automatically more benevolent and effective, just think of the pharmacy economics: by prioritizing the efficaciousness of the drug therapies and medical treatments over their cost-effectiveness in the US, the cost of these therapies has skyrocketed⁴³⁸ and both pharmacy and medicine have become exceedingly monetary in nature, creating along the way disparities between the treatments available to the rich and the treatments accessible to the poor like in no other country of the world, whereas, in contrast, by prioritizing cost-effectiveness of the drug therapies and medical treatments over their efficaciousness in Germany, Sweden and many other European countries, not only was the entire healthcare system made more effective, but these therapies were also kept at a cheaper level and were more accessible to the poor, while being satisfying to the rich, creating nowhere as big of a gap between the two as that present in the US. Having mentioned a country that many consider a neo-imperialistic bully of the modern age, if you now observe that feeling victimized is the first step toward becoming a bully, an aggressor endowed with a sense of superiority over the oppressed, whom one may still perceive as the oppressor, past or present, I will pay your attention to the fact that impressions of one's heroic supremacy, of one's belonging to the few chosen, as exemplified by the history of Serbs⁴³⁹, are the first steps toward one's gaining the impression of being the object of worldly injustice and indulging in imagining grand conspiracy schemes woven solely to cause one's demise. If you were to repeat Bernardin de Saint-Pierre's catchy maxim, which says that 'Nature is always building even while she is destroying'⁴⁴⁰, I would pay your attention to the acts directed towards creation of constructive disorder intrinsic to magnificent creative activities in every domain of life, from the molecular to the biological to the psychological to the ecological to the sociological and beyond. For, the more beautiful human being is in the eyes of goddesses and seraphs overseeing the Earth, the more intense is the collision of the drives to build and ruin rupturing it apart. Were you to point out the blatant fact that sick people are prone to dwell in static postures, be they lying or sitting, I would pull out a large body of scientific evidence that perpetuates the common reason according to which extensively dwelling in static postures also increases our chances of getting ill⁴⁴¹. For, everything in and around us can be modeled as a chain in a causal feedback cycle; spinning it or the chain lying on the opposite side from it matters little then, as in both cases the spin of the cycle will be sustained. If you noticed now that poverty erodes human spirit and educational abilities, I would tell you that the human spirit and a valuable education are the ones that truly have the ability to eradicate poverty. In accordance with the famous inscription on a British church, if you observe that 'vision without a task is but a dream', I could tell you that 'task without a vision is a drudgery', and we would readily agree that only 'task with a vision makes a missionary and presents hope of the world'. If you say that Madonna depicted on Jean Fouquet's Melun Diptych⁴⁴², so ahead of her times with an hourglass waist and spacey, milky skinned countenance, as if she is a stewardess on a sci-fi spaceship and not a Renaissance muse, and then a bare breast at which the crimson angels gape, is but an embodiment of promiscuous lustfulness and the artist's scandalous blasphemy, I may tell you that this image could be a metaphor of the Virgin Mary's cravings to give all that she has ever had to the world and even more, quite like the virgin who says 'come... and whosoever will, let him take the water of life freely' (Revelation 22:17) and whom John the Apostle placed at the very end of his book of Revelation as an archetype of utmost spirituality. If you, along the same line, continue by asserting that artistic depictions of naked Jesus on frescoes and ornaments disgrace the sublimity he had been entitled to as the Son of God, I may add that these imageries could be seen not as degrading, but as quite uplifting instead; to do so, enough would be to resort to the words of Leo Steinberg who believed that

the Christ's taking on manhood in each and every aspect of his physical being was, in fact, his implicit proclamation that 'godhead has nested itself in the infirmity of the flesh, so as to raise that flesh to the prerogatives of immortality'⁴⁴³. If you come to think that the beauty of science lies in its following the Aristotelian path from the particulars to the universals, taking any given physical object, be it a seashore pebble or a teardrop fallen from the sky, and finding in it systemic relationships applicable universally, I will tell you that, in analogy with the logical reasoning wherein inferences are insinuated even before the experimentation commenced, science equally follows the opposite, Platonic path, starting from the universals and then searching for their mirror images in the particulars. If you tell me that every playful behavior and idea need to be serious in order to be inspiring and creative, I can tell you that every type of seriousness also needs to be intuitive, cheerful and playful so as to be the sign and the way of creativity. If you bring up the fashionistas' favorite saying that 'being pretty is not easy', I would tell you that its truism is not lost when it is reverted to the verse heard in the self-released 1980s San Francisco classic, Castro Boy by Danny Boy and the Serious Party Gods, namely 'it's not pretty being easy', reminding us that the privilege of blessing the world with the shine of the light of the soul belongs strictly to those who are marked by others as being difficult. If you wish to intrigue me by mentioning the recent finding that people who sleep longer in the morning tend to be more intelligent than the early birds, I, enwrapped in a puffy cloud of humor, may begin to wonder if people who sleep in are smarter because they sleep in or they sleep in because they are smarter than those who don't. If you refer to a pop song verse 'she was never bored because she was never being boring'⁴⁴⁴, I will remind you that whenever one's mind and heart are filled with genuine curiosity and wonder, every ray of attention will present an awakening stimulus for the world, making one's appearance naturally invigorating without one's even trying to act in exciting ways. If you say that the world of each one's experience is as beautiful as the eyes that see it are, I will remind you that what makes a human being beautiful lies not in one's external features, but in the beauty of the world as one sees it and of the imaginations thereof as arisen in one's mind, and the co-existence of these two arguments would be in perfect agreement with the co-creational thesis.

If you happen to recall a very much Manichean argument that light would not exist without the darkness it traverses and illuminates, I would pull Swami Sivananda's message from my pocket, saying that 'there is never darkness without light'⁴⁴⁵. Yet, only the greatest minds have understood that feeding of the qualities that contrast those that we heartily try to highlight, elevate and support is as vital as feeding the former. Finally, if someone says that sunlight is the source of happiness for the body and mind, we can recall the famous initial words on Zarathustra's journey in the book of Friedrich Nietzsche: 'Thou great star! What would be thy happiness if thou hadst not those for whom thou shinest!'⁴⁴⁶ And this leads us to revisit once more the essence of the Way of Love by reminding us that the more we descend into the spiritual core of our being, while carrying a torch of knowledge and enlightening the dark and inert passions breezing at the bottom of our heart, the clearer the view of Nature spreading in front of us will be. That is, the more we discover the spiritual treasures buried deep inside of our heart, the greater the potential to endow others with them will be. But the opposite argument stands firmly impressed as well. Namely, the more we explore the signs and meanings that the physical world sets in front of us, the greater the potential for revealing the essence of our own being will be. The more astonishing the meaning we find in the world around us, the more successful our contemplative plunging into the inner world of thoughts and visions will be.

Thus, if we want to find ourselves, we should look deeply into the eyes of Nature. But if we want to meet the divine ontological essence of Nature, we should look deeply into ourselves. Because, eventually, all our observations and interpretations of the world start from sets of premises that cannot be verified through experiments. But, on the other hand, all the concepts of our thinking, including the

most elementary premises, can be traced back to perceptive indications, partly originating from our biological and cognitive predispositions and partly determined by environmental stimuli, and thus by Nature itself. Consequently, Nature partly draws the nature of human perceiving and reasoning, whereas humans partly draw the way Nature looks in their eyes.

All through the ages sages have claimed that by finding beauty in the surrounding world, we simultaneously beautify the core of our own being, and *vice versa*. This is because in everything we perceive there is a piece of Nature and a piece of our self. The circular link that connects in proportion the spiritual richness concealed within us and the beauty and meaning of Nature arising in our eyes, including the richness of the world that we contribute to in interaction with others, thus stands at the heart of the co-creational thesis and the Way of Love.

As we see, such a causal circularity that permeates all physical processes, irrespective of their scale, is perfectly consistent with the very concept of co-creation. Recall that in a more general light, the concept of co-creation applies to all experiential qualities and not only to the processes of perception wherein the intersections of constructivist and realistic spheres of existence give rise to actual experiences. As such, every creation in Nature occurs at the points of an intersection of a pair of creative influences.

There are two systemic evolutionary consequences that become obvious at this point of the discourse. First, it takes two of something to form anything in Nature, from perceptive boundaries to syllogistic arguments to human beings. And second, the evolution from a systemic, general perspective is inevitably tied to a paradox, that is, to an encounter of at least a pair of antagonistic streams of development. Mismatch is the precondition of the search for a better match that would bring us to more complex organizations of the system and novel mismatches therein.

In the framework of the co-creational thesis, this means that there always needs to be a creative tension between the aspirations of human mind and the Way of Nature as the two creative sides involved in giving rise to all the details within one's experiential world. Should one start picturing oneself as a solipsistic center of the Universe, the beauty and meaning of the voice of Nature residing in the world would be neglected and let disappear in vain. But should one become a blind follower of the lures of one's surrounding and start passively reflecting the world in one's own eyes, one might realize one day that one has begun to bring to life the famous Nietzsche's thought, 'Whoever battles with monsters had better see that it does not turn him into monster: and if you gaze long into an abyss, the abyss will gaze back into you', within one's own very being. Because, eventually what we see in the world we get to become, and *vice versa*: the more graceful the cognitive foundations from which we observe the world are, the more beautiful the world will appear in our eyes. Whether we beautify the world or our self, the effects would be mutual. And it is our duty to be devoted to both for the sake of preserving the Way of Love streaming along our being: to become immersed in the beauties of Nature, only to be returned to the secrets of our mind and heart, and *vice versa*. Although this mutual reflecting of qualities of us and Nature is incessant, a creative dialogue with all of its alternate dynamic shifts between leading and following, depicted by the aforementioned balancing the states of balance and imbalance, has to be maintained in order for our creativity to continue flourishing.

No wonder that the opposite of 'antagonistic' is 'agonistic' with its immediate association with the agonizing element. For, all destructive systems are typified by positive internal feedback relationships, i.e., the ones in which internal operational effects become not maintained and well-balanced over time, but reinforced without limits. Therefore, the dialectical organization of the world should not be a reason for despair and disenchantment in itself, but should be seen as the only boundary condition in which our progress and evolution can take place. On the other hand, however, keep in mind that evolutionary and learning systems are not characterized by perfect, static balances that correspond to negative feedback

relationships solely, but by dynamic equilibriums between the positive and negative feedbacks, the former of which are associated with development and growth, while the latter ones are connected with the preservation of balance and sustainable acting. And in this balance between balance and imbalance is where the true art of living comes forth.

Another important consequence of such circularity inherent to causal interactions in Nature is that each problem can be tackled from more than one side. Because there is more than a single cause in each problematic situation, there is more than one approach to the solutions thereof. If the wellness of human mind defines the wellness of human body and *vice versa*, then we can induce healthy states of being by either cultivating healthy and inspiring thoughts and aspirations or maintaining healthy and flexible body postures, or by both. If we know that the more illnesses in the world there are, the more drugs will be offered on the market, we can be sure that we can tackle many illnesses by reducing the amount of drug usage and promoting healthy lifestyles. Then, if we agree that poor education stands at the root of each social poverty and that social poverty prevents the pursuance of sound education, it can become clear to us that by promoting good education, we inconspicuously but truly reduce poverty, whereas by reducing poverty through improving working conditions, promoting higher productiveness and fostering a fair economic distribution of goods, we ameliorate poor conditions for education, although in a similarly non-apparent and slow manner.

I frequently recall a homeless Roma that appeared on a TV screen one day. When asked about his opinion on why the gypsies are nowadays not educated enough, he offered a brilliant common-sense observation. ‘Well, gypsies are lowly educated because they do not attend schools, and they do not attend schools because they are gypsies and nobody expects them to do so’, he said, eventually noticing that ‘it is all a vicious circle in which we are caught’. The causal circularity that this reasoning is permeated with endows it with a true systemic character from which many highly educated intellectuals could, sadly but true, learn a lot. Inspired by it, I could now go ahead and argue that the schooling system as it is conceived and implemented today - confining infinitely lively juvenile spirits who would run around in excitement and chase their dreams breathlessly into dull classroom pews and forcing them to sit down and behave in a robotized, predictable manner, thus turning life inside them into something dead and dilapidated - is adjusted to the lowest common denominators, that is, children who would, in the absence of this rigid system that cans them ruthlessly, be out in the street, turning into bandits and hooligans, and not to the gifted children who have the innate thirst for knowledge, who are good to others by their very nature and who have creative drives bursting inside them. A consequence of this is the transformation of educative voices into sheer demagoguery, being the type of speech that, as it was already mentioned, appeals to none other but ‘the lowest common denominator of a population’⁴⁴⁷. Further down the line of causality, this gives rise to the epidemics of hypocrisy, of dishonesty that is so pervasive that it is not visible anymore to anyone, all along with the psychological and societal ills that it causes, being the very same ills that spill over back to the beginnings of this circle, feeding their poisonousness into the educational realm and perpetuating this vicious cycle with no end in sight. The argument this Roma expounded, however, nicely relates to another example from my own personal academic experience. Namely, it has been widely recognized that minority students have a lesser chance of making it successfully through college or lab internship compared to students coming from more privileged backgrounds and a plethora of statistical studies can be cited in support of this statement⁴⁴⁸. What happens in this case is that the disadvantaged student, not expected to achieve the same standards of excellence as his privileged counterparts, tends to be perceived by his instructors as less capable of creative work, while the student, himself, comes forth with a lack of self-confidence in the first place, yielding subtle signs of body language that involuntarily spell a lack of the ability to succeed to the authorities. What results from this state of affairs is yet another vicious circle, the spinning of which

over time pushes the student into ever deeper chasms of low self-esteem and correspondingly low creative potency, in both the eyes of theirs and their tutors. And if you start to wonder whether racial prejudices and inequalities in the postcolonial societies are reinforced by the same positive feedback mechanism, you will receive one big fat Yes as an answer. Understanding the logic behind the constant tendency for these divides to grow into ever more aggravating gaps can be the first step in our finding equally logically profound ways to ameliorate these conditions. These could come to comprise an excellent complement to the logic of thy heart, which is such that it welcomes each and every one, regardless of their appearance or attitude, into its infinitely benevolent and comforting arms.

Speaking of these closed causal circles that pervade every single natural system, regardless of its size and complexity, the fact that the entities comprising them are simultaneously pushed from left to right and from right to left, as well as both upwardly and downwardly as they are being spun in a circle, explains the easiness with which physical relationships could be reversed and still preserve their truthfulness and explanatory value. This picturesque analogy reminds us that engaging in a positive feedback is most of the time akin to stirring a syrupy concoction whereby natural resistance exists to changing the stirring direction. For example, if you try to give the syrup to a cranky child with sore throat, it will tend to resist due to its bittersweet taste; refusing it, however, would decrease its state of comfort even more and it would get even crankier as the time goes by. To halt this positive feedback whirl that pushes the system into ever less viable states, one has to suck up on the temporary lack of comfortableness and stir the given circular relationship in the opposite direction. The simple recipe as to when to start swirling against the stream and when to boost the swirling intensity even more is, however, none. This is so not only because each biological system is a complex composite of countless feedback loops where positives can annihilate each other, while negatives can sustain the positives, but also because negative feedbacks are associated with both balance and stagnation, while the positive ones are involved both in constructive, developmental growth and self-destruction, reflecting the teleological duality of practically every single process in life.

Let us, furthermore, take a look at Gregory Bateson's definition of information. He said that it was something composed of a 'difference that makes a difference'. As soon as we realize the value of this definition in one direction, its validness in the opposite one may pop up as equally significant, being also the consequence of the co-creational nature of experiential phenomena. For example, by considering any information that arises in our cognitive apparatuses we can never be sure whether it was a realistic difference in a hypothetical outer world that produced a difference within our being or it was the landscape of our mind and our biological constitution that imposed their own differences upon the differences that we think of as belonging to some external world that surrounds us. If we, on the other hand, consider information in a less fundamental way, that is, the way the popular media do, we could also never be sure whether it was the spread of the constructive differences from the subject being to the world or the other way around that Gregory had in mind when he proposed this idea. Nor is it really important in this world of circular causality in which whenever we evidence an influence that one entity exerts on another, we can right away go and look for the influences in the opposite direction, which surely must exist.

These circular causal loops wherein each cause is affected by the effect that it has caused are so pervasive in Nature that they present far more of a rule than an exception. Just like the eight atoms on the corners of the unit cell of a cesium-chloride-type crystal lattice and one atom in its center could swap places anytime without altering the crystal structure and stoichiometry of the compound and just like an identical crystal structure would be obtained had the fourteen atoms of the unit cell of a sphalerite-type cubic crystal lattice swapped places with the four atoms filling its interior tetrahedral positions, so could almost every cause and effect in our physical models of reality switch their roles without crucially

changing the essential structure of these models. Practically all chemical reactions proceed not only from reactants to the products, but the other way around too, and if we dwell just a bit longer in the realm of solid state chemistry we'd be able to recall as well that the ionic radii define the coordination number (for example, for ratios between the radii of cations and anions in ionic crystals lower than 0.155 the coordination number will equal two, for the given ratio in the range between 0.155 and 0.225 the coordination number will equal three, and so forth until the maximal coordination number of twelve is reached at the values of this ratio higher than unity), whereas, on the other hand, a factor on which ionic radii directly depend is none other but the coordination number, with ions increasing in size at larger coordination numbers⁴⁴⁹. This inextricable entwinement of causes and effects, of course, has placed an impregnable burden of analytical insolvability on scientific attempts to mathematically model complex physical systems to a degree that would enable at least some level of predictability of their future states. Rather, converting the inherently nonlinear networks of relationships that permeate natural systems to linear ones via approximations that ignore the feedback effects of effects on their causes thus became a simplifying approach so deeply embedded in the fabric of scientific descriptions of physical events that many of us have taken these approximate maps for real and forgot that the territories they represent are far more complex, given that they contain causal circles in which the classical logic becomes swiftly tangled, discombobulated and dissolved.

Science and human reasoning have ever since been tempted to oversimplify the depictions of the causal relationships of the physical reality. Models of natural systems are inevitably imperfect and there is not a single scientific framework of description and analysis that does not fail at specific conditions. As such, it is always a big challenge arising in front of the scientific mind to live with ambiguities and enigmas. A mind who cannot do so is prone to fall from the loci of epistemic grace and degenerate into linear, mechanistic and irksomely predictable views before which an answer is drawn even before the question is posed, let alone sensed with the depths of the soul and lived in its fullness. The solution, obviously, is not to cut down perplexities that antagonize our beings to overly simplistic models, but to acknowledge the beautifulness and evolutionary drives that arise at the boundary between an inquiring mind and horizons of mystery. Otherwise, this sunshiny serenity and grace that underlie the workings of the genuine scientific mind would become overcast by the cloudy layers of ignorance and arrogant attitudes. So to say, whenever we oversimplify Nature, we should be sure that Nature is going to oversimplify us. 'Judge not, that ye be not judged. For, with what judgment ye judge, ye shall be judged: and with what measure ye mete, it shall be measured to you again' (Matthew 7:1-2), Jesus thus spoke in spirit of the feedback interaction between human actions and the responses of Nature. Or, as Gregory Bateson once observed, 'the oversimplified ideas will always displace the sophisticated and the vulgar and hateful will always displace the beautiful. And yet the beautiful persists'⁴⁵⁰.

On the effect of 'the other hand'

'All things from eternity are of like forms and come round in a circle'

Marcus Aurelius Antonius, *Meditations*, 167 BC

'In the Way, there is a reversal, a circle of return...'

Lao-Tzu, *Tao-Te-Ching* 80

In close relation to the aforementioned '*vice versa*' argument, each assertion can be intelligibly complemented with an 'on the other hand' statement. Namely, every thesis necessarily hides a seed of imperfection in it, and it is confronting it with a lucid antithesis, irrespective of whether we agree with it

or not, that yields the way forward, towards syntheses that yield new perspectives and new directions for a prosperous future of our knowledge.

For example, each spectrum of beneficial effects of a specific approach to a given problematic situation can be complemented with an array of adverse effects thereof. Whenever we are about to propose a solution to a problematic situation in life, we should keep this in mind. On the other hand, we may know that every difficult and challenging situation that seemingly lacks any convenient solutions has a way out as well.

It is a vital element of the fair practice of arguing and exerting any opinion at all to acknowledge the adverse aspects of advocated approaches and proposed solutions as much as their favorable features. Similarly, the confronted ideas and approaches should not be fought against without mentioning their inevitably existing positive aspects, but quite contrary: their flaws and benefits should be always presented side by side. For, each remedy has undesired side effects, and *vice versa*: each problem hides the doors that open the way towards beneficial results, which might have been unreachable otherwise. At this point, it is worth noticing that ethics as a field of study is, in fact, all about complex encounters of pro and con arguments, which automatically implies that openness to criticism is an essential feature of an ethical approach to anything in life.

Being aware that there are neither perfectly perfect nor perfectly imperfect expressions, deeds and ideas in this world is a pivotal aspect of healthy reasoning. For, on one side it prevents idolatry and inevitable disappointments that follow our illusory endowment of natural systems with the clothes of perfection, while on the other side it prompts us to keenly recognize the most blissful of traits even in entities unanimously vilified by the masses and thus enter the road that leads to awakening unconditional love for all that is, the beginning and the end of sanctified living in this world. A professor of physics in my middle school used to enter the freshmen class at the beginning of the school year and, without a single word being said, write down A, B, C, D and F on the blackboard. Then, he would utter, ‘God knows for A, Einstein knew enough for B, I know for C and you guys will be either D or F’, sending waves of shudder down the pupils’ spines. On one hand, this real life story has served as a support for my own adoption of a relatively stringent grading system, where, as I would often say, earners of an A would get an automatic letter of recommendation for the grad school or beyond, earners of B would be invited to join my lab and conduct research in it, while C, taken as literally ‘average’, had to be earned with hard work. By learning a lot and yet getting an average grade at the end of the course, the student becomes aware of the immense ocean of knowledge that is yet to be conquered and thus gets a truer and more realistic introduction to the subject than if the course were designed in such a way that most everybody could answer everything right, which is how education is being approached today, fallaciously, as it were, creating the false impression – so pervasive among the new generation - that the most sublime peaks in life could be climbed to with far less effort and talent that these feats actually take. On the other hand, this old-school teacher’s introductory warning has often popped up before me as a reminder of the fact that any truly valuable critique has to balance pros and cons. If one or the other could not be discerned by the critic, it signifies either his own demerits and a need to learn more in the case of his idolatrous admiration of the subjects of his critique or his malicious blindness and then again a need to advance more in the case of his sole bashing of the works in question, with no positive words proclaimed in their defense. We could thus conclude that nothing in this world is either black or white. All is rather gray and every profound ethical discussion is obliged to consequently stretch to the limits of infinity, earning the epithets of thoroughness only when it fills thousands of pages of text with its comparative analysis of pros and cons. Just as I used to play my guitar plugged to a sound system and greatly amplified so that I could pluck the strings with only about 10 – 20 % of strength, always making sure that when sounds truly ought to be thunderous there is an aural space available for it, and just as I

prefer talking to a microphone during lectures so that I could control the volume over a wide range of values, from whispering to screaming, so have I always avoided unquestionably praising human creations that touch my soul and mercilessly stomping over those that dull or enervate my artistic senses. Rather, even the artistic works that top my lists of favorite music, books, movies or paintings would always be vigorously inspected for weak spots in my head, just as I would try my best to find amusing details transformable into doors that lead to utterly divine insights in the kitschiest of all pieces of human creativity. When I come across reviews that assign 10.0 out of 10.0 possible points to a piece of art, as is, for example, a common habit among the critics of Pitchfork Media, it immediately tells me of an inherent idolatrousness and impoverished imagination of the brain behind the pen, unable to critically assess and envision ways in which the given works could be made even more sophisticated than they are. Also, when the most sublime epithets held in our pockets and the highest possible value on the quality scale are assigned to a human work, anything better than it would require from us to go beyond the given scale and invent new attributes for our descriptions. This is, for instance, how the devaluation of the word 'okay' gradually occurred, once used to describe excellence and nowadays used to denote sheer mediocrity, as well as how the standards of politeness changed over time, resulting in the social state of affairs of the day wherein not even smiling constantly, like a phony buffoon, may not be enough anymore to appear unreservedly gracious to another, whereas but a single frown could be enough to guarantee one's place on a police station bench in some of the exceptionally sterile areas of the US. All of this is to say that if we are to drive the pathways of the evolution of our reality through harmonious stations and towards blissful destinations, our quality assessments should stem from the awareness that even the most blasphemous imperfections hide the seeds of perfection and *vice versa*.

Therefore, whenever anyone mentions an apparently perfect solution, we may ask what the 'other hand' has to say in order to form a more complete picture of the problem-solving algorithm. For, even the Christ, the traditional epitome of spiritual perfection used to elegantly rebuff any attributes of perfection that his devotees would assign to him. 'None is good, save one, that is, God' (Luke 18:18-19), he would have said, knowing that perfection equals stagnation and, as such, stands for quite an imperfect standpoint in life, whereas only the blends of perfection and imperfection are free to claim the titles of true perfection. And just as the chaotic entropies and strivings towards order and symmetry ought to be carefully balanced if we are to secure a sustainable evolutionary path for the planetary life, so should we always look after equilibrating what may seem to us as the only viable options with their diametrical opposites. In that sense, we could keep in mind that only a pair of wings can support a bird in its streamline flight, while only hands held closely can give rise to beautiful emanations of the spirit of prayerfulness in us that opens all, even the steeliest cosmic doors before our gentle heart.

For example, if you point to a perfectly ordered natural system, I could point to inevitably existing entropy in it as the key to achieving and maintaining such an immaculate order. If you point to an enormous interactive richness of a natural system, I could point to you many important details of the physical reality that it ignores. If you notice how strong hydrochloric acid is, I could remind you that its strength comes from the ionic bond that actually proves as very weak once the compound gets dissolved in water. Every form of strength can thus be said to hide some softness within, just like all types of order and stability maintain rooms for the optimal levels of entropy and freedom somewhere deep in their cores. This synchronicity of strengths and weaknesses calls to mind the story I was told by a professor of pharmacy⁴⁵¹ as a witty advice on how to cope with the classical interview question of what the candidate's most pronounced strengths and the most critical weaknesses are: 'My strengths are that I am an overly focused, overly hardworking person dedicated to work more than to anything else, and if you ask my wife she could tell you that these very same qualities are my greatest weaknesses too'. In line with the heart of this discussion that beats with enthusiastically seeing every pro as a con and the other

way around are also the ancient Buddhist saying that ‘one is the key that unbolts the doors of both heaven and hell’, a softly sung verse from a Neil Young’s tune, ‘The same thing that makes you live can kill you in the end’⁴⁵², and Winston Churchill’s deeming that ‘nations as well as individuals come to ruin through the over-exercise of those very same qualities and faculties on which their dominion has been founded’⁴⁵³. The rise to the political stardom of Slobodan Milošević, for example, began in 1987 in Kosovo, where he presented his robust self as a mighty defender of Serbs suppressed by the local Albanians, and his end came as a result of the failure on that very same piece of Serbian land a decade or so later, which makes me envisage on the opposite hemisphere of the microcosm of my mind a brighter San Francisco day on which the very same social networking platforms that brought fame and exorbitant revenues to CEOs of Facebook, Twitter, Google and their likes will be the same ones through which the views of their corruptness, obsolescence and shallowness will be spread faster than the speed of light. Remember, then, the chess game between Kotov and Bondarevsky played in Saint Petersburg in 1936, when the white jumped proudly with his two knights and then had his king mated with the two black knights following a stunning queen sacrifice; likewise, the tools we use in life to make way for ourselves against the world are usually the very same ones that will put an end to our baleful, ruinous runs. In reality, though, we need not look at obscure sources for examples of the fact that every asset hides an Achilles’ heel in its core. In fact, we need to look no farther than Wikipedia, the most popular encyclopedia today, feeding the brains of millions every second, in search of an illustration of the fact that the greatest strength is also the greatest weakness. In this case, it is its complete openness, allowing anyone to edit its content, for better or worse, which makes it simultaneously a more accurate and less reliable information source than Encyclopedia Britannica⁴⁵⁴, notwithstanding that any encyclopedia can be reprimanded for its bottlenecking infinitely lively life stories into a ‘sterile style of writing’ as well as for ‘creating a false sense of authority behind the information’⁴⁵⁵, which breeds perfect grounds for dogmatic, ideologically totalitarian thought. This is all to say that, should we wish to make a step towards becoming a superman, we could just as well accentuate the intrinsic imperfectness of our being; for, the more angelically frailer we are, the more spiritually stouter and herculean we’d be too.

Speaking of mutuality of strengths and weaknesses in the realm of chemistry, as I recently had to describe the concept of strength of acids and bases to a group of students, I asked a boy and a girl from the audience to stand up and hold their hands. First I asked them to imagine that they are a macho man and a femme fatale looking at each other while, however, constantly flirting with the world and eagerly waiting on the chance to escape from each other’s arms, and then to imagine that they are a clingy and needy couple where the two rigidly stare at each other and neglect the many wonders of the world around. Whereas the former would be a depiction of an aggressive, strong acid/base, extremely prone to dissociation into reactive units, the latter would reflect a very weak and nonreactive one. And yet, as the Way of Love has taught us, the beauty lies along the middle Way, that is, in embracing each other with trustful and careful lovingness, although without ignoring the wondrous impressions of the world around us. Truly, if we looked at the acids and bases that life intrinsically utilizes as well as the drugs that humans consume, we would realize that they are practically always weak acids or bases. Proteins are, for example, made of chemically and physically intertwined amino and carboxyl groups, which act as weak bases and acids, respectively. Nucleic acids that store and regulate the genetic information within the cell are also composed of sequences of weak, so-called nucleo-bases and phosphate groups, the latter of which are used in biology as reliable energy-storage atomic groups in ATP and as buffers in the blood exactly owing to their comparative weakness. To reiterate the eternal validness of St. Paul the Apostle’s abovementioned saying, ‘When I am weak, I am strong’ (Corinthians II 12:10) in the sphere of nucleic acids, we may remember that genomic instabilities manifested as structural weaknesses that bring about proneness to mutation and malformation endow their bearers with longer survival of glioblastoma

compared to humans who carry firm, immutable signatures in their genomes⁴⁵⁶. Even superacids, which are sometimes billion times stronger than ordinary, mineral acids and able to ionize and break apart carbohydrates, are in reality very weak acids. It is the hydrogen bonded network of free protons and fluorine, the most electronegative element in Nature, that is responsible for their unusual and extraordinarily pronounced acidification effect. Hence, if one were to judge the strength of hydrofluoric acid, one of the strongest ones in Nature, by the extent of its dissociation, one could easily be tricked, erroneously concluding that its relatively high pK_a must be a sign of its weakness.

Be that as it may, just as the metaphor of the way and the Way of Love have pointed out, neither constantly holding hands with creatures we are fond of nor keeping them at bay and depriving us of their precious touch stands for the best choice. It is switching between the moments of selfless and intimate oneness and of bouncing away so as to explore the world in pure aloneness that hides the secret of truly fulfilled living, of rendering us capable of displaying wavy weaknesses that are the actual sources of strength, resilience and creativity in life. Needless to say, by offering one such metaphoric explanation, one makes sure that the principle pointed at will stay much more firmly anchored to the depths of the students' minds than it would have been achieved by an ordinary description in plain words. Highlighting a relationship existent in the microscopic realm as projectable in the social one is the key to ensuring that concepts described to students will remain firmly impressed in their minds. After all, even when we imagine these ultrafine, atomic and molecular events, we do it in terms of geometrical forms which we learned to recognize by observing daily objects. Demonstrating how a microscopic relationship is presentable by substituting its atomic actors with human ones thus greatly facilitates the learning process. Therefore, I smiled in sympathy when I noticed an Italian scientific duo beginning their review article on self-assembly phenomena at the molecular scale by referring to the relevance of the social principles Plato derived in his Republic to governing 'the controlled assembly of fundamental molecular modules'⁴⁵⁷. If the Nobel laureate, Richard E. Smalley, could compare interacting atoms and molecules with boys and girls falling in love⁴⁵⁸ when he said that 'much like you can't make a boy and a girl fall in love with each other simply by pushing them together, you cannot make precise chemistry occur as desired between two molecular objects with simple mechanical motion along a few degrees of freedom in the assembler-fixed frame of reference. Chemistry, like love, is more subtle than that. You need to guide the reactants down a particular reaction coordinate, and this coordinate treads through a many-dimensional hyperspace', and if barefooted and ecstatic Richard Feynman could compare diffusing atoms with mingling partiers at one of his lectures, why could not anyone else indulge in similarly inspiring analogies between any two domains of the physical reality? For, impressive metaphors as such lie at the heart of the systemic approach to understanding and developing human knowledge, springing forth from a belief that 'reality is a slippery fish that can be caught only with the hook of a metaphor'⁴⁵⁹, as Ursula K. Le Guin penned it.

Another example from the kingdom of chemistry could be offered at this point to corroborate this confusion over whether strength is strength or weakness and whether weakness is weakness or strength. This example refers to two allotropic modifications of carbon: diamond and graphite. Even though both of these crystalline compounds are made of carbon atoms only, they display quite a difference in the physical appearance, in the crystal structure and in the corresponding mechanical properties. Whereas diamond, the strongest naturally occurring material, is a lustrous insulator and the most popular gemstone over which wars have been waged for centuries, graphite is cheap, soft, dark and conductive. All this is due to the fact that whereas hexagonal graphite layers easily slide past one another due to comparatively weak van der Waals bonds in-between the layers, all carbon atoms in diamond are covalently bound, which contributes to its exceptional strength that secured its place at the very top of the Mohs scale of hardness. On one hand, this is to say that not what one has or starts with,

but what kinds of connections one builds between the elementary entities in possession defines how great the outcomes of our creative efforts will be. But a more relevant insight at this point of the discourse is the following. Namely, although most people would prefer to associate themselves with strong and brilliant diamonds, the synonyms for perfection in the materials science realm, there are still rare, insightful ones who would rather want to be epitomes of opaque and earthy-looking graphite, having recognized that whereas diamond mostly cuts through things due to its superior strength, graphite enables one to leave marks on worldly things, softly, without hurting them. Like the ‘heart’ of a pencil made of graphite that crumbles away when slid against the paper owing to the weak van der Waals bonds in-between the hexagonal layers, so may soft and essentially weak, not stony, hearts, filled with empathy and bleeding with love, be those that leave lasting impressions on the world and change it for better. When I compared acids to romantic couples a paragraphs or so earlier, some of you might have already begun to wonder if strength is actually weakness and weakness is strength, but now we see in an even clearer light that every form of strength is a weakness too, while every weakness could be turned into strength.

If we were to now suddenly switch our attention from the dance of atoms and molecules to the social sphere, all in the spirit of systemic thinking which crisscrosses the universe from its smallest to its grandest scales while holding the principles applicable in all of these domains in its hands, we could notice the following: all instances of aggressive behavior that aim at making someone else feel inferior are driven by insecurities and weaknesses flourishing on the soil of the bully’s spirit. Or, as Seneca noticed two millennia ago, ‘All cruelty springs from weakness’⁴⁶⁰. ‘Hurt people hurt people’⁴⁶¹ is another popular adage evocable at this point and as a calming thought anytime one becomes a target of hurtful behavior. For, if the person trying to hurt another has already been hurt, usually continuously, from the inside, then any thought of revenge becomes superfluous, leaving space for forgiveness and for a truly healing response to such malevolent acting. In turns, this also means that instigating the feelings of being victimized is the best way to put fuel on the fire of aggressiveness, as it could be exemplified by many individuals and social entities that all the way until the end of their violent streaks illusorily saw themselves not as attackers, but as defenders, even when they waged wars thousands of miles away from their home soil. Therefore, whenever we come to witness imposing powers bashing relative weaklings, we should remember that even the Third Reich perceived the invasion of Poland in 1939 and the ensuing genocide of Polish people as a defensive war a.k.a. *Verteidigungskrieg*, that is, as an act of retaliation against alleged Polish attacks of German territories along the border and the aggression against German minorities living on Polish territories, and that there is an undoubtable sense of inferiority of one type or another inhabiting the spirit of such superiors. On the other hand, following the lineage of the Montenegrin tradition of humaneness, defined as defending others from oneself, as opposed to heroism which is defending others from others, we could conclude that in those who restrain from aggression in any of its forms, physical, verbal, mental or emotional, lie seeds of true strength. Likewise, people who have grown accustomed to live under pressure of fear typically give an impression of mental might and stamina to an outside observer⁴⁶², again indicating weaknesses as lying at the core of an inflexible, stony strength. In contrast, those who come into view as naturally gentle and gaily buoyant in their gestures often live fearlessly, thus manifesting a powerful psyche standing in the center of genuinely agile and seemingly ‘weak’ acting, akin to that of a ballet dancer, on the stage of life.

Another familiar example pertains to a politician criticized for having lost a battle against his political opponents that had been seen in the past as threatening for the peace and prosperity of the region by the international community. As he walked away into the shadow and relinquished power to these nationalist newcomers, he became accused by one, pessimistic side for diluting the path of the

ongoing democratization by inviting everyone under the hat of the reigning regime in his attempts to pursue an authentic middle Way approach, while the other, more optimistic side praised the presumed ‘domestication’ of the nationalist parties during the time of his governance and their inevitable continuation of the path of democracy and tolerance, something that may not have resulted had he opted for ignoring their voices and keeping them consciously outside of the spheres of relevance, as politicians in hold of power often choose to do. Yet, in this, as in every other complex ethical case, there are no perfect, spotless solutions, except to fairly place pros and cons side by side and analyze them in an unbiased fashion. Whatever we choose, we may be sure that cons of our choices will be there to stay, not to be ignored, but to be openly acknowledged as something inevitable and in need of focusing our creativity on in attempts to solve them or at least improve the unfavorable conditions brought about by their means. For, that is how the world is made a better place: not by relishing in the taste of success produced by our judgments, but by humbly devoting ourselves to exposition and resolution of their adverse side effects. After all, what drives the evolution of our realities are not illusorily attainable perfections of our creative decisions, but the inescapable imperfection of even the most hypothetically perfect actions of ours.

Endless examples of solutions and pathways whose one arm points one way and the other one points to its opposite may be mentioned, of course. For, the symbolism of Ys⁴⁶³, simultaneously being emblematic of the interplay between unity and diversifications, and signifying the questions of an ultimate wonder that start with a ‘why’, altogether with eyes in which this wonder floats, seems to be depicting the nature of any type of progress in life.

To get back to the aforementioned example of writing the book, someone may observe that with transforming thoughts into letters, the former are being killed, for after their lively and incessantly fluctuating existence in the author’s mind they have now received a final and unchanging form. But I will tell you that, on the other hand, the same thoughts have been given life, for they now can be released as divine messenger birds that can continue to communicate their meaning in the live substrate of the constantly developing human knowledge and being. And if you tell me now that writing is a form of communication and that living in an urban environment filled with an overwhelming clamor arisen out of a dense network of social interactions is beneficial for writing fruitfully, I might, nevertheless, remind you that just like playing a pair of beautiful songs at the same time degrades the beauty that we may discover in each one of them, too much of a ‘good thing’ can suffocate our inner sense for artistic inspiration and expression, the reason for which a balance between desolation and interactivity, as described by the Way of Love, is what we should always aim to sustain. We need to find an equilibrium between writing from the depth of our mind and soul (and thus essentially for none other but oneself only), and writing driven by the sense of love and empathy (and thus essentially for the sake of enlightening others). In fact, rarely has the history of human sciences and arts found the most productive beings immersed in the hearts of big cities, despite the fact that their hearts have often been inclined to and dreamt about the magnificent ‘city lights’. The final verse of a song that Bob Dylan, its author, once proposed as the American anthem thus goes: ‘Right now I can’t read too good, don’t send me no more letters, no, not unless you mail them from desolation row’⁴⁶⁴. Thus we come to an important point, which is that dreaming of greater ways of being and pining for moons instead of being able to lasso them and perfectly satisfy the profoundest of our yearnings is what makes human creatures most productive in life.

Systemic nature of human thinking as stemming from the co-creational thesis

‘Therefore speak I to them in parables: because they seeing see not; and hearing they hear not, neither do they understand.

And in them is fulfilled the prophecy of Esaias, which saith,
By hearing ye shall hear, and shall not understand; and seeing
ye shall see, and shall not perceive: For this people's heart is
waxed gross, and their ears are dull of hearing, and their eyes
they have closed; lest at any time they should see with their
eyes and hear with their ears, and should understand with their
heart, and should be converted, and I should heal them. But
blessed are your eyes, for they see: and your ears, for they
hear'

Matthew 13:13-16

'Way and weighing
Stile and saying
On a single walk are found'
Martin Heidegger⁴⁶⁵

As we could have seen by now, one consequence of the concept of co-creation and the ubiquitous symbolism of the Way lies in the fact that it takes a pair of entities to produce any novelty in Nature. Among other aspects of this thought, it also takes at least a pair of observational perspectives and at least a pair of ideas to come to a novel observational perspective and a novel idea, respectively.

In that sense, we should recall that the process of creative thinking is metaphoric in general. We typically arrive at novel ideas through the process of their assembling on a different plane compared to the level at which the ideas that inspired this thoughtful process have existed. Watching a natural event in our surrounding can thus impel us to copy the relationships present in the observed interactions onto relationships between a set of entities on an abstract plane. For example, should I realize that the existence of the trunk, the leaves, the flowers and the fruits of a tree depend on its invisible roots, I might go ahead and link this observation with a more abstract one, which would be that metaphysical and spiritual grounds are crucial for the existence of any palpable physical observations and creative accomplishments. If I then learn that roots of trees often occupy significantly larger volumes than their visible treetops, this could be a sign that these invisible, spiritual foundations of existence are incomparably greater and more important than the visible orders that they support on their shoulders. The next thing I might notice is that trees, especially the tall ones, need to constantly evaporate water off their leaves in order to sustain the osmotic pressure that pulls the water upwards, from the roots to the treetops, all through the xylem, this may mean that the most precious food for life needs to be constantly dissipated into clouds of fancy - which would go on to deliver their watery contents to some other thirsty trees - if we wish to be watered well on the inside. And so, step by step, any single tree in this world could prompt us to derive whole philosophies of life. Here comes the intrinsic beauty of science too, for, subjected to imaginative scientific scrutiny, any physical object or event could be the starting point for the deduction of an infinity of insights applicable to almost any domain of our being – psychological, social, spiritual, you name it.

We now know that ordinary natural relationships have inspired generations of thinkers and prophets. In the end, that is, in the beginning, philosophy must have arisen from rather unphilosophical observations of natural events that surrounded the early humans. Then came a whole lineage of systemic philosophers, spanning from the philosophers of ancient Greece and Orient to Leonardo da Vinci, Albrecht Dürer, Galileo Galilei and other Renaissance figures to Johann Wolfgang von Goethe to Gregory Bateson, and so forth⁴⁶⁶, to whom it seemed impossible to isolate their creative interests and confine them into sole fields of science, arts, philosophy or narration. They were combining, crisscrossing and mutually influencing all these fundamental areas of human inquiry and creativity. Those who have done so know how tempting it is to fall into despair by observing how one does not fit

anywhere by actually fitting everywhere. Exhausted by working hard to keep abreast with all this immensity of things that fall into the ranges of their interests, these systemic thinkers of the present and past must have looked at times, as I, myself, do, with envy at those whose entire universes of thought revolve around single subjects of inquiry. Yet, in the long run they must have sensed that being systemic is a gift from God and a colossal responsibility that cannot be trifled. As a result, this inability or unwillingness of theirs to become truly specialized in anything never managed to immobilize the brilliant ideas and creativity that they exhibited.

As a matter of fact, such lucid systemic thinkers whose thoughts and interests incessantly hopped from one field to another typically incarnated the ideal envisaged by the Christ in his parable of trees whose fruits are either always sour and tasteless, irrespective of the season and other conditions of their growth, or always sweet and savory, independently of the domain of knowledge to which they contribute therewith: ‘A good tree bringeth not forth corrupt fruit; neither doth a corrupt tree bring forth good fruit... Either make the tree good, and his fruit good; or else make the tree corrupt, and his fruit corrupt: for the tree is known by his fruit’ (Luke 6:43... Matthew 12:33). In other words, whether we come across their talking about cosmogony, psychology, the theory of arts or their own scientific or other fields of professional expertise, there is a chance that something extraordinarily valuable could be picked travelling through the air on the waves of their worded thoughts.

In being such a profound transdisciplinary thinker ahead of its time, Leonardo da Vinci in his treatises frequently jumped from one topic to another, so that instead of sifting the topical ideas, revolving around a specific theme or chewing single points until they become dry as the desert sand, his thoughts flowed in eternally fresh and wholly unconstrained ways. He would draw a picture to illustrate one thing, but then instead of continuing the discourse, the drawing would remind him of another relationship that he would then start analyzing, arriving at novel ideas in the further course. This can be hypothesized to have been the result of the Renaissance artist’s ability to hold a pair of mutually exclusive, paradoxical ideas in his head⁴⁶⁷ and branch out his creative approaches from this dialectical kernel of thought into many different directions, according to his insatiable multidisciplinary interests. Of course, such deliberate crucifixion of one’s mind between multiple railways of vision and thought stands for a powerful precursor of systemic, open-minded thinking that transcends the artificial divisions that our worlds abound with and looks after discovering grand syntheses of the most conflicting directions of thought conceivable, yielding not pugnacious bigotry, but blissful births of the spirits divine thereby, as in accordance with the Christ’s saying, ‘where two or three are gathered together in my name, there am I in the midst of them’ (Matthew 18:20).

For this reason, do not mind if I, like the great Italian master, also every now and then jump away from a given theme and subsequently return thereto, resembling the Little Prince in his curious hopping from one planet of human worldviews to another. Like Luis Buñuel, who in his autobiography ‘often wandered from the subject like a wayfarer in a picaresque novel seduced by the charm of the unexpected intrusion, the unforeseen story’⁴⁶⁸, so do I never hesitate to stray from the central stem of the discourse and develop a sideways branch, knowing that only in such a manner may stale stalks of thought turn into opulent trees of knowledge. For, such, helplessly adventurous, is the nature of us, systemic philosophers. To transform our being into a godlike sun of a thinker, we need to send the rays of our attention in all directions at once. After all, staying within the boundaries of single perspectives and disciplines produces a plethora of blind spots in our knowledge, diminishing it slowly and imperceptibly, whereas incessantly hopping back and forth, from one cognitive panorama to another, just as the Way of Love has instructed us, being constantly lost and found, is the way to replenish the rivers of our intellect and spirit alike and keep them evermore fresh.

And when one's head begins to resemble a firework of mutually fertilizing ideas that often fall into most distant disciplines or realms of thought, it is difficult or maybe even impossible for one's verbal expressions not to reflect this fascinating epistemic versatility by tirelessly jumping from one of its planets to another in one's limitless universe of thought, finding thus a neat metaphor in the journeying of the Little Prince, as described by its father, Antoine de Saint-Exupery. Intrinsically glad I am when I produce writings that resemble concise and yet infinitely broad discourses because not only do they clash with the dully predictable and narrow essays released by the mainstream publishers of the modern day, but because they also more neatly reflect the nature of human thought, constantly losing itself in the sea of analogies while still concisely drawing a logical thread of thought. For, just like neural signals in the brain branch into always novel and unrepeatable directions as they journey between two points, so must be with the natural pattern of thought. This is why I have claimed that if I were a movie director, my camera would resemble that of Jacques Tati in *Playtime* (the piece of art that I may sometimes refer to in order to quench the reviewers' rage upon getting lost in the perplexing forest of thought that my written works are, a forest from which only the bravest and the most intellectually salient ones will emerge to light at the end of it), constantly drifting away from the protagonist and yet following its story carefully, alternating between the fosterage of the adventurous spirit of moving beyond oneself so as to expand one's boundaries and the homecoming joy of returning to the starting points of one's journeys, being lost and found and found and lost and so on and on.

Oh, how convinced I am that the future days will witness nowadays unimaginable interdisciplinary crossings of perspectives, ideas and scientific methodologies. Until now, fruitful cross-disciplinary approaches have been limited to relatively close fields only. For example, the discovery of DNA led to the productive merging of chemistry and biology within the fields of biochemistry and molecular biology. The invention of quantum calculus gave rise to some of the most fruitful entwinements of physics and philosophy ever witnessed. It was a revolution for science in general when entropy, once defined as the irreversibly transferrable portion of the heat content of a system, got described by Ludwig Boltzmann statistically, that is, as proportional to the number of ways by which a given state of the system could be reached. Of course, the more mysterious the aura surrounding a concept in the sphere of our knowledge, the greater the potential for its redefinition into something that would yield an enormous intellectual excitement, as could be exemplified by the very concept of entropy, thought of as 'notion that may repel beginners as obscure and difficult of comprehension' (J. Willard Gibbs), 'a shadowy kind of concept, difficult to grasp' (James Johnstone), 'a concept that is most difficult to understand in the whole field of physics' (Francis Sears), 'a concept that will have to be taught for several generations before we can expect beginners to receive it as axiomatic' (James Clerk Maxwell), and 'the concept nobody knows what it really is' (John von Neumann) by the very scientific pioneers who postulated its existence, spent their lifetimes teaching it or used it as cornerstones of their ontological worldviews⁴⁶⁹. And such use of one language to describe phenomena represented in another should not be prevented and disvalued at any cost as it normally is nowadays. For, invariably, any proposer of a model that is conceptually new down to its deepest cores and is adequate to seeing a physical domain with a whole new set of eyes is bound to be labeled as a lunatic. A recent example comes from the concept of the microbiome, that is, of analyzing bacterial disease as a statistical imbalance from a state of harmonious, symbiotic coexistence of tens of thousands of microbial species within each infected tissue. The claim that infection is not primarily due to the propagation of an opportunistic pathogen, but that it is due to a reduction in the population of another opportunistic pathogen, which should have been present in healthy concentrations in the given system, nowadays presents a common premise in the field of microbiome, but only a decade earlier it would earn the person behind this claim the title of a holistic/hippie looney. And as ever before, the fiercer opponents of

this model a decade ago, who would have mocked its inventors for the ridiculousness of their ideas, are now its biggest promoters, filling their pockets with exorbitant amounts of money from the research investors on the account of turning the model into yet another fad. Deep down, of course, this resistance to the conceptual novelty of models with which we describe Nature originates from the unquestioning embracement of objectivism and ignorance of the pragmatic view of science. Based on this latter view, no scientific hypothesis represents a truthful reflection of the systems it describes, but only one of the endless number of ways to draw a convenient model that ‘works’ in the context of the mutual coordination of human experiences.

Thomas Kuhn’s famous book on paradigm shifts in science awoke interests in the intersection of science and sociology. The current requirements to adopt ecological and sustainability principles in each aspect of human creativity give rise to many ‘green’ fields, such as green chemistry, green economy, and the application of complex mathematical techniques in ecological modeling. Constructivist models of perception led to the encounter of mathematics and cognitive science, whereas a parallel surge in the interest for quantum physics and Oriental philosophies initiated blending of physics and psychology, as epitomized in the popular works by Roger Penrose, Gerald Edelman, David Bohm, Fritjof Capra and Gary Zukav. Pythagoras proposed connections between music and math, thus stepping forth as one of the first great thinkers to walk along the Glass Bead Game road where science and arts dwell in each other’s arms. Once archeologists realized that the way some of the ancient architectural structures were built could be explained by the periodicities that typified the celestial sphere that hovered over the builders’ heads, a new field was born as a blend of architecture and astronomy, the sciences of earthly and heavenly orders, so to speak, respectively: archaeoastronomy. The mathematician and physicist, Leonhard Euler figured out the solution to the famous problem of how a knight could cover all sixty-four squares of the chessboard without stepping on the same square twice and used it to set the foundations of the graph theory, demonstrating links that exist between chess and math. However, one could reasonably observe that we still do not see some of the most exciting and distant fields merging. For, the greater the distance between any two given fields, the greater the chances of failure in one’s attempts to weave fruitful connections between the two.

Still, some fascinating examples of cross-disciplinary fertilizations of ideas do exist⁴⁷⁰. For example, the theological principle of *via negativa* and the philosophical argument of inaction (related to the fact that every confirmation comprises an implicit negation and every definition of a quality comprises an implicit definition of its opposite, and *vice versa*) have been applied in designing the so-called negative databases which store information similar to the way the immune system does, that is, by excluding everything that does not match its definition of the self. The areas of theology, philosophy, neuroscience, and computer science were thus merged into one. Then, a computer program used by surgeons to simulate the interiors of the patient’s bodies has been shown as an effective tool in visualizing and predicting star and nebula formations, leading to a productive blend of medicine and astronomy and pointing at similarities between the order at microcosmic and macrocosmic scales. On the other side of the spectrum, image-analysis software developed for an automated analysis of large collections of astronomical images has been demonstrated as usable for the analysis of sequences of images of stained tissue samples. This algorithm used to recognize faint celestial objects such as distant galaxies, nebulae or clusters of stars has, for example, been shown as surprisingly applicable for the detection of ultrafine pathological abnormalities in biological samples⁴⁷¹. Then, the discovery of the experimental technique of electrospinning, which is used nowadays to fabricate the great majority of tissue engineering scaffolds, is owed to the casual chats between a polymer specialist and his colleague who worked on textile materials at the time along the hallways of their university, during which the idea was born that a variation of the method used to spin textile fibers could be applied to biomedical

polymers. As I was about to engage myself in teaching astronomy at the University of San Francisco while being employed in the school of dentistry at University of California, San Francisco, I amusingly noticed that I was given a most difficult cross-disciplinary task: to connect dental science with astrophysics and cosmology, which may at first sight seem as two thoroughly non-linkable domains of human knowledge. I did not know back then that a year or so later the expertise in materials science that I strengthened in the dental school would bring me on the brink of an offer to work on characterization of moon dust in the materials science department of San Francisco State University. Yet, despite holding two seemingly non-connectable fields, one in each hand of ours, I have known that through metaphors and analogies, parallels between any two domains that we focus our attention on could be found. Ideally, then, insights from one field could be translated into guiding principles for our explorations in another domain, leading to new insights therein. A wonderful feedback loop between the two that helps us navigate the ships of our knowledge better in both of these domains can thus be established. In view of that, the basic knowledge of the systems theory and a more pervasive embracement of the systems approach, which relies on an intensive application of metaphors and analogies in deriving novel ideas, might provide sufficiently stable bases for coping with the contemporary challenges of linking even seemingly too distant and non-combinable scientific fields. Here as well the magnitudes of risks and of potential discoveries are well equilibrated, which is the reason why only the bravest and the most determined are prepared to enter the arena of unimaginably exciting cross-linking of diverse fields of human inquiry. This may explain why Abdus Salam argued that ‘being multi-disciplinary is a cross that all those living in the developing countries need to be prepared to bear’⁴⁷².

Our minds should be, as some may say⁴⁷³, akin to tables with stable legs, grounded upon a special field of inquiry, while having a wide top on which many subjects of interest could be placed. Should we become one with overly bulky legs and no flexibility to spread the arms of our curiosity and find the room for novel ideas and interests on top of the \top of our mind, we would resemble a rigid stick with a narrow range of efficiency, whereas if the legs are too thin and the top spreads too wide, there will be a risk of the table flipping over. In the former case, we may approach the fate outlined in the following words of Norbert Wiener: ‘We may be facing one of those limitations of Nature, in which highly specialized organs reach a level of declining efficiency, and ultimately lead to the extinction of species. The human brain may be as far along on its road to this destructive specialization as the great nose horns of the last of the titanotheres’⁴⁷⁴. But should the latter scenario prevail, the civilization could be brought to the edge of a breakdown because the philosophers would be too many and there would not be those with enough patience and determination to focus onto single subjects of study for a long time and discover their petite charms. Attention to detail and endurance in dedicating our time to research within special fields of interest is what prevents one from being ‘a jack of many and a master of few’, so to say, and from exhibiting encyclopedic knowledge without being able to draw the systemic, Confucian threads that link to it all. No doubt that all the brilliant scientific and artistic minds have succeeded in balancing the strengthening of the legs of specialized creativity with widening the breadths of general, systemic knowledge. For, after all, these two – specialized insight and general knowledge – do not impede, but actually propel each other along the tracks of human creativity. This is because the realizations we come up to by focusing on small details in our explorations of the world metaphorically speak to us about the great secrets of our lives and the Universe, whereas those great secrets, applicable to an endless number of various natural systems owing to their systemic nature, help us successfully guide the research of ours at a fine scale.

For this reason, Alfred North Whitehead claimed that ‘the balance of mind reflected in the union of a passionate interest in the detailed facts with equal devotion to abstract generalization has now become part of the tradition which infects cultivated thought. It is the salt which keeps life sweet’⁴⁷⁵.

And in order to be the Evangelical ‘salt of the earth’ (Matthew 5:13), so rare on this planet now, and share with others the knowledge that inspires through its balanced breadth and fineness, we should watch out neither to become too specialized in our own professional field and thereby lose the ability to find the place of our deeds in the wider web of life nor to become too much of a fruitless proposer of overly simplified general theories. We should learn how to majestically swim and float on the surface of things, and yet patiently dive into dark depths of the ocean of knowledge where all the precious pearls, treasures of sailboats sunken long ago and the remnants of Atlantis lie hidden.

This explains why since the earliest days of my career in science I have been eager to plunge into detailed and rigorous research as much as to enwrap these and other relevant findings and thoughts that have come from all over the world into visionary landscapes of my books and critical review papers. Even though none of my former advisors had sympathy and understanding for the meaning of putting up such critical reviews of subjects at hand, I have never ceased to balance the two activities in my academic work and would have considered dedicating myself exclusively to synthesizing new knowledge based on an enormous amount of mutually disjointed data scattered across the literature had it not been for the fact that my university paychecks have been justified by my research efforts solely. With so many young scientists today turning into data-cranking machines, feeling overwhelmed by the amount of published data on practically any scientific subject out there and incapable of properly contextualizing their research efforts, thus letting their sciences float like bubbles disconnected from everything else, and with funding agencies finding no merit in anything but practical findings, ignoring the big picture within which science evolves, I have indeed wondered if experiments are superfluous and if there is just enough data out there, having been already published, for an inventive mind to collect them and derive meanings that have not been derived before or provide a direction for research that has skipped everyone’s attention. Needless to add, such a balance between analytical and synthetic research, which I see as a genuinely Renaissance one, is rarely witnessed among the modern scientists and philosophers who are normally prone to be inclined to one of the two sides: specialized research or systemic contemplativeness. Although many times I have been warned that I am risking the prospect of my professional career by clandestinely spending time writing review papers or that I am risking living fully up to the potentials of my synthetic predispositions by swimming in analytical waters of specialized research, I determinedly walked along the middle Way, knowing that each of these poles provides vital insights that feed the other. For, as I have believed, lucid generalizations may be possible only insofar as one has collected enough experience in single research fields, whereas successfulness in conducting specialized research projects largely depends on our ability to connect the latter to wider, systemic and metaphoric domains of knowledge as well as to grasp a bigger story of life to which our research ultimately belongs. Although many, if not most, of my coworkers and mentors shared the opinion that one should begin synthesizing one’s knowledge and focusing on review papers only after one becomes a prominent figure in the field, I have held that this balance between analyticity and synthetic knowledge should be instigated in scholars from an earliest age. One of the reasons is that young people tend to be optimistic and visionary, spontaneously opening paths for the future in their innocent dreaming, whereas grownups in the field oftentimes substitute this juvenile enthusiasm with intellectual weariness and disbelief in profound change. Needless to add, my review papers never lived up to the ideal of boringly piling up other people’s achievements and writing just so as to collect points for the tenure. Instead, they always tackled and tickled the horizons of current knowledge, representing me standing at the seashore of the latter, gazing at the sea of the unknown stretched before me and providing visions for the future.

That human mind can be divided to a hemisphere that is capable of pattern recognition and holistic reasoning and to a hemisphere that is equipped with the mastery of logical, detailed and factual

thinking has been known for a long time. However, research based on Myers-Briggs personality type indicators has shown that aging is associated with the tendency of the intuitive element of our minds, which corresponds to understanding through analogies, to eclipse the sensing element, which corresponds to sensory exploration of perceptual details of our experiential reality. Ninety percent of graduate school teachers have thus shown to be predominantly intuitive types versus 70 % of college teachers, 50 % of K9-12 teachers, and only 30 % of K8 level teachers⁴⁷⁶. Apparently, not only does such a trend indicate an increased 'living inside', within the realm of our thoughts, rather than 'outside', freely exploring the immediately available perceptive stimuli, as we progressively grow older, but it raises an important question; namely, how can teachers who have lost touch with their sensing nature and have learned to rely primarily on the intuitive one establish a communicational excellence with their pupils who tend to ingrain the opposite personality imbalance? The answer, as usual, lies in resisting the fall into extremes and rather sticking to the balance. Although once we realize that we have become too much inclined to one or the other side, reaching the balance may seem as difficult and awkward as writing with our left hand, provided we are right-handed, but we should not stop trying before we reach the aim of intellectual ambidextrousness and equally rely on the powers of metaphoric reasoning, of thinking in terms of wholes, and of detailed exploration of perceptive boundaries, of thinking in terms of particulars.

Many people have, however, in the defense of pure logic argued that the use of metaphors in thinking is blurring the clarity of human reasoning, and as such presents the attribute of schizophrenic minds only. But the metaphoric aspect of thinking is an inescapable feature of any human creativity, scientific or poetic. Even the greatest scientists have regularly applied analogous reasoning in finding solutions to investigated problems. Albert Einstein realized that the physical qualities of a system in relation to certain observational frame should be modified as the system approaches the speed of light while he was riding on a Bern tram and moving away from the city's clock tower⁴⁷⁷. Archimedes realized that the volume of an irregular object could be calculated by measuring the volume of water displaced when the object is submerged in water while he was taking a bath. Descartes came to the idea of Cartesian coordinates as he watched flies buzzing in a top corner of his room⁴⁷⁸, while Nikola Tesla, who, as the Serbian-American inventor himself noted in his autobiography⁴⁷⁹, could hear a thunder strike more than seventy miles away, the ticking of a watch three hotel rooms away and the dull thud created by flies alighting on tables, arrived at the idea of induction motor, wherein a rotor spins in a rotating magnetic field produced by two alternating currents out of step with each other, during a walk through a park in Budapest, as he glimpsed the setting Sun in the distance and his lips uttered a verse from Goethe's Faust: 'No wing can lift me from the soil, upon its track to follow, follow soaring'! The vision of a soulful sun setting and a sunny soul rising presumably yielded the image of opposing electrical currents from which one of Tesla's most memorable inventions was brought to life. Imagination could thus be said to present the source of the streams of creative thought that run with their rivulets and waterfalls all through a busy scientific mind. Or, as Henri Poincaré noticed, 'Pure logic could never create anything novel, nor would any science be able to arise out of it only'⁴⁸⁰.

In fact, there are many indications that any common instances of reasoning and sensing involve the use of analogies. For example, analogies, not strict causal chains of logic, are involved every time an impression coming from the outer world becomes associated with a pleasant or unpleasant event from the memory. Each interpretation of an artistic piece, whether it is a painting, a musical work or a piece of literature, is based on understanding the observed relationships as metaphors of relationships existing in our very lives. Each time we become deeply moved or driven to tears by a piece of art, it is because we found striking metaphoric parallels between the given artistic piece and our lives. In fact, if analyzed

deeply enough, each intelligible and truly meaningful impression could be seen as composed of a blend of logical and analogical threads of reasoning.

A radical thesis that can be proposed at this point would be that human brain actually presents a biological device for computing metaphors, and that it is exactly this capability thereof that made it superior compared to the remaining living species throughout the evolution. As a tentative proof of this thesis, we could always resort to the fact that scientific concepts taught in the classroom stick to the students' heads with greater ease if they are accompanied by illustrations of their analogies in the realm of everyday experience. This, of course, is merely a large-scale reflection of the way learning proceeds at the finest cellular level: through 'making associations and remembering them'⁴⁸¹. Neuroscientists may then be able to tell us that this is why fusiform gyrus, the area of the brain located as a crossroad between sections of the brain that regulate vision, hearing and touch, where the synaesthetic, analogical thought, which all the creative minds all the world over have been gifted with, is thought to be churned out, is eight times bigger than in other higher primates⁴⁸². Intensification of analogical thinking in the sphere of our psyche can thus be seen as occurring in parallel with our rise, as humans, along the evolutionary ladder and distancing from our animalistic predecessor and approaching our angelic successors that this process entails. For, the ability to reflect on one's own thoughts and perceptions, being the basis of creative thinking, is the privilege of humans in the animal kingdom, and it can be said to stand at the root of analogical reasoning, which is based on finding parallels between relationships drawn at different levels in the microcosm of our thoughts. 'To move from the personal to the universal', is how Francois Truffaut's Antoine Doinel described his poetic mission in the movie *Bed and Board*, and all of us who live for the little glitters of enlightenment that dawn on us each time we glimpse the most ordinary relationships and recognize in them the relationships of cosmic significance find ourselves walking on the same path, the path that, as we see, is the one distancing us from the narrow confines of ego and all that is carnal and primitive in us and brings us closer to the man of the universe with none but universal insights overflowing his heavenly heart.

One of the reasons why the mechanism of human cognition presents one of the biggest mysteries of science may be tied to the fact that there are no pictures as such stored in the brain, but all thoughts are actually derived through picturesque associations. Even learning the rules of logic that later become incorporated in all the aspects of human reasoning could be seen as dependent on the human ability to metaphorically link abstract and concrete relationships. Nature triggers the processing of perceived images through analogical associations, but how far these processes of a continuous mental reorganization will go intrinsically depends on human imaginative creativity. It is worthwhile to notice also that exceptional reliance on analogical inferences is the trait of not only geni, but of madmen too, that is, of people who randomly and nonsensically correlate distant concepts and ideas, but such is the nature of life: every sword in it is a double-edged one.

This is why we have no other choice but to indulge in analogical thinking unconditionally, in spite of the fact that it typifies lunatics as much as dreamers, for, after all, walking on the most exciting and prolific paths in life is bound to bring us every once in a while close to the edges of towering cliffs and gaping abysses. At the same time, of course, we are obliged to remain faithful to what is expected from a soul gifted with the capacity of analytical thought: to trace ideas like individual beads on a long thread of cause and effect. In other words, the synergetic simultaneity of logical and analogical thought praised on these pages equals the call to be sane and insane at the same time; to burst through the boundaries posed around and within thee, yet remain faithful to the surrounding souls and to thine innermost self; to bounce back and forth across the stellar sphere of celestial fancy, yet remain bound to the earthlings with all thy heart, for sooner or later a day will come when you would realize that each

one of them individually, in the purest of its conceivable forms, could not exist without its antipodal complement.

Be that as it may, the basis of creative thinking inevitably lies in a harmonious combination of logical and analogical relationships. Logic that spreads horizontally has its obvious limits, ending with some 'visible horizons', whereas analogies and metaphors, spreading vertically, are limitless in scope and potential, as an infinite number of relationships could be derived from a single link, even if it is nowhere as profound and all-encompassing as that Confucius' thread that connects to all the other threads in the world. This distinction between horizontal and vertical thought processes can be traced back to the division of scientific process to 'working science' and 'science philosophy and innovation' proposed by Gordon Pask, the former of which proceeds strictly via 'logical consistency and factual truth' and is unable to engage in Peirce's abductive reasoning needed to yield hypotheses and inventions, while the latter of which has 'analogy construction as its major mode of reasoning'⁴⁸³. Alongside agitatedly naming science that equates itself with 'working science' only 'ugly', Pask also correctly observed that 'apart from serendipitous results, abduction is the only way in which the organizationally closed system of science is informationally open. Abduction or analogy construction is the foundation stone of all discoveries; neglect it, and science is autonomous, but pointless'. This is to say that we could serially, incrementally enrich our knowledge by logical means, but deriving and understanding a new concept is possible only through the application of an analogy; hence a sense of enlightenment arising as the result of imaginative analogical thought process. Consequently, the discovery of new ideas can be thought of as happening exclusively along the corridors of analogical, metaphorical thought.

Prior to the rise of the branch of physics called mechanics, Archimedes' wonder was focused on a simple lever and at some point he must have asked a revolutionary, essentially systemic question: Could it be that the principles I see as governing the motion of this lever are relevant for explaining the behavior of all natural objects? As the world of statics was born out of this question, his later comment, 'Give me a place to stand and with a lever I will move the whole world', could be apprehended in a thoroughly new, systemic light. Likewise, long before the law of gravity was fuzzily drawn in Isaac Newton's head, the legend tells us that he marveled over an apple falling off a tree and hitting the ground. It is these small insights that hide enormously ornate findings and can be fertilized by the power of human imagination all until they yield great systems of knowledge that gradually begin to change the face of the planet first and human spirits thereafter. For this reason, systemic reasoning can be on one hand considered as inherent to scientific thinking. On the other hand, systemic knowledge can be seen as the celebration of smallness in the kingdom of reason. Now, not only do systemic insights begin from plucking small and typically unnoticed experiential details from the dust of neglect and then expand their relevance all until they encompass the universe as a whole, but this systemic knowledge itself is yet another thing that craves for the bravest thinkers of the modern age, unafraid of being reprimanded for playing with what many consider to be epistemic superficiality when they could be deepening the fields of their specialization, to tweak it from the ground where it has been stomped by many and elevate it to stars, and, if you look close enough, you will realize that this very thought packed into this complex sentence stands for yet another of such systemic insights that spread our views from the evanescently small to eternally great. Finally, through a crisscross combination of analogical and logical inferences, each amusing detail of our worlds could present a first step on our climbs to the Great Pyramids of a kind, leading us to apexes of knowledge whereupon the all-illuminating eye of wisdom awaits us. Moreover, this point of view clearly demonstrates that the first step is often the one that determines the excellence of our entire journey. After all, it is from the seed of inspirations and aspirations brewed within the melting pot of our heart that the stems, branches and fruits of our tangible being grow. The

quality of this teeny tiny seed can be thence said to vitally determine what the whole tree of our knowledge and being in the world will be like. Or, as the Christ's final message during his Sermon on the Mount outlined (Matthew 7:24-27), foundations are the key to the stability of any construction conceivable, from our intellectual concepts to our reaching out to the neighbor to the sustainability of our very physical being in the world.

As we see, systemic thinking is vital for the healthy branching of human knowledge into innumerable fruitful directions. For, whenever the rise of a new discipline is glimpsed on the horizon, thinkers of our times could be found seized by the general questions arrived at by following the inductive threads of logical reasoning. For example, mathematics, a discipline whose adoration of mine could be explained by my seeing it as an intrinsically systemic field of human study, can be said to have been born at the very moment when one realized that, instead of determining a straightforward answer to a particular problem in question, one could create one or a whole set of equations that describe any given instance of the given type of the problem, showing us how a long and winding road that starts from a point of origin and then encompasses the whole Earth before arriving at its destination, connecting points that might have rested within arm's reach from each other via the very infinity, is sometimes more rewarding than making a swift and immediate step from the starting point of our journey to its neighboring endpoint. Or, as the wisdom of the Little Prince could remind us over and over again, 'Whoever travels strictly straightforwardly does not reach far'. This is exactly what the effect of catalysis in chemistry shows us too: heading straight across the energy hill that separates a reactant from the valley at which the reaction's end lies, along the shortest path possible, brings it to its destination with far more effort and far slower than taking the catalytic route, which imposes a winding, more indirect and, in terms of the physical distances crossed, longer path composed of multiple, though smaller hills. In other words, facing away from our destination and choosing a crooked road that takes us out of its range, as it is bound to seem at first, is the fastest and the most elegant way to arrive at it. And so, once again, a petite insight from the real life has inspired us to draw a conclusion of general importance, which, in turn, could be applied in guiding the evolution of the whole wide world, including a little thing that triggered this avalanche of systemic thought, towards ever more enlightening horizons. After all, systems science, to which my intellect has been mysteriously drawn ever since its effervescent and pearly superego stepped on the Glass Bead Game road for the first time, is all about providing descriptions relevant for an infinite number of natural systems instead of dealing with a single system that happened to be the focus of our attention. To subject particulars to scrutiny and then to protrude into secrets of the Universe through their strait gates is what comprises the essence of the systems approach. In such a manner, I could talk about microscopically miniscule things and yet make my words embrace the entire creation with their limitless relevancy for all that is, following an approach to enlightening the world as elegant and humble as the kingdom science in its heart is.

An important implication of the analogical element of creative thinking is that in order to be successful in implementing it, we need to be partly engaged in careful exploration of the finest details of the observed systems and partly immersed in the inner sphere of our randomly and intuitively swirling thoughts and ideas. Because, if we become overly focused on discerning the finest outlines and intrinsic boundaries of the systems we explore and thereby neglect to ride on the creative sea of ideas that alternately arises and vanishes within our mind, washing over us with waves of inspirational tide and then crestfallenly retreating with an ebb, our ability to find inspiring metaphors would be diminished. We would in that case become too prosaic, unimaginative, overly realistic and mentally lazy. But the same effect on our creativity would be exerted should we turn out to neglect the importance of diligent exploration of the fine details of the world and become overly amused by the flights of imagination taking place in our heart and mind. This is the way to become autistic, unproductive and physically lazy.

In the balance of physical and mental diligences lies the secret of creative thinking and acting. As in the aforementioned Meša Selimović's parallel between the river and his being, in order for our mind to flourish with creativity, one hemisphere of our mind has to be like a river, free and ebullient in its fancy, while the other hemisphere resembles a windmill, punctual, disciplined and practical in its workings.

Thus, as the Way of Love has already pointed out, whatever we do, in our professional fields or daily communications, a part of our being has to firmly stand as one with others, carefully exploring every tiny detail of the surrounding world, whereas the other part ought to be dwelling in the depths of our own heart and mind. Whatever we engage our creativity into, a part of our being has to be deeply and carefully immersed into the analyzed details, but the other part has to be distant like a flying bird gliding across the sky of reason with an unconstrained imagination. The secret of imaginative, metaphoric reasoning lies in cultivating both the spontaneous inner dance of inspirational thoughts and visions and the childish curiosity that finds a true amazement in the tiniest details of the surrounding world. This is the way to find the connection between an event taking place on a flower petal or on a tree nest and what goes on in our mind and heart or what dominates a special or an ordinary interaction of ours in the world.

The metaphoric nature of thinking implies the existence of a pair of levels at which our reflections alternately occur. At any given moment, one of them holds a firmly presupposed or verified idea, whereas the other one rapidly shuffles images and connections in search of a consistent analogy. And so these two levels stimulate each other in search of new ideas. In that sense, this way of creative thinking resembles the already mentioned process of crystallization. Just as in the process of thinking, two phases, one of which is liquid and one of which is solid, interact during the crystallization process. The randomly arranged substrate of the thought process corresponds to the liquid phase of the crystallization process, whereas the preexistent body of knowledge composed of a network of interlocked premises is akin to the crystallization nuclei on which the crystal growth occurs. The elements of order and disorder are thus both present and well balanced during creative thinking and the same principle applies to any other process in the course of which something original and inventive is being born. For, 'only randomness can give rise to novelties'⁴⁸⁴, as Ross Ashby, one of the founders of the field of cybernetics, observed.

Also, in order to obtain a perfect monocrystal, crystallization needs to be slow with only a single crystallization nucleus formed in the beginning. Once we accelerate the process or induce a competition for solute species by producing a large number of nuclei, the formed crystal would not be that perfect anymore. Likewise, in the creative thinking our focus has to be solely placed on these two levels: the one pertaining to the observed relationship and the one constructed on the abstract plane. Good concentration abilities are, therefore, essential in our strivings to become a prolific thinker. Once we introduce too many nuclei of thoughts into our mind, we disperse our creative efforts and the results cannot be that impressive anymore. Also, in order to prevent the formation of this undesired mass of additional nuclei, it is equally important to keep the solution free from dust and other impurities. Notwithstanding that particles of dust, air bubbles or ions or molecules leaking from the container walls can sometimes produce a desirable effect, as in the case of Beckman Coulter blood bags, which owe their superior blood quality preservation capacity to polymeric molecules leaking from the bag plastics into the blood⁴⁸⁵, any intruders that settle in the solution crystallizing a monocrystal in numbers greater than one are unwelcome. These foreign surfaces normally lower the activation energy for the nucleation, thereby providing sites at which nucleation and crystal growth naturally start at a much lower energetic cost. The arising of these monocrystalline ideas could be, therefore, depicted as a single star of thought shining through the clear sky of our mind.

Slow and patient ripening of ideas is thus essential for the process of creative thinking. To keep that in mind, we should always be reminded of Alexander Pope's maxim that 'he who understands all too quickly has a great chance never to understand truly anything'⁴⁸⁶. The greatest relationships in the macrocosm of physical processes and the microcosm of human thoughts require endless reflections until we realize their deep and all-encompassing meanings. Still, of course, it is quite understandable that in the modern age dominated by the ideals of instant gratification, of popsicles and catchy pop tunes offering quick orgasmic climaxes, of blitz news and ultrafast expositions of opinions, of disappeared storytelling in real-life conversations and of unbearable impatience arising in view of any extensive elaborations of thought, most souls fail to engage in this slow and delicate ripening of abstractions within their microcosms. As a result, their worlds look less like glistening gemstones through which rays of light are allowed to travel continuously, uninterrupted, and more like mosaics of broken glass wherein light is diffracted in zillions of angles, yielding a perplexing and disconcerting picture of their place in the grand scheme of things.

Yet, when a diligent gardener plants a seedling in the ground, he does not expect to see the results of his work neither right away nor after a year or two. In fact, he knows that mostly fruitless and practically useless plants grow quickly, and are usually considered as weed (although he appreciates the crucial role of every seemingly useless plant, such as weed, that normally rebalances the mineral composition of the soil). A wise gardener is aware that all the fruitful and nutritive or simply wonderful shade-bearing trees require a lot of time to yield their first fruits and even more to grow to their full size and capacity. Hence, the greater the deeds in our life are, the more time needs to pass until they get to bear their fruits to the beings of the world. This brings us over to the ancient Greek proverb: 'A society grows great when old men plant trees whose shade they know they will never sit in'⁴⁸⁷. A superficial and childish attitude of engaging only in tasks that bring immediate satisfaction should be, therefore, necessarily switched to a mindset filled with patience and determinateness to do our duties not because of something we wish to obtain in return, but because, like the Sun or the divine consciousness that Krishna famously taught Arjuna about in the book of Bhagavad-Gita, we do it for the sake of our heavenly devotion and enlightenment of the world and ourselves. As I sit on an Orange County beach, washed by the sunlight but pierced by the arrows of negative psychic energy, and muse about the slow growth of everything good in life, I reinforce these beliefs of mine by recollecting that what caused the right-wing instatement of cancerous individualism rooted in greed and selfish materialism on this sunlit soil was the unprecedentedly rapid economic growth, 11 times the national average, that this county underwent between 1940 and 1960⁴⁸⁸, making its entrepreneurs extraordinarily wealthy in a short span of time, an effect that appears to inevitably, on a grand social scale, promote the rise of toxic values and mindsets. And thanks to the boom-and-bust cycles that typify the speculative, high-risk economy that the old West was known for, it should not be surprising that today's newspapers are filled with stories of businesses filing for bankruptcy because of being founded to ensure quick profit, confirming the ancient common sense principle that tells us that what grows fast dies fast too as well as that all that is conceived with short-term, self-profiting goals in mind is, in fact, predestined for demise. In contrast, not short-term, but long-term investments have been the choice of deep reverence, benevolence and stewardship for the whole planet and the society.

Anyone familiar with the physical phenomena of crystal growth at the atomic scale can confirm that growing fast does not really pay off in the world of crystals. Namely, crystal faces that grow rapidly get to slowly disappear from the final crystal surface. Such is the case of the growth of a hexagonal unit cell. A faster growing plane, clinched between a pair of slower growing ones eventually turns into an edge of a cubic crystalline particle⁴⁸⁹. In case of a cubic unit cell, the situation is somewhat milder. Any faster growth along a single axis of growth would yield elongated, rod-shaped particles on which the

fastest growing face would still be present, although in a diminished proportion comparing to the crystal planes growing slowly. Nevertheless, the ethical meaning of this observation suggests that slowness and patience are qualities that yield long-lasting products of knowledge, whereas whatever grows fast vanishes fast as well. With this correlation in mind I may only dream of the infinity of enchanting books and essays that could be written by such correlating an inexhaustible collection of inspiring scientific images of natural processes with the ethical ideals established in major religious traditions. Linking scientific metaphors with ethical and aesthetical principles conveyed through marvelous artistic and religious works remains one of the biggest challenges for the upcoming generation of postmodern thinkers.

Furthermore, not a single truly admired piece of art, a place in the world or a loving being in our thoughts seemed as fascinating to us at the first sight as it is at this moment. The only thing they revealed when we first encountered them was a deep and invisible sense that they might hide more than meets the eye. Via some mysterious qualities they offered signs that struck our senses and made us foresee an enormous richness concealed within. They subtly invited us to deepen our knowledge of them, and that is all.

In that sense, we should make ascertain that, as the result of the whole world of our experience being co-created through the dialogue between human mind and Nature, this world is indeed overfilled with signs on the path of our spiritual development. Certain songs, messages or landscapes sometimes look enchanting to us simply because they hide words, ideas or colors that would influence our choices in favor of goodness and spiritual welfare when recollected on crucial crossroads in our lives. We should, thus, never underestimate the immense powerfulness of the subtlest messages abounding in our worlds.

What the systemic nature of reasoning teaches us is that each detail and relationship in the world around us can be reflected in an endless number of imagined events, serving thus as an inexhaustible guide and inspiration through limitless periods of time. Very soon we shall see how a tiny stone with its seemingly minute and negligible characteristics can offer us insights into the deepest secrets of man, experience, life and being, and as such act as a mirror of verily the whole Universe. As a result, instead of greedily collecting ever more diverse patches of meaning in our cognitive encounters with the world, we should be satisfied with single pebbles and seashells. Not taking them in abundance so that we eventually start dropping them out of our stuffed pockets, but taking one by one only and devoting our days in meeting and researching them, knowing all the while that ‘the idea of collecting is the opposite of purity’, as one of the two protagonists of Eric Rohmer’s *La Collectionneuse* pointed out. When Søren Kierkegaard’s pen jolted down that ‘purity of heart is to will one thing... therein lies a man’s greatness’⁴⁹⁰, the poet in prose perhaps wished to tell us that not only do we need to refocus the scattered rays of attention of our minds onto a single object at a time if we wish to set the enemy’s ships on fire, like Archimedes did, but that we might also need to satiate the thirst to grasp all and reawaken the childlike drive to meet one and one only if we are to start sprinkling sheer starriness across the fields of life. In fact, studies that demonstrated that humans more readily donate \$11 to save one soul than \$5 to save eight of them⁴⁹¹ indisputably indicate that our brains are structured in such a way so as to be more impressed by one than by many, resonating with the Arabian idea aired by the other protagonist of *La Collectionneuse*: ‘One is the first figure of an infinite number’. As Martin Buber recognized, the dedication to Thou will have always been more enlightening than devotion to humanity as a whole, however elusive and vague the representation of one such concept is in our heads, the reason for which the notion of altruism fades in its significance compared to the simple idea of love of a single soul, whoever that might be. For, the impression is that only through such an unreserved direction of the sunrays of our attention onto a single worldly soul or an object could the doors to glimpsing the whole

universe, in all its ungraspable beauties, open before us. Hence, instead of running around bustlingly and impatiently so as to catch as many inspiring signs as possible, sometimes it is charming and beautiful to sit and closely listen for subtle sounds, voices and messages coming from small natural details. My approach to absorbing beautiful musical impressions has thus always been based on playing a single record or a song and then allowing it to carry me on its wings throughout the day, rather than playing a song after song or a record after record and thus filling my head with an untidy heap of auditory perceptions. Long periods of silence during which the rhythm and harmony of the song are let reverberate inside of my head are moments when my analytical artistic ear stumbles upon awareness of the song's qualities and potential for elevating my consciousness onto higher emotional levels and thus boosting my creativity. As a chess player I have also disliked playing numerous blitz games one after another in an endless streak thereof. Instead, I enjoy playing one long game in a day, after which I could clearly visualize it and play out the moves in my head, being impressed by a fascinating richness that every single game hides in it. As Martin Heidegger expressed in one of his poems, 'To think is to confine yourself to a single thought that one day stands still like a star in the world's sky'⁴⁹². And as we could readily realize after barely glancing at the sky above our heads, the land is lit better by a single star beheld from vicinity than by millions of them viewed from afar or cursorily observed. This is why the accentuation of the merit of metaphoric linkages ought to present a more widely acknowledged aspect of the basic education. In other words, teaching the oncoming generations the infinite merit of inspecting any given object or an event is an educational imperative of the modern day, especially critical given the epidemics of superficiality and attention deficits brought about by the collective subjugation to ever more diversifying and multiplying cognitive stimuli around us.

Although we can undoubtedly learn immensely from watching forests, sandy beaches and planet Earth from a distance, or by superficially looking at human or any other collectives in Nature, we should learn at least equally, if not many, many times more, from descending down and patiently facing individual trees, pebbles or human eyes. By examining the structural organization of a single tree or exploring the morphology and atomic structure of a single stone, we can get acquainted with knowledge that could explain many features of their collectives as well. We can be immersed in a dazzling roar of an urban landscape, glancing at thousands of people from the distance in a day, and yet learn more about humanity, humans and our self by getting immersed in the eyes of a single other being, all filled with an astonishing wonder. 'While the entire youth of France takes sides in such great causes, am I going to spend life gazing into a pair of beautiful eyes'⁴⁹³, Stendhal opined quietly in the days following the French Revolution, and the answer naturally derived from this perspective is one steady Yes. For, our hearty devotion to tiny matters in life can be said to pay off more than illusory engagements in social upheavals that occasionally redress the surface, but almost always leave the essence untouched. And this is what the nature of systemic, metaphoric reasoning inherently points to: the beauty of finding the macrocosmic in the microcosmic, that is, verily everything reflected in the minutest details of the world. Every minor object and being can thus be taken as mirrors that reflect the mysterious essence of Nature in its entirety back into the eyes of the observer.

For a long time my ideal in writing was to reflect Nature as a whole not only in complete works, but also in each and every sentence comprising them. Once I opened a book by David Foster Wallace⁴⁹⁴, in which one of his commencement speeches was reproduced in such a way that each sentence occupied a separate page, standing on its own, ready to be contemplated on separate from the rest of the Universe, and exclaimed, 'This is it, this is how my works should be read', visualizing a hypothetical reader dwelling in my fancy, reading a single sentence from my works and then patiently devoting herself to capturing the cosmic vibe of it echoing along the walls of her mind in the moments of contemplative quietude. After all, I have always claimed that the best movies and literary works are those from which

one could pick any scene, sentence or passage and find innumerable rich messages therein, aside from their making up for a fabulous whole. What Nature teaches human beings in their endless co-creational communication is, in fact, how to learn the language of Nature, the one that is incomprehensibly comprehensive and, essentially, filled with everything in each tiny part thereof. Every stone, every wave, and every sound in Nature carry profound and all-encompassing messages. And this may be the reason why they may seem meaningless to humans at their current stage of evolution, just like some of my complicated sentences pervaded with many layers of meaning and comprising the ideals of balancing scientific rigorousness and clarity with poetic spontaneity and beauty on each of their levels (meaning, expression, etc., lest we be speaking about the balance between poetry and science in either a too rigorous and dry language of science or a disconnected and dilapidated way of pure poetry) may seem similarly confusing to the majority of my readers. Despite this, I still believe in what Gustav Mahler had in mind when he described the purpose of his symphonic works: ‘The symphony should be like the world: it must embrace everything’. Remember how he combined the majority of the previous major musical trends, including romanticism, tonality, polyphony, religious songs, operas and other programmatic musical genre into his musically absolute symphonies, apparently searching for the middle ways among the existing streams of musical thought and expression? Although innumerable critics of my works, musical and literary alike, wait around the corner to accuse me of the same flaws that Mahler’s approach to musical creation was condemned for – immoderation in architecture, shrill contrasts, frequent exhibitions of triviality, and ‘gigantic symphonic structure and imposition of thematic viaducts that unite each of those works into a single colossal organism’⁴⁹⁵, driven by strivings to build a grandiosely complete whole that is to embrace the entire Cosmos in its beatific arms – I worry not. For, I have known that the real way of learning in the co-creational dance with Nature is to endlessly widen the domain of our knowledge, all until we encompass everything in its frames, until we broaden our contexts in which we grasp the meaning of each tiny detail of the world all the way to eternity. In order to succeed in that, we should start from appreciating the wonderful purpose and meanings engrained in the tiniest details of the world of our experience. Thence comes a wonderful story about a small stone.

The story about a stone, or why Small is beautiful

‘He that is faithful in that which is least is faithful also in much: and he that is unjust in the least is unjust also in much’

Matthew 16:10

‘Enter ye in at the strait gate: for wide is the gate, and broad is the way, that leadeth to destruction, and many there be which go in thereat: Because strait is the gate, and narrow is the way, which leadeth unto life, and few there be that find it’

Matthew 7:13-14

‘Nature is a giant ball whose surface is nowhere, but whose center is verily everywhere’

Blaise Pascal

‘To whom coming, as unto a living stone, disallowed indeed of men, but chosen of God, and precious, Ye also, as lively stones, are built up a spiritual house, an holy priesthood, to offer up spiritual sacrifices, acceptable to God by Jesus Christ. Wherefore also it

is contained in the scripture, Behold, I lay in Sion a chief corner stone, elect, precious: and he that believeth on him shall not be confounded. Unto you therefore which believe he is precious: but unto them which be disobedient, the stone which the builders disallowed, the same is made the head of the corner, and a stone of stumbling, and a rock of offence, even to them which stumble at the word, being disobedient: whereunto also they were appointed'

Peter I 2:5-8

St. Peter the Apostle, whose name literally meant 'stone', has offered us in this introductory quote a rarely beautiful Biblical thread of thought. In it, he brings to mind the famous stone that the builders have rejected, but which has eventually become a cornerstone (Matthew 21:42). In relation thereto, St. Peter here reminds us that only after we approach every single stone around us, every single little thing neglected by ordinary human attention and disregarded as unimportant and useless, as an entrance to the world of endlessly enchanting and miraculous insights, the spirit divine will pervade our being. When we approach the beings and objects of the world as if 'coming to a living stone, disallowed indeed of men, but chosen of God, and precious' (Peter I 2:5), we become 'as lively stones' (Peter I 2:6), as 'the spiritual Rock that followed them: and that Rock was Christ' (Corinthians I 10:4), and 'are built up a spiritual house, an holy priesthood' (Peter I 2:6) within our being. Hence, it is ordinary and little things of the world that will guide us along the spiritual path in this life.

In view of this, I have always dreamt about writing an entire book about an ordinary stone. Not any particular and special stone, but, in fact, any tiny pebble that you can find beside the road. I would see it as a crown of my creative endeavors in walking along the Glass Bead Game road and looking after uniting religious and artistic ethics and aesthetics with the merits of scientific reasoning. And yet, I would make an ordinary pebble being this crown, which is what would make this book truly beautiful.

I believe that someday this wish may indeed come true. What follows now is, however, merely a sketch of this story. Still, there is a hope that even in such a non-meticulous form it might inspire millions of earthlings with the genuine wonder that it ingrains, somewhat similar to what Fyodor Dostoyevsky achieved with his sketchily narrated story about the Grand Inquisitor in *The Brothers Karamazov*. Be that as it may, here I go.

Remember when in the celebrated Federico Fellini's movie *La Strada*, the circus clown consoles sad Gelsomina by picking up a stone from the ground and explaining to her how even that tiny stone, unique, special and peerless as it is, has to have a purpose in the light of the evolution of the Cosmos as a whole? Without it, the Universe would not be able to develop harmoniously, so how would it be able to do so without one bright and wonderful Gelsomina? Every tiny thing has to play a key role, equal to the one of the bigger things, in steering the way of the whole. That 'the smallest pebble has a life of its own', as pointed out by Uncle Isak in Ingmar Bergman's swan song, a.k.a. *Fanny and Alexander*, thus becomes clear and, as per the message of the movie, presents a belief that can be a starting point for grasping that 'everything is alive and everything is God' and escaping the demons of dryness and deadness arising from submission to excessive discipline, law and order in our lives. For, to pick a pebble, colloquially presumed dead, and announce the dormancy of life in it is an attitude that puts the common views that regard and treat the animate as virtually dead up on their heads and presents a godliest stance imaginable in my universe of thought.

And, indeed, although I, myself, used to pick prettier and more unusual stones from the more ordinary ones and stuff my pockets therewith, a groundbreaking revelation that shook the foundations of

my worldviews and turned the demonic darkness in me into a shine of sheer starriness it was when I realized that every single stone conceals infinite prettiness in it and is the source of immeasurable curiosity and aesthetic appeal. Seen as a parable of acquainting fellow human beings or any physical systems, the finest components of which are metaphorically represented by single stones, this game can teach us that there is no ordinariness in our worlds; rather, all is pervaded with divine grace, requiring the rearing of divine perception in us to be recognized in its full luster. And with this bottomless beauty dormant in the finest details of our experiential cosmoses comes the infinite semantic richness and purposefulness in the story of the evolution of the celestial consciousness of each and every one of them.

Now, probably the first thing that ought to be mentioned as a part of this observation is that the properties of the stone we hold in our hands do not lie in it alone, but result from the interaction between it and the measuring device that includes the observer's senses and mind. If we touch or press the stone, we may notice how ridged or velvety, hard or soft it is, and we would immediately endow it with some qualities. But these qualities are not absolute. They are defined by the nature of the observer and his own notions of hardness and softness. Even in physics or mineralogy, the mechanical characteristics of a solid material are defined by means of specific units, be it Pascals or the numbers of the Mohs scale, the scale whose center is, by the way, defined by apatite, the most beloved mineral in my materials science cosmos and the one Nature used to build the bases of our bodies with, as if insinuating that midway between weakness and strength is where grounds for the exhibitions of ultimate strengths in life are found. Now, this necessity to refer to units of some kind when assessing any properties of materials of interest tells us that each of these properties is always described in relative terms and against a referential scale, that is, in essence, with respect to the properties of other stones and us as the observer. Even the question of why time appears to be passing by faster as we grow older can be answered by referring to this relative nature of our perception of time. Namely, to imagine the length of a given period of time, be it a day, we need to compare it to the overall amount of time that fits in the lifetime of our perception. As the common denominator of the latter increases as we become older, days appear shorter with the passage of the train of time. Many science novices, however, often forget that reporting number values without comparing them to some standards carries no meaning whatsoever. Even numberless equations are obliged to refer to standard states of one type or another, so long as they aim at describing a physical process and do not belong to the imaginary realm of pure math. Nonetheless, no qualitative concepts can arise in our heads without being compared to subjective or objective standards of a kind, which are, in turn, established by being, so to say, controllably bounced off their opposites. Ultimately, the very attribute of smallness implies the observer's awareness of something much bigger than the observed system, just like endowing an object with the attribute of beautiful implies the observer's awareness of its opposite in terms of vulgar and ugly. This may be the reason why Lao-Tzu and many other Oriental sages called for a complete abstinence from judgments and blamed scholars and other knowledgeable critics for the promotion of opposite traits from those that they were favoring, alongside the latter.

Be that as it may, this all serves to say that all qualities need to be defined as relationships between the observer and the observed. On one hand, we can bring to mind Gregory Bateson's norm that tells us that 'relation is always a product of double description'⁴⁹⁶. In the context of materials science, for example, merely measuring properties of prepared materials and then reporting them as such comprises the core of a superficially informative approach to enriching our knowledge. Introducing a comparison, on the other hand, not only as indispensable standards, but as similar samples made by varying specific variables that define conditions of their preparation or structural evolution over time, is what comprises a step to gaining fundamental insights into the given research topic. These comparisons incorporated into the blueprints of our research can thus be said to be the source of difference between

truly fundamental studies and the mere ‘synthesis and characterization’ approach. With due respect to John Lennon and Ringo Starr who both had a habit of wearing a badge that said ‘Back to Mono’, as well as to Brian Wilson who insisted on using mono sound technology when the Beach Boys recorded their timeless Pet Sounds, it is an inescapable fact that comparison between two or more sources of information is necessary to provide us with deepening insights about the qualities of the investigated systems, quite analogous to the way stereo, in-depth vision is conditioned by processing of visual stimuli collected by a pair of eyes.

On the other hand, whatever the perceptual results arriving as stimuli to our brains, they become interpreted in light of our own expectations, aspirations, assumptions and cognitive capabilities and predisposition of our biophysical structure as a whole. The fact that our brain machinery works by processing analogies and associations at its subconscious plane implies that unintentional biases, typically aimed at proving the hypotheses of our thinking at the level of perception, are an unavoidable element of our cognitive beings. However, such weaving analogical threads in the fabric of our mind is, like all other tools in Nature, a double-edged sword: not only may it carry us in the direction of inadvertently inert and prejudiced thinking, but it is also essential in enabling lateral, outside-of-the-box and intuitive leaps in our reasoning. For, at this subjective level too, comparisons carried out in our brains with every passing moment are vital to prevent us from becoming trapped in the blind spots of fixed ideas and inert judgments. Incessantly asking questions, doubting as much as relying on other people as sources of equally valid insights regarding the nature of reality is thus naturally called for, bringing us directly to the doorsteps of the following musing of Dick Feynman that encompasses the entire cosmos in its systemic broadness: ‘Western civilization stands by two great heritages. One is the scientific spirit of adventure... humility of the intellect. The other great heritage is Christian ethics - the basis of action on love, the brotherhood of all men, the value of the individual, the humility of the spirit’⁴⁹⁷. Hence, if we look close enough, we would realize that it is the intersection of the ontological set of relationships of the observed system with the rest of the physical reality and the epistemological set of relationships that constitute the tautological base of the observer’s characterization approach that defines the observable properties of the observed system. Essentially, for every quality that we are aware of can be said that it is experiential and natural at the same time, as it can be represented as arising from the touch between mind and Nature.

Thus, by simple, yet profound looking at a pebble, we can arrive at the core of the co-creational thesis. The whole first chapter of this book can come afterwards. The story about the balances would naturally unwind subsequently. The parallel of oscillating strings, music and the blind spot effect can then be expounded. The dialectical nature of the evolution of our knowledge and being would be the next stage, and the end would belong once again to looking back to the depths of our own fundamental epistemological stances and observing their mystical reflections in the world around us, that is, reading the answers of Nature to the questions that they engrain. This, of course, presents the religious essence of the co-creational theses. Thus, as we see, one by one, the chapters of this book could be lined up as initiated by a wondrous sparkle of thought enkindled through a cognitive encounter between a human mind and a minute pebble.

The whole world of one’s conceptions of it can be literally built from the scratch. For, each line on the stone’s surface can inspire us to think of its origins, and sooner or later, we would come to the idea that it has been shaped as much from within as from without. We would, therefore, show that each minute detail of the world around us carries inexhaustible sources of divine inspiration. It may point us to knowing verily the whole Universe.

Thus, the next important thing one should notice is that the qualities of any system do not lie in the system alone, but are equally shaped by the physical context in which it is found, aside from the

context of its observation. All the topological features of the stone, its shape, color and lines that it carries, are shaped equally from within as from without. The history of the interplay between the intrinsic potentials determined by the stone's composition and crystal structure, and environmental factors, such as temperature, pressure, humidity, pH and friction, defines the actual appearance and properties of the stone. Crystals have a natural tendency to grow such that their visible faces correspond to the most energetically stable atomic planes in the crystal lattice, but at the same time the environmental factors add up their own influence to the physicochemical conditions of the crystal growth. Thence, it is well known that the level of supersaturation in the medium surrounding the growing crystals defines the crystal growth rate and the surface topography (i.e., in general, relatively low levels of supersaturation produce smoother surfaces), but the latter are also dependent on the initial properties of the crystal surface (that is, whether it can be considered as flat, kinked or stepped)⁴⁹⁸. The origins of shape, symmetry and all the tiny ridges on the surface of a pebble can be thus traced back to its inside as much as to its outside. All intrinsic and environmental factors affecting the crystal growth are also vitally involved in defining the opposite phenomenon, that is, the one of dissolution of crystals. Then as well, although the process undoubtedly depends on the microstructure of crystals in question, any presence of additives that may, for example, adsorb onto crystal faces and hinder the dissolution process, or external physicochemical parameters such as temperature, pH and any local, interfacial gradients in composition also have their say in defining how the solid body will vanish from the solution. Incongruent crystals, such as calcium phosphates, which tend to undergo phase transformation in parallel with the dissolution process (\rightleftharpoons symbol in chemical equations is, after all, there to remind us that practically every chemical process simultaneously occurs in reverse direction, all until an equilibrium between the two is established), thus dissolve differently at different solid-to-liquid volume ratios, demonstrating that the evolution of crystalline structures and shapes during their dissolution often differs depending on whether we plunge it in a miniature teardrop or place it at the bottom of an ocean.

This is all to say that just like sentences co-define the meanings of the individual words and letters, the same can be said for any natural system as well. Thus, when we watch a stone, we should be aware that we are also catching glimpses of the reflections of the Universe as a whole and every tiny bit and detail therein. For, the intrinsic structural features of the system in question predispose it to certain types of interaction, whereby these interactions, always involving the attributes of the environment equally, define qualities displayed by the system. After all, as Heisenberg's uncertainty principle suggests, there is no measurement without an interaction, and whatever we detect in the physical systems is always the product of an interaction between the system and the measuring device, where both are involved in shaping what we will come to consider as qualities of the system.

The same principle that dictates that inner and outer factors are together involved in shaping any given qualities applies to all systems in Nature, ranging from atoms and molecules to cells, organisms, social groups, evolutionary lineages, ecosystems and the entire biospheres. For example, if we were to look for a thorough general explanation of human behavior, we could not bluntly refer to genetic predispositions, inherited mental aptitudes or, God forbid, hormone levels *per se* (recall, for example, how it is popular nowadays to refer to ratios between the levels of testosterone, cortisol and serotonin as key regulators of male personalities and behavior⁴⁹⁹). In addition to these inner factors that act as behavioral determinants, environmental and social effects need to be taken into consideration in order for a broader view to be constructed. The paradigms of both genetics and behaviorism can thus be seen as extreme explanatory approaches. Only their merging could bring satisfying descriptions of life and humanity.

Likewise, all judgments and diagnoses ought to be established on the basis of dual observations: from the outside and from the inside. Outer features of the inspected beings become apparent from the

former perspective, but compassionate observing of the world 'from eyes of the other' leads us to understand the psychosomatic reasons that govern the wellbeing of the given creatures⁵⁰⁰. And the fact that every physical emanation of life has its inner causes, related to our deepest wishes, ideals, tendencies and aspirations, and outer causes that commensurate with environmental factors that shape our beings, is in perfect consistency with the philosophy of the Way.

The origin of the appearance of a seashore pebble can be traced back to the properties and propensities of us as observers, as well as to the inner and outer factors that determine its formation and evolution. Atomic composition and crystal structure would thus have to be considered as much the environmental effects present at the time of its crystallization and interaction with the sea waves and the surrounding rocks, pebbles and organisms. The same is with the living systems. In order to create a thorough view of them, we always need to observe them from the outside as much as from within. To be able to smartly read the body language of others is only one part of the story, but to empathically 'see the world from the eyes of another', as the psychiatrist Viktor Frankl called for, presents a far greater and more challenging ability to develop.

Along the trail of such an exploration, we would certainly reach the point of the discovery that microcosm and macrocosm neatly reflect each other, and that every inside mirrors the outside, and *vice versa*. If one were to have a glimpse of a diffractogram of the stone, one would find a periodic pattern of crystallographic reflections, highly reminiscent of the starry sky. This similarity has always reminded me of how the beauties of the enormously big and of the enormously small are closely related, much more than it may seem at first sight. But by being aware of this similarity, we can find starry sources of amazement even in little pebbles, and *vice versa*, gracefully holding the greatest stars on the palms of our hands. Saying this, the words from the Bible may begin to reverberate and pulsate in the cosmic space around us: 'There is none holy as the Lord: for there is none beside thee: neither is there any rock like our God' (Samuel I 2:2).

In fact, one of the natural consequences of the fractal similarities between the appearance of the world at small and large magnifications is that finding value in small things and events can lead to a more significant appreciation of the bigger world. Small events can be reminiscent and, in fact, credibly reflective of greater ones. Microcosm and macrocosm are one and the same. As above, so below, and *vice versa*, Hermes Trismegistus would have told us. An entire summer holiday, a season or a year can thus present significant metaphors of how one's whole life might proceed in terms of the emotions that one has strewn along the way. The finest patches on the blue sky can reveal signs that could be used to guide our worldly decisions in a profound manner. Therefore, wise people, from Dick Feynman, 'who would look at a little wave on the water and understand how the Universe works'⁵⁰¹, to Dostoyevsky's Father Zosima, who taught that dropping a pebble into the sea creates a ripple that resonates at the farthest end of the Universe⁵⁰², have looked carefully after capturing the meanings of the minutest details of the world. They know that these little things hide far greater secrets of life and the Universe than it seems to a casual observer.

As such, they get the rigorousness of scientific attitudes excitingly close to the charming joyfulness of a clown living in a fairy tale. The butterfly effect of the chaos theory has told us that minor deeds occurring on one side of the planet can produce significant effects on the other side of it. A butterfly flapping its wings while standing on your shoulder can induce a storm or a sunny day in a place thousands of miles away. Sometimes these storms are forceful and evident, but sometimes they happen deep under the surface of the perceptual reality, making it impossible to know if all or only some of such subtle acts get to be transmitted to the farthest ends of the globe and influence life nested thereat. And yet, as it was stressed out by Nikola Tesla, 'there is no thing endowed with life - from man, who is enslaving the elements, to the nimblest creature - in all this world that does not sway in its turn;

whenever action is born from force, though it be infinitesimal, the cosmic balance is upset and the universal motion results'⁵⁰³. Likewise, Béla Hamvas claimed that 'there is no such thing as meaningless movement or a thought the effect of which could not be felt even in the most distant part of the universe. Every act has its universal meaning for the world. A single pebble thrown into the sea determines a completely new direction for life in the world, and with every breath something changes in life of the planet'⁵⁰⁴. It was while standing on this locus of belief in the magnificent effect of the subtlest acts that I engaged long ago, in the 1990s, in a classic conversation with Cöss in the Pegaz café, whose western wall was and still is shared by our family apartment in Belgrade, and countered his comment on the cruelty of sending workers in the field out in a scorching heat by saying, 'Yes, but if you descend into the divine depths of your consciousness and pick a magical moment to say, 'now you go', an exhausting experience would be turned into an enlightening one'. Ever since those earliest Zen days, this belief in the ability of the finest, the most trivial of acts to unlock the secret gates in people's minds and send them down the road to enlightenment has not wound down and today, when I hear of the advice not to open any extraterrestrial messages because their single lines of code could produce irreparable bugs in the brains and information networks constituting our civilization and culture⁵⁰⁵, I get the point, but I know that, on the brighter side, equally potent actions can be conceived to heal and harmonize all that there is rather than disrupt and disarray it. As we also see, meanings associated with the perception of the finest effects in the world are often sufficient to trigger a miraculous chain of thought in their observers, producing ideas that will thoroughly change both them and the world. In such a development of the story of the whole in critical correspondence with the smallest of its details, science and experience may be seen as reminiscent of fairytales in which plucking of a flower or biting into an apple may produce tremendous effects on the destiny of the hero⁵⁰⁶. The rigor of science and the fancy of arts have always presented two sides of the coin of a truly creative human thought.

Some materials scientists may excitingly mention at this point that many are solids whose properties are determined by the structure of their grain boundaries, which usually occupy a very minor portion of the sample and furthermore illustrate the enormosity of the extent to which exceedingly small details in a stony specimen are able to affect the fate humanity will endow it with⁵⁰⁷. Moreover, as we continue to roll down these tracks of fanciful analogisms in our head, we might come across a reminiscence of the fact that both point and translational symmetries of the crystal lattice are due to the balance of attractive and repulsive forces between its units, as if they are the most stable embodiment of the Way of Love in our worlds, desperately calling for them to be studied so that this ultimate recipe for enlightened living could be discovered therein. Morse's curve, for example, showing the energy of an anharmonically oscillating atomic pair as a function of the interatomic distance, demonstrates nicely the energetically unfavorable nature of the states wherein the atoms are either too close to one another or too far apart. Crystals, as such, wink at the inventive observers thereof, giving them signs that being in a state of constant symbiotic unison or being in the one of infinite separation is equally pathological and unsustainable and that only a dynamically evolving middle ground between convergence and divergence can yield fascinating symmetries worth endless exploration. Crystals form exactly via satisfying these energy requirements to find the most optimal distances between crystalline units, whereby they are close to each other, yet sufficiently far away, just as the ideal of the Way of Love would have prescribed it. For this reason, some molecules, such as very hydrophobic peptides, could not be crystallized because their attractive forces are too large to keep them at some distance from one another, while others, such as some of the inherently charged small molecular species, could not exist in the crystalline form because of the repulsive barrier that stands in the way of their coming within decent reach of each other. This is all to say that whenever we inspect a stone in our hands, we should have not only chemical formulas drawn in our heads, but also an emanation of the Way of Love, the formula for living divinely, laid right

before our eyes, as if handed to us by gods, who do so, as ever, through the smallest of the worldly things.

Just like living creatures renew themselves during each instance of their living, the same goes on with the seashore pebble. It is crushed by waves, clinched against the surrounding pebbles and subject to air streams and temperature changes. The formation of each stone is thus never over. Even while we hold it in our hands, microscopic and atomic species fall off from it, never to be returned again to be the part of the stone. But also, some other atoms from the surrounding get attached onto it and, if lucky enough with the diffusion, may become a permanent part of it. Such processes are particularly instigated in the seawater that contains numerous ions that may readily incorporate themselves into the crystal structure of the stone. In fact, as it was shown in mid-19th Century by Guldberg and Waage⁵⁰⁸ during their pioneering research in the kinetics of crystal growth phenomena, an equilibrium involving a crystal immersed in a solution implies not a constant and unchanging existence of the solid material in the medium from which it was precipitated, but a continuous process of dissolution and re-precipitation. Similarly to this constant exchange of matter across the precipitate/supernatant interface, the atoms or molecules comprising the liquid phase constantly evaporate into the air and condense back from the vapor to the liquid phase, albeit at different rates, leading to the gradual loss of the volume of the liquid over time. For this reason, used in most chemical balance equations is neither an arrow representing a unidirectional transformation (\rightarrow) nor a simple sign of equality standing for static equilibrium ($=$), but a bidirectional arrow coupled to the equals sign (\rightleftharpoons), signifying a constant exchange of mass and energy across the interface of phases in equilibrium. Yet, just as most schoolboys think that the silk road was a one-way route for transporting silk from China to Venice, when in reality it was a two-way route, given that the silk-weaving technique, which had been developed in the East, became mastered on the west ends of this road and brocade, velvet and other textile made in Venice ended up being transported back to the East, for use in the Byzantine Empire and beyond, so are they ignorant about the fact that there is a constant transformation of products back to the reactants during the chemical reaction and after the equilibrium is reached. They have exhibited similar ignorance about the constant fusion and fission that micelles undergo in thermodynamically stable microemulsions, an insight theoretically deduced by Reiss in 1975^{509,510}, having been allured by the imagery of statics and thinking that micelles somehow always preserve their shape and structure, when in reality they constantly disintegrate and reform. The same principle undoubtedly applies to the dynamic nature of our beings that constantly dissipate their essence in the wind and yet continuously reintegrate and recreate themselves, thus becoming new creatures at every moment of their lives. The geologists would then go ahead and remind us that even the earth on which we stand, the epitome of stability and motionlessness, is subject to ceaseless movements, as, for example, ‘as the oceans rise under the pull of the moon, the bedrock beneath our feet creaks and groans and rises with them, as much as a foot, every twelve hours’⁵¹¹, let alone that on the geological timescale, wherein the entire documented history of the human race would be no longer than ten seconds in a year that were to represent the complete history of the third rock from the Sun, constant transformation would be the only constancy perceivable by an observant cosmic eye.

And, as ever, the interfaces between two phases present the most active regions of the physical reality, simply reflecting the already expounded Buberian idea that neither in me nor in you, but in the touch between I and Thou do the most spiritually rewarding impressions in the Universe originate. If we look closely at the nature of our physical and epistemic realities, we would realize that life on this planet arose neither underground nor up in the air, but exactly at the interface between the solid and the fluid and gaseous regions of Earth, just as well as new ideas arise along the abstract coasts whereat the lands of affirmed and solidified thoughts meet the amorphous and unformed seas filled with fluidly flowing visions, emotions and relations. Therefore, we could conclude that most physical processes that sustain

our lives and define experiential appearances are governed by interfaces. Interfaces, moreover, like edges or cliffs overlooking abysses on both sides, are incredibly risky to walk on, reminding us once again of the boldness of all those visionaries who opted to position themselves right on them for the sake of contributing to the evolution of our animi from the animalistic to the angelical. Sleepless fliers, for example, know that turbulences are most pronounced over regions on the map of the world where bodies of water transition into the continent, which is suggestive of the inherently unstable nature of the interface, being the form of instability through which everything novel and great in this life must pass before it is born. This brings us over to another insight: namely, a studious observation of the seashore pebble in our hands can make us realize that the atoms positioned on the interface of a physical object, such as a crystalline catalyst, are eager to react because of none other but their intrinsic instability. It is for this reason that diminishment of the particle size in a powder increases its specific surface area and, thereupon, its reactivity. In such a manner, subtle and quiescent, these petite actors on the atomic stage demonstrate how trembling rabbit hearts of this world, insecure and unsteady, seeking comfort while palpitating in beat with the rhythm of their oversensitive feelings and thoughts, are the most important players in the cosmic game of life, on whom the fate of the whole existence depends, be they beating amidst a sea of quarks, across the atomic planes on solid surfaces or inside our chests. A little stone, inanimate as it were, has thus pointed in the direction of life at its liveliest, as sensitive as a bamboo shoot in the wind, in the course of this magical microcosmic voyage of ours wherein the deeper we descended, the higher we rose and wherein the narrower are focus became, the broader our being and knowledge became too, eventually expanding across the entire field of reality, as if by the virtue of millions and millions of little diffraction gratings in it, not only for the X-rays, but for the rays of our attention too.

This is how we could be taken by the hand to grasp the effect of the history of the formation of a seashore pebble or any other crystal alike on the patterns of their future growth too. Namely, the way the seashore pebble has grown up to this point in time largely determines the way it will further continue to grow. Thus, for example, if a crystal grew at a relatively high rate for some time in a highly supersaturated environment, its later growth under a lower supersaturation will proceed at a different rate compared to a crystal that had been kept in a lower supersaturation environment all of the time⁵¹². This is normally explained by the different roughness of the crystal surface. As already mentioned, the faster the crystals grow, the more imperfect their surfaces will be. Therefore, crystals grown in highly supersaturated media will tend to have rougher surfaces than those grown in lowly supersaturated solutions. And surfaces full of steps, kinks and other imperfections provide more favorable sites for the anchorage of the growth units from the solution than relatively smooth surfaces. Subsequent growth in the solution of the same supersaturation will thus proceed faster for the former, topologically rougher crystals than for the latter, smoother ones. Therefore, sometimes the same level of supersaturation may induce growth of one form of crystal, whereas the other one with an identical composition will grow slower or may even remain unchanged. Likewise, the same type and amount of external impressions can sometimes leave a single creature thoroughly untouched and the other creature drowning in waves of emotions. Hence, just like the habit of crystal growth influences its future growth, the habits of our thinking and judging about the world, deeply ingrained within us, outline the way for the future incorporation of impressions within ourselves. This may be an implicit sign that patiently and persistently cultivated goodness in our mind and heart always pays off, as it spontaneously predisposes us to benefit from the environmental stimuli exerted on us.

Little by little, it gets clear that all the ideas that comprise this and other books of mine can be deduced from such a sole watching of a stone. Like ‘the stone cut out of a mountain by no human hand’ that destroys a brilliant statue and ‘becomes a great mountain that fills the earth’ in Nebuchadnezzar’s

dream (Daniel 2:31-35), a tiny stone quietly placed besides the main road of human lives may prove to be more important and inspiring than many of the adored manmade products to a truly blissful human attention. A stone, small and solitary, thus becomes a delimitation, but also, like every path, a connection between Heaven and Earth, like the one placed under the head of the Serbian Grand Prince Stefan Nemanja, a.k.a. Saint Simeon the Myrrh-streaming, upon departure from this world and of countless South Slavic seers and sorcerers who wished to draw mystical axes between their souls and divine forces overseeing them with one such simple act⁵¹³. Besides, if we trust the story of Deucalion and Pyrrha from Ovid's *Metamorphoses*, where the couple survived the flood and then repopulated the Earth by throwing stones behind them, which transformed to human beings, then we can be sure that miracles unthinkably greater than this could be carried out if each stone were to be perceived as a miniature version of the cosmos, in which the whole past, present and future of existence lie inscribed. This is in concert with the personally translated verses of the alchemist, Arnaldus de Villa Nova, who died in 1313, and which Carl Gustav Jung centuries later inscribed on the surface of the stone that he used as the head of the corner of the house that he turned into the womb for his soul, 'Here is the poor and unsightly, utterly trumpery stone! The more disdained by the fools, the more adored by the sages'⁵¹⁴, as well as with the untranslatable comparison of the Serbian poet, Đura Jakšić with a bleeding stone in one of his poems ('*Ja sam stena, o koju se zloba mori, svetska čuda i pokori*'⁵¹⁵), the stone which, though little, is capable of taking many wonders of the world upon itself. Or, as we could learn from another Serbian poet, Jovan Dučić and his first letter from Switzerland⁵¹⁶, Goethe visited the Swiss Alps three times, the first time as a poet, all in youthful rapture, marveling over their mountain peaks and forests, the second time as an introspective mountaineer, relishing his own physical powers more than what the world around him had to offer, and the third and the final time as a geologist, finding infinite sources of beauty in miniscule stones around him. In doing so and passing from poetry to prosaic practicality to discover an even profounder form of poetry, the German poet neatly reflected the journey of the Zen lumberjack who axed trees before the enlightenment, axed trees as he was crossing the night of the soul on his way to enlightenment, and axed trees after he reached enlightenment, and, as such, may have fulfilled his father's aspirations to make his son not a poet, a seer or a scientist, but a logger. And once again, it was not 'sword and spear' (Samuel I 17:47), but 'sling and stone' (Samuel I 17:50) that stood at the center of an enlightening view of the world, able to vanquish its Goliaths and give rise to the reign of godliness, all in the hands of poets and philosophers, those David-like champions preordained to relentlessly equalize smallness with beautifulness and beautifulness with utility.

A careful gaze at a simple stone can also make us realize that despite its often being used to epitomize dead and inanimate matter, a music that has fascinated endless generations of scientists and thinkers permeates every tiny segment thereof. Although a stone in our hands may indeed appear as a symbol of inanimateness and inertness, if we were able to penetrate with our attention deep into its atomic structure, we would readily be able to recognize and listen to an enchanting music produced by vibrating and oscillating atoms that the stone is composed of. Moreover, this music and the Musician behind could be explained only by invoking the quantum principles of atomic physics, which have not been thoroughly elucidated yet. To understand this music perfectly well, a complete and absolute theory of the Universe would be required, whereas the prospects of attaining it are highly doubtful once we consider that the quests for knowledge spur the evolution of human mind and race. Without unanswered questions as the driving force of human wonder, every thread of progress would get all ruptured. Hence, with plunging deep into the secrets of music that the quiet 'heart of stone' beats with one travels into the greatest mysteries of time, being and Cosmos. Answering the secrets of this music would mark the steps towards answering the secrets of the entire Universe, believe it or not. So, instead of looking at untouchable and distant stars or the sparkles of wonder swimming in starry human eyes, we could

equally start carefully observing the quiet music played in any stone in our vicinity. This is why when Hamlet utters his famous lament to Rosencrantz and Guildenstern, ‘This goodly frame the earth seems to me a sterile promontory; this most excellent canopy the air, look you, this brave o’er hanging firmament, this majestical roof, fretted with golden fire: why, it appeareth no other thing to me than a foul and pestilent congregation of vapours. What a piece of work is a man! How noble in reason, how infinite in faculty! In form and moving how express and admirable! In action how like an Angel! In apprehension how like a god! The beauty of the world! The paragon of animals! And yet to me, what is this quintessence of dust?’⁵¹⁷, I hear echoed in it not only that holy disparity between the dream of how life could be lived, godlily imaginatively, and the dream of how life is lived by the current generation, drily, stiffly and insipidly, the disparity that exists inside the artistic mind and sustains its creative drives, but also my own scientific sentiment, which is such that, to it, the beauty of Nature and the mysteries of man are none compared to the secrets of the world concealed inside the crystal lattice of a grain of sand.

When I was a young lad and entered an exam in the philosophy of science, I was given the task to explain causality in Nature. Due to my ever existing tendency to act originally in any circumstance, instead of writing down a regular answer, I entered the oral part with a blank piece of paper, which was supposed to represent the ideal clarity of a philosopher’s mind prior to getting engaged in observation of natural phenomena. Little did I know then that the first test I would give students as a professor of bioengineering thirteen years later would be in the form of a blank piece of paper that each one of them was supposed to fill with one’s own questions and answers. It was a well-played trick that was meant to implicitly teach them that the essence of science lies in constant self-doubt and subjugation of it all to selfless scrutiny, including, more than anything, the premises, the routes and the outcomes of one’s own processes of thought and perception. The most important questions in life arise from the inside, this test was meant to highlight, which is why each traveler on the long and winding road of science is to turn oneself into a humble question mark rather than to an arrogant exclamation point that pretends to know the answer to it all, alongside keeping his mind untainted and pure, open to all the possibilities, always looking forward to a miracle that may just about to occur from behind every corner of his experience with a truly magical frame of mind, thoroughly seeded with the little stars of surprises that spirit him up from the core. Later I began to give tests containing only one so-called Fermi question, an archetypical of which was ‘how many piano tuners live in the city of Chicago’ given in the high-energy physics class, a question that seemingly falls out of the blue onto the sheet of paper, prompting the answerer to ascend in imagination to the depths of the bluish sky above his dreamy head and bounce back from the far edge of the firmament before arriving back with a correct answer in his hands, learning along the way that all is connected in the Cosmos and that there is no such thing as a random question with no relevance for our mission in this life and no myriad of guiding stars interspersed inside it. Another thing that these clean sheets and occasional outlandish questions adorning them were supposed to symbolize was the necessity of befriending our intuition, switching on all our surprise senses and improvising our ways through the forest of knowledge, day and night. And, as you may guess, I thoroughly improvised the answer on that memorable June day. I started telling about a boy who enjoyed walking down a beach and playing with tiny stones. He would take one of them and with a delicate and profound sense of astonishment, as if he had faced the most fascinating ancient hieroglyphic messages, looked at them. Knowing that Nature constantly strews us with her replies to questions and cognitive needs that we carry within ourselves, he would engage in deciphering and absorbing the strange and thoroughly incomprehensible meanings of tiny ridges and lines on these pebbles. After a while, a girl with an ice cream in her hands walked by. The boy was not there anymore, but she accidentally stumbled upon a stone that he had played with, and her ice cream fell to the ground. She immediately started crying, but then, all of a sudden, she noticed the sparkly reflections of sunlight on her eyelashes. Instantaneously

she felt strewn with miraculous blessings, as she became engaged in a train of thought impelled by the idea that the things that we possess and which give us superficial satisfaction in life are nowhere as important as the inner wonder and blessedness that we should cultivate within. Without even knowing, this tiny spark of cognitive wonder became so deeply ingrained in the girl's mindset that it turned out to resemble a grain of sand around which pearly insights and worldviews crystallized over time. This sparkle thus became an everlasting sprout that kept this lovely creature many times on the right path, whenever she would find herself doubtful and confused over whether to choose the selfish path of enriching herself in eyes of the others or the benevolent one of enriching the world in the eyes of herself. It was as if every time the latter way was chosen by her heart, a layer of nacre would be added to the beautiful pearl that her mind was building inside of herself during her pure and innocent searching for the meaning of life and existence. In a larger context, the story I improvised on this spring day on which I felt as if a shiny crown, an aureole of a kind was placed on my head by the heavens, is supposed to provide an analogy of how hidden and subtle cause-and-effect relationships in our world are. I was surprised to find out years later that someone on the other side of the globe, the impulsive Argentine writer, César Aira, who has ever since refused to edit his manuscripts⁵¹⁸, replying with a similarly *prima donna* note to any censorship requests as that exclaimed by the French movie director, Jacques Tati when he was asked by the NBC producers to cut his act by 22 seconds, 'It takes the time it takes, and I cannot cut a single second'⁵¹⁹, wrote a novel about 'how I became a nun', starting it off with a similarly life-changing experience of tasting an ice cream, thus reiterating my beliefs that the most minute imaginable events and perceptions can sometimes turn into avalanches of beauty rolling down our cheeks, somewhat like the words of this or many other endlessly long sentences interspersed within this book, enlightening and sanctifying our entire being along the way. On the other hand, because each action exists as a cause for the endless amount of time, producing effects on the world everywhere, in even the most distant places thereof, rocking back and forth on the sea of reality, crashing along the coasts of human minds and modifying them and the visible world thereby, what we do now on the subtlest plane will keep on determining the appearances of the world forever and ever. Here comes the climactic scene from Wim Wenders' *Der Himmel über Berlin*, when the two mystical lovers realize that all that they need to do to change the world is sit on a Berlin square and kiss; for, that kiss, a tiny act in itself, if performed correctly, can change a small piece of mind in people who see it and from there go on to propagate its effects across the neighboring streets, apartments and parks before exiting the limits of Berlin and entering every single corner of the planet, perhaps even stirring it away from mischances and catastrophes and towards the collective bliss of the soul. Krzysztof Kieslowski was so impressed by these tiny threads of mysterious connections, which make miniature deeds sometimes determine the fates of millions, that he weaved captivating stories around them in more than a few of his movies. For example, in the fifth episode of his Decalogue, he tells a story about an adolescent who is, at first, seen dreamily gazing in the distance atop a highway bridge. Then he tips a little rock standing next to him onto the cars in the fast lane below and hears it crash into a windshield and cause havoc on the road, an instance that agitates the blood of a murderer in him and, tragically, instigates him to extinguish a life, tender and frail, like the little fickle on the edge of a forest in the very last scene of the movie. On another occasion the Polish movie director talked about a hypothetical airplane mechanic who had a fight with his son or was insulted by a stranger in the street, then went to work and, distracted as he was, connected wires incorrectly, causing a plane to crash, and wondered from there on who, in fact, after having all things considered, is guilty in this complex web of interrelated causal links that life is, wherein every move, regardless of how miniscule and unimportant it may seem, affects everyone else, as well as how many murderers walk past us, taking life in indirect manners with only a sense of antipathy gleaming from their looks and attitudes. Besides, if we learned something from the mystery of

Laura Palmer's death⁵²⁰, it was that evil spirits housed in the human heads and hearts are the ultimate murderers in our world, responsible not only for the worst of the crimes, but also for the pettiest troubles inflicted upon us; 'tis a warning that is, ideally, to reset the malicious minds and restore their refinedness, all until only benevolent thoughts and blissful dreams are allowed to arise from them. Sometimes, however, the road to hell could be paved with good intentions too; give someone a chewing gum just for the kicks and you will never know if you initiated a chain reaction of building the masseter, grinding of the temporomandibular joint, hyperactivity of the salivary gland, overstimulation of the digestive tract, hyperacidity, reflux, dissolution of the enamel, erosion, abrasion, oversensitivity of teeth, bruxism during sleep, stressful and low-quality sleep, irritableness, aggressiveness, frustration, engagement in dissonant social relationships and, eventually, the loss of one or many souls at the end of this long road leading from the chewy to the chivy. Each and even the subtlest act of ours is, therefore, capable of starting an avalanche of cause and effect, like the one portrayed first literally in Ruben Östlund's *Force Majeure* and then by a mass of frosted people sliding down a hill in the Alps in the final shots of the movie, changing the face of Nature and humanity irretrievably from the point of its performance onwards. Equally ethically controversial in this respect are deeds that on the surface appear destructive and ominous, while in essence and in the long run they carry the world towards more enlightened realms and serve as counterintuitive signs of better things to come. A gang of robbers that attacks the protagonist in Paulo Coelho's *Alchemist* and serves as an invaluable savior rather than a devilish hindrance in the context of the story as a whole is merely an evocation of the legendary story from Qur'an wherein Moses travels alongside Al-Khadir, a rarely knowledgeable sage of his times who was to teach Moses the secrets of divine being (Al-Kahf(18):60–82). During their journey, Al-Khadir first scuttled the ship on which they embarked and sunk it down; then he killed an innocent boy in the street; finally, he noticed a random wall that was about to collapse and spent hours setting it straight. When Moses uttered, 'If you had wished, surely, you could have taken wages for it', in an atypically entrepreneurial manner, Al-Khadir cut it off by saying, 'This is the parting between me and you' and gave an explanation of his controversial acts: the ship of poor fishermen was sunk because otherwise it would have been seized by a nearby foreign fleet and the crew would have been taken to slavery; the boy was killed because he would have done far greater damage to his merciful family later in life; and the wall was set straight because an immense treasure lay hidden underneath it, which would thus be found by two orphan boys from the town and used to bring them a plenty of rewards for the righteous path that they have vowed to follow in life. Hence, in the end, we realize that all things are connected, that 'all is like an ocean, flowing and touching all else, so that you touch at one place and it echoes on the other side of the world', as Dostoyevsky's *Father Zosima* taught. Speaking of ripples on the water, studies have indeed shown that placing a single ion in water modifies the structure of a million water molecules around it in a detectable manner⁵²¹. Added to this might be gazillions of more water molecules impacted, but at an undetectable level, meaning that when a child asks whether all the seas and clouds on Earth will be affected by this single ion, no one would be able to say that this idea is incorrect, even on the basis of the most rigorous empirical thought. Being aware of these subtle but omnipresent causal links, albeit of the most terrene and commonplace physical nature, can make us utterly humble, as they teach us that the simplest being conceivable, static and silent, is equivalent to the wildest acting upon the world around one. On one hand, this insight makes a whole universe suddenly open before our eyes, wherein everything, alive and inanimate alike, pulsates with an energy that we did not notice before, speaking tomes of insight to our wondrous hearts. On the other hand, we become absolutely sure that we do not need to make great deeds that the whole world would know of in order to crucially influence the path of its development. No, just like the ancient prophets argued, even though we may sit alone in a cave, cultivating heavenly thoughts will make the world become a better and a

more enlightened place with every breath of ours. Who knows how many lives we truly save by dealing with small things in life while nourishing a bright sprout of angelic devotion inside our hearts? This, of course, cannot be proved, and this is why the true religiousness as expressed in this idea will also forever remain the subject of three essential Christian qualities: faith, hope, and love.

Maybe the ancient alchemist quest for the philosopher's stone is all about finding the rocky base for the stable house that survives the flood from Jesus' allegory proclaimed in his Sermon on the Mount? Maybe this mystical philosopher's stone is present in each one of our hearts when they are blessed with peacemaking and blissfully benevolent emotions and aspirations? Maybe this is why the Christ decided not to transform stones into breads when tempted by the devil in the desert (Matthew 4:3-4), so as to show us how practical and edible things in life may matter, but objects and beings denounced by humanity as useless and pointless are those that hide the stairways to the stars?

The idea that small deeds build the great achievements of humanity has rarely been expressed in such a wonderful way as in Frank Capra's movie from 1946, 'It's a Wonderful Life'. The plot holding this idea as a message is reminiscent of the story about the stonecutter that I will tell you in a moment, but first things first. In this landmark, people's favorite Christmas film, George Bailey, a bank manager from a small town in upstate New York, the region of the United States where my American saga had begun, looks back on his life and filled with bitterness and disappointment utters: 'God, I wish I'd never been born'. His banking business had just gone broke because he had generously lent more than people could return, adding to his sense of being a failure because he never got to live his dream of being a global star in his professional field. Angels depicted as twinkling stars hear his laments and vote to make his 'wish' come true. So they send one of them to the Earth to show George how the world would look like had he never existed. The experience for George is shocking, and after seeing how small deeds carried out with common goodness in heart in unperceivable ways make the world a better place, he badly wants to go back. So he starts praying the other way around, wishing to once again be what he truly is. And his wish is, of course, granted. The first thing he recognizes as belonging to this new old world is his daughter Zuzu's petals he finds in his pocket. Metaphorically, it also symbolizes how small signs can lead to fantastic discoveries in the spheres of our knowledge.

It is often disregarded that the life of Jesus was, likewise, the life of producing invaluable effects out of small deeds, driven by the desire to 'be here now' and compassionately do good to others. And the story of his resurrection could be interpreted as the one showing us how the tendencies to destroy this all-encompassing, all-pervasive effect of small deeds performed with a whole lot of goodness are nothing short of futile. Furthermore, this story shows us how the path to enlightening discoveries is inevitably strewn by signs that signify perplexities, challenges and hardships. Like my compatriot, Novak Đoković, whose ascent to the tennis stardom via 'a way of winning even when he's losing' is hypothesized to be owed to his 'starting out as one of the most emotionally fragile', but being 'able to endure adversity... because of playing through adversity and stress all the time... (because of being) used to feeling that things aren't going his way... because he is in a perpetual state of micro-crisis... (because of) playing in a nightmare, in match after match', so should we learn how to use stress as a fuel for the fire of the soul that may enlighten millions, against all odds and against armies of adversaries who would be, at the end of the day, with heads bowed down, bound to conclude what one of fifteen thousand spectators on the Centre Court of the 2019 Wimbledon final noted: 'He wanted us to love him and we didn't, so he figured out how to overcome us as well as his opponent. We helped him learn to win by wanting him to lose'⁵²². If anyone now exclaims the same words as those whispered to Mick Jagger's ears by a journalist in the early 1970s, 'Your band thrives when there is adversity'⁵²³, I would nod my head in sympathy and think of all the times when the bad times gathering like dark clouds over my soul managed to not extinguish, but enkindle the fire of life and creativity inside me. Indeed,

alternation or entwinement of shiny joy and rainy sadness is what keeps the soil of our souls fertile, let alone the rainbows arched over their ethereal firmaments, I have come to conclude over the years.

Also, as causes and effects are not closely related in time and space, but each physical event is permeated by innumerable factors that influence its evolution, many of which could not be localized at all, each cause is an effect, and *vice versa*. This brings us to the circular nature of causality, due to which all the classical logical explanatory patterns fail in describing natural systems.

Evidently, like the girl who was suspended from the class in retaliation for giving a silent presentation⁵²⁴, I failed the exam and had to come to the same place again. This time, the question changed: the philosophy of pragmatism. But once more, I wanted to tell a story. This time it was meant to be the abovementioned story about a little Indian girl who enjoyed putting a stone underneath her pillow by night, so that all the beautiful dreams that she dreamt would be absorbed in it. Next day, she would give it to her fellow Indians, who would, before going to sleep, put it under the pillow and live in their dreams the wonderful and inspiring dreams of the little Indian girl. With the power of her chaste dreaminess, our little Indian was able to turn any rocks, be they the most rugged and unsightly ones, into the stones of Luz on which Jacob rested his head when he had the vision of a stairway to heaven (Genesis 28:10-18). She was able to cross the elusive, million moonlight miles long road standing before dreams and their corporeal embodiments and bring the old Indian proverb, 'God slumbers in the rock... He awakens in man'⁵²⁵, to life in the most adorable of fashions. Needless to say, this has ever since been my ultimate ideal in writing. That is, to inscribe the dreams that have comprised the essence of my spirit onto some tiny stones in which some chosen others will find a source of immaculate enjoyment.

And finally, I want to tell a most beautiful story of them all. It is the one of a stonecutter, a stone and a good fairy. Namely, once there was a stonecutter, diligent and marvelous in his work. He enjoyed chiseling stones and oftentimes, as he was engaged in his art, Pythagoras' vision of the transcendental trajectory traversed by the souls, from humans to animals to plants to minerals, would come to his mind and he would imagine crafting holy, antediluvian souls dormant in stones instead of sheer inanimate matter. He would muse during the long hours and days of fashioning stones into various shapes over the circle of life extending from children, those embodiments of holy consciousness, to lower and lower forms of life, all until arriving at stones, whereat the circle may close and incarnate an equal level of sanctity as that existing at the beginning of this circle. However, as time passed by and repetitive tasks endured, the traces of dissatisfaction entered first the stonecutter's thoughts, and then crept in, capturing his whole creative being, eventually finding reflection in every trace of his work. He seemed to have stopped radiating with a miraculous joy as before, and so did the products of his coarse art. Something suddenly turned out to have been wrong all of the time, at least in the stonecutter's head. And one day, while working, a fairy landed upon him. 'There is one wish that I would make true for you; think well', she whispered. 'I want to be someone else', he said without pondering much. He recollected how once he saw rich ministers strolling by in chariots, all proud of themselves for being so important, at least in the eyes of other people. 'A minister', the stonecutter said. 'Alright, your wish will be granted', the fairy said and transformed the stonecutter into a minister. So he started his new career as a minister. But after some time, he realized that the satisfaction was far from complete. His whole being began to cave in under the burden of disgust over the superficial world of ego, self-interest and fake creativeness that was everywhere around him. And so, desperate and disappointed, he looked up, as far away from the ills of corrupt humanity multiplying around him as he could, got bedazzled by the Sun and called fairy for help again. 'I want to get away from this rusty, egotistic and selfish humanity. I want to become the Sun. It is untouched by the human pettiness and trouble'. Impressed by the shining constancy of the Sun, thus, he went on to become it. Alas, after enjoying in giving the source of life to the planet below for a while, he noticed that clouds could block his rays anytime they wished so. No matter how hard he tried to wash a

destitute soul dear to him with sunlight, if clouds stood in the way, all his efforts were in vain. ‘Maybe I should have become a cloud, for clouds seem to be more powerful than even the Sun’, he whispered, the fairy heard it and with a single stroke of her magic wand the stardust was strewn and he went on to become a white, puffy cloud, traversing the skies, cleanly and elegantly. He could float over the face of the world and enjoy in superb views of it, wholly unattached to the petty worldly issues that poisoned the Earth below. Still, after a while he realized that he could not float wherever he wanted to, as he happened to be carried away and taken places by the air currents against his will. ‘If the streams of air can disobey my, the might cloud’s will, then it must be better to be wind. Hence, he invited the fairy again, telling her that he now wants to become the wind. ‘It can move everything, yet no one can touch it’, the stonecutter explained his choice. And so he became wind, throwing hurricanes when he was angry, setting mild breezes when he was happy, and calming down air currents completely when he was tranquil and meditative. But then, after a while, he realized that even his enormous power is not sufficient to move some of the tiniest objects on Earth: stones. No matter how small it was, the wind could not move it from one place to the other. So he said, ‘This is the final foundation of life. When you become a stone, you are the firmest and the most stable thing on Earth’. And so, with a little help of his fairy, he became a stone. He did enjoy the peace and stability of being a stone for what seem like long epochs of time, but then, all of a sudden, he sensed that even he does get slowly changed. He turned around and how amazed he was when he saw his own face in the agent causing this change, all along with that look of devotion and the beads of sweat sliding down the careworn corrugations engraved in it. It was the old stonecutter, so familiar to himself, carefully, with an immaculate patience and precision chiseling the stone he held in his lap. The tears of repentance rolled down his stony face, as he cried for the final help of his fairy. She blessed him and once again he became what he had already been: a stonecutter, though, after this whole journey and the excruciating change of perspectives that it involved, wiser and more satisfied, profoundly happier one. Thus, as the blind spot effect indicates, the traveler traveling away from his own land embarks not only on the path of knowing the foreign lands better, but knowing his own land better as well. In a beautiful way, this story signifies how every tiny detail and action in the world has its own crucial meaning for its evolution. As everything is arranged in circles, losing one of these crucial factors would mean that the entire circles may break down. But on the other hand, the convenient side of causal cycles, as opposed to linear chains, is that we need not look for the initial cause in order to change the way it spins. Instead, we can exert an influence on it from any point on its surface. Another meaning of this story is tied to the importance of cross-disciplinary, systemic thinking, the one that is not overspecialized and constrained to certain limits, but spans limitless fields of human inquiry in order to connect everything to a single whole, and thus live up to the ideal of true religiousness as the creative way to connect everything to everything else, implicit in the very Latin root of the word ‘religion’: *religare*, meaning ‘to connect, to unite’. But most important of all, this story illustrates how we ought to find satisfaction in small things, in playing with tiny and seemingly insignificant stones that we find silently sitting by the road of our lives.

Any tiny detail of Nature can thus present the starting point for our philosophy to come to the highest summits of human knowledge. Thus, I love to say that Nature and our experience are like a pyramid. Whatever the starting point of our inquiries, we can always arrive at the very peak of it. With a little bit of imagination and cordial fancy, we could transform ordinary seashore pebbles into the most precious diamonds of thought, with which divine Nature will invisibly crown us. Using metaphors as the crucial element that is to be ingrained deeply into our patterns of reasoning seems to be a necessary prerequisite for succeeding in these sublime endeavors of ours.

For a long time the classical intellectual streams maintained that human thinking is limited to the logical patterns of induction and deduction. However, that is not so. Ever since the dawn of human

consciousness, analogies and metaphors have presented an equally important creative force in human thinking. In fact, the essential messages that Nature communicates to humans are transmitted as metaphoric signs that draw parallels between different perceptual and conceptual levels of the experiential reality. Thus, it is impossible to find a natural system that could not serve as a metaphor for the order of the Universe as a whole with its own intrinsic order and interaction with the environment. Previously, I have shown how observing a single tree can lead to many metaphors that may enrich one's ethical and aesthetic understanding of the reality⁵²⁶. The same is with any stone, be it a littlest and a most mundane we could think of: take it in your hands, inspect it with a great insight, imagination and scrutiny, and you are bound to discover infinite universes of inspiring ideas and guiding stars in it, ending up devoured by George Seferis' motto: 'My own gods, these stones'⁵²⁷. The question Jorge Luis Borges asked, 'Does this Aleph exist in the heart of a stone'⁵²⁸ could be therefore answered with one big Yes. By looking at it alone, we can learn about the endless secrets of nature, our being and life.

Learning how to 'see a world in a grain of sand and a heaven in a wild flower, hold infinity in the palm of your hand and eternity in an hour'⁵²⁹, as in the William Blake's *Auguries of Innocence*, may, in fact, put us on the way to become a true systemic thinker. For, recall, one of the essential aspects of systemic thought is the applicability of its relationships to an endless number of different systems. And learning how to move back and forth between these systemic, all-encompassing thoughts and their reflections on small, directly observable systems, thus dynamically shifting our attention and references from the small and special to the great and general and *vice versa*, hides the key to mastering the true art of systemic thinking. Another crucial principle that all the systemic thinkers are aware of is the contextual co-definition of natural qualities. Namely, the qualities of systems are not defined by what they carry inside them solely, but by the environment that they exist in as well. Therefore, for a talented systemic thinker even a small stone may present a source of limitless discoveries and descriptions, knowing that even though this tiny stone may not change, the 'realistic' context in which it exists and the 'idealistic' context in which it is observed may be subject to endless modifications as the wheel of the evolution of the Universe keeps on spinning, which would bring about seeing always new inner qualities of the stone in always new lights.

In this section, I have thus shown that the balance between logical and metaphoric thinking, inherent in systemic reasoning, presents the way to reach the highest summits of human knowledge, and connect everything with everything else. Whereas the logical threads of knowledge can be imagined as connecting elements of ideas horizontally, the metaphoric, analogical reasoning may be due to its inherent character of connecting the relationships between various distant organization levels by invoking their analogous similarity depicted as the one spreading vertically. Being able to connect pebbles with stars and the other way around can be done only in harmony between logical and metaphorical reasoning. One more balance, crucial for sustaining human abilities of creative reasoning and living, has thus been outlined.

But as the end of this section is approaching, and we have so far mostly talked about balances, it seems to be a final time to make a diversion, a change of the course by a crescent Moon. For, as we have already said, the balance between balance and imbalance presents the ultimate balance in our lives, and the only one through which we can reach the ideal of simultaneous sustainability and evolution. Hence, without a final step away from the explicit talk about balances, this whole talk about balances cannot be complete. This is because in a space wherein sole orderliness reigns, cravings arise for the dissipation of integrity and a loss of control under the volcanic eruptions of dreamy energies, whereas cosmic chambers permeated by disarrayed flights of fancy naturally call for the legionnaires of order to set their marching feet in. Thus, I invite you to enter this short interlude, which, itself, is, in fact, an essay about

the metaphors and systemic reasoning, a tribute to a tiny blink embellishing the human heart, and an ode to the all-encompassing beauty hidden in small things.

Viva Commodore 64! Or the story about childish simplicity, the serenest wonder, minimalism and eternal beginnings



‘Innocence is the child, and forgetfulness, a new beginning, a game, a self-rolling wheel, a first movement, a holy Yea’

Friedrich Nietzsche, *Thus Spake Zarathustra*

This is how it was supposed to be. One picture only. A story about the minimalism with not even a single word in it.

One picture is worth a million words, some might say; and particularly this one, I would add. For, in the end, how would you speak about the merits of simplicity and minimalism using long-winded thoughts and intricately crafted sentences?

So, I was about to leave you glance at this wonderful screen and embark yourself on the journey of finding out what its relationship with everything appearing in the title of this section would be. But you already know by now that when I was a little kid I used to run around and whenever I heard a word that sounded interesting to me or noticed an amusing detail in the world around me, I would run to my father, hug him and say *zapamti, zapamti*, meaning ‘remember, remember’. At the end of the day, I would make sure that he remembered it all. I would lay my head on his chest and make him reproduce all I wanted to be kept remembered. I would revive the memories as I fell asleep, as peaceful and gentle as only a child can do. In a way, my Dad provided a backup memory for the tiny one of my own at that time, still unable to fit all the signs that would help me find again the inspiring experiences on the mighty and terrifyingly big map of the world.

That is, my innate aspirations to map my impressions and keep them saved for me and others has ever since prevailed over a leisured attitude of forgetting and letting the impressions idly get in one ear and out the other. But still, I believe there is in me something of that personality aspect described in William Blake’s verses: ‘He who binds to himself a joy does the winged life destroy; but he who kisses the joy as it flies lives in eternity’s sun rise’.

In the end, in order to know much, one has to be prepared to forget much.

Some people love to live by carrying the awareness of their deeds and accomplishments everywhere with them. Although this may provide a stable ground to lean on and make up for their lack of self-confidence, it is detrimental for their further progress on the spiritual plane. There is an old Hindu story about a teacher who heard how his disciples walked on the water with a mere mention of their teacher's name. The teacher started thinking: 'Well, if my disciples are so powerful to walk on the water while chanting my name, how much more am I then powerful?' So he stepped on the water, saying 'I, I, I', and immediately drowned. Lest they perish in a similar way, the legend says that the Roman generals, as they were proceeding down the streets of Rome after winning major battles and the plebeians were chanting in their praise, hired slaves to ride in their chariots and do nothing but whisper in their ears, '*Respice post te. Hominem te esse memento. Memento mori*', meaning 'Look behind. Remember thou art mortal. Remember you must die'. This, of course, counts as one of a sundry of reasons why I have always praised the simultaneity of digging out the sources of actions from the divinest depths of myself and living solely for the sake of sanctifying others, perceiving this balance to be the key that opens the door to a miraculously creative and inspiring existence.

In that sense, I enjoy sometimes giving up on the awareness of who I am in terms of my professional and artistic achievements of the past. And when I do immerse myself in this purity of forgetfulness, I feel as if the core of my creativity expands once again. And then, I tell myself I did not do truly anything so far. The best is yet to come. Then, I start feeling light as a feather in my spirit, and my childish sense of wonder begins to revive, and my whole creative being starts to rejuvenate from inside out.

Then I remind myself of the words of Lao-Tzu: 'The Master acts without doing anything and teaches without saying anything. Things arise and he lets them come; things disappear and he lets them go. He has, but he does not possess; he acts, but does not expect. When his work is done, he forgets it. This is why it lasts forever... Do your work, then step back – the only path to serenity' (Tao-Te-Ching 2 & 9). I also remind myself of the brilliant observation Béla Hamvas made in the epilogue to his lifework, *Scientia Sacra*: 'Creation of this work is not merely creation; it is rather endless creation and surrender, all until nothing remains, and then the surrender of this nothing, and then the surrender of the surrender'⁵³⁰.

In the end, forgetting is also a way of forgiving, that likewise polishes the mirror of our soul.

Nevertheless, let me tell you now a few words that could guide you in the attempt to understand the meaning of the pasted screenshot.

If I were to travel back in time and enter my childhood again, I would find myself alone, sitting enchanted in front of a C64 computer and the screen shown above, appearing immediately as you switch the computer on. The cursor is blinking in resonance with my heartbeats, winking faintly and sending out signs of sweetest sympathy, opening the doors of joy and mystery alike before my smitten feet. It is 1984, the year in which we acquired our first C64 and played Decathlon until joysticks broke one after the other, the year at the beginning of which the legendary issue of the magazine *Galaksija*, 'Computers in Your Home', came out, prompting thousands of Yugoslavs to buy their first personal computers⁵³¹, the year in which *Electric Dreams*, the cinematic ode to computer love, was released, and the year, incidentally or not, set forth by the forefathers of the early computer science, perhaps inspired by the Orwellian timeframe⁵³², as the one by which a utopian programming language, perfect in every aspect, is to be developed⁵³³, the midpoint of the magical decade⁵³³ in which the arrival of a computerized culture could be smelled in the air, along with the promises of unrestrained technological advancements, yet with neither the dark of drum 'n' bass, of dubstep, of cannabis smoke, of snowball needles, of AIDS, of the curse of globalization nor machine gun bursts and a myriad of meaningless wars, pending like Poe's

pendulum, anywhere in sight. All is in bliss and millions of roads, serenely sensed by the seafloor of my soul, lie open and welcoming around me, stretching like sunrays around a shining star.

I have ever since been inspired by the thought that many details in the world around us can be read as metaphors of the path of destiny spread ahead of us. The co-creational thesis that was much later to be developed explained this effect by referring to each detail of our experience, including perception, as arising from a coalescence of the subjective constructive action and the objective features of reality. As a result, however, the experiential details are neither subjective nor objective, but something in-between. In any case, they could be seen as reflections of both the ontological foundations of the world around and the cognitive foundations of our being, both of which are never truly perceivable *per se* and as-they-are. That is, there is a dialogue between our self and Nature taking place in every tiny detail and aspect of the world as we perceive it, and we are unable to untangle where the reflections of our deepest epistemological stances end and the reflections of the underlying music and guiding lights of the divine begin, and *vice versa*. Our world is the mirror of our true self and of the hidden foundations of Nature, or God, if you will. Everywhere we could see Biblical signs of the times. In every flower, tree, grain of sand or humane glance.

Hence, one can always regard the signs of the world around as presenting metaphors of how the world within is and how it will be. When I think about the blue screen of C64 and the message READY on it, with its charmingly blinking cursor, exactly at the optimal rate of our heartbeats, it tells me that it may have been the sign of the beginnings. Everything in my life lay open and possible. The shimmering sea of endless possibilities enlivened in my heart by this little sympathetic blink.

The question, now, is where this simplicity of childish beginnings went.

Now I know I can regard the worldwide development of computing appearances and trends as a metaphor of my own life as well. It started as simple and chaste, with me sensing magic every time I would enter the world inside the computer screen. For me, a mere transition from a black-and-white to a color display (which, by the way, I never had, but only saw at a friend's place once) induced a sense of magic, the mere recollection of which still stands impressed in my mind. Maybe even older generations who witnessed the first radio and television devices had similar impressions. The only difference is that computers were from the very start interactive. The blinking cursor is not there to make you passively adjust to what it has to say, but invites you to play and discover. It invites you to a dialogue, the symbolism of which has a special place in the co-creational thesis. For, the evolution of life is neither neo-Lamarckian in which organisms passively accommodate to conditions posed by their environments nor neo-Darwinian in which only mutations originating inside the beings, without presumably any effect of the environment, are taken as responsible for evolving life. The evolution of life proceeds through an incessant dialogue between sentient beings and Nature, in which both the organisms and their environments are subject to mutual changes and advances. Hence, every evolution can be considered as a co-evolution. The founding principle behind the use of computers is, likewise, a dialogue, a co-evolution of a kind.

I still feel an indescribable astonishment when I recall the moment in which I realized that there was a way to get from the visible appearances on the screen to their underlying structure, and, furthermore, manipulate with them. This revelation is quite comparable to the one of discovering that it is the invisible and hidden roots that provide support and healthy supply of nutrients for every tree in Nature, and that the impalpable qualities of life are the ones that truly sustain humanity and vitally nourish the essences of our beings. When I realized on top of that that there was a series of languages through which I could call different commands that affected the onscreen events, my surprise was even greater. Ultimately, everything is expressed in terms of zeros and ones, and how all these magnificent

displays on the screen were made out of the combinations of these two primitive digits remained a sweet mystery to me.

But you know, just as the modern operating systems and games now comprise an overwhelming amount of details and provide gigantic spectacles in front of the gamers' eyes rather than endowing them with a sense of serenity, the world has become a complicated place and is in need of constant clarifying, ordering, and rearranging so as to keep it sensible and meaningful to us. A child has turned into a man, and as such has to be engaged in serious battles between order and freedom. But are these battles merely reminiscent of the ones between Don Quixote and the windmills? Maybe returns to the wondering simplicity of chaste and pure childishness is what is required to save the world.

In a poem having the symbolic title of one of the most celebrated ZX Spectrum and Commodore 64 games, Skool Daze, Jon Deaux says the following regarding the transition of a child to a man via the immersion into this early gaming experience: 'You ever felt so far gone you couldn't be sought? During this journey there were some things I had to learn that couldn't be taught. The flux from boy to man and how to be one, with questions to be answered like will I live to see one?'⁵³⁴ And now, as I, having the privilege to be the first generation to go back and replay the early computer games with a sense of nostalgia that is completely new to humanity, millions of neurons may be switched on and their firing patterns may replicate those that they danced to when I was a child and magic would happen in my mental microcosm.

One thing about the future that I am prompted to observe impromptu, on the fly, by this abstract immersion into the past is that games can be great grounds for bringing about the marriage between science and art, which I, myself, have been dedicated to ever since I read Hermann Hesse's aforementioned Glass Bead Game on a summer holiday at 17 years of age. That computer games integrate science, both at the levels of hardware and software, which they can act as a testing device for, is widely known and pretty obvious. However, their artistic potential is often ignored or disputed, usually because of the low focus on evoking empathy on behalf of their players⁵³⁵. And yet, anyone deeming that games cannot be artistic *per se* can be directed to chess, perhaps the closest thing that humans have ever come to a Glass Bead Game, an elusive combination of science and art. With the pending advent of collaborative art forms and with the presumable evolution of human consciousness away from seeking triumph for the ego and toward seeing everything from broader, more holistic and selfless perspectives, there is no doubt that future will bring games with increasing features of arts, including not only the purely expressive ones, but also the classical and romantic ones, all along with their traditional emphases on beauty and harmony.

In any case, I believe that my generation holds a special vista in time that enables it to observe and grasp the pathways of progress in the world in quite a unique light. Computers themselves possess a special place in the history of humanity as they were the first ones to open windows to a parallel reality, a virtual realm of existence, a world within a world. And that tiny world is with every new day becoming increasingly intricate, captivating and realistic, getting ever closer to the real world it has imitated. In that sense, I feel as if our generation had the chance to stand at the very beginning and follow how this shift from simplicity to complexity went on. When computers are considered, I feel as if I was there when the world began to exist.

It was also an invaluable privilege to be able to deal with simple animated projections only and thus be forced to find in them a source of endless satisfaction, amusement and wonder. Nowadays, kids have their first gaming experiences while being immersed in gaming environments filled with an exorbitant amount of information. Honestly, I feel blessed for having had a chance to have my first experiences with computers when the things were still so immaculately simple. For, if you learn to find

all-encompassing meanings in simple settings, you would certainly be able to find them in more versatile ones. The situation is, however, not that straightforward when you go the other way around.

Thus, this C64 metaphor may have subliminally instilled in me 'the eyes of the heart' capable of seeing a spotless beauty in simplicity and minimalism. Hence, no more words for today. Even in the long run, maybe I shall do the same as St. Thomas Aquinas, who, remember, wrote and wrote and wrote, and then in the midst of a sermon all of a sudden stopped talking, started to ponder and proclaimed that everything he had written until then seemed like a straw to him, and never wrote anything else again⁵³⁶. Maybe the all-encompassing beauty of love and life will overflow my eyes, and the whole sense of purpose ascribed to language and words as the ways to communicate will be washed away. Maybe I will indeed make that magical pirouette of which Lewis Thomas thought following the devastating impression of watching a dull, prosaic, affected adult adulterated with selfish whims on his TV set in the early 1980s: 'If I were sixteen or seventeen years old and had to listen to that, or read things like that, I would want to give up listening and reading. I would begin thinking up new kinds of sounds, different from any music heard before, and I would be twisting and turning to rid myself of human language'⁵³⁷. And then, as in the end of Wittgenstein's tractate, I will be left all alone amidst the silence of the stars and an eternal wonder that they shine with.

(Let me whisper you this: whenever I listen to my musical recordings I feel absolutely sure that I would never be able to attain the same level of artistic expression in my writing. But nevertheless, the desire is strong to write and impress what I am onto stones and pebbles that some future generations, like the ones of the dreamy Indian, would be able to put under their pillows and dream, dream, dream.)

Be that as it may, life begins with a staggering simplicity, continues with adventurous journeys through the convoluted realms of challenging complexities, and returns to serene simplicities in the end. Maybe the story of how personal computers develop will take place the same way around, and in a distant future, after the current trend of obsession with aggressive displays of sheer energetics is over, we will witness returns to appreciation and implementation of the ideals of minimalism. Then, all the enchanted forests of complicated operating systems and animations would dissolve and sink down to the bottom of the sea of the graceful simplicity of soothing motherliness and of subtle emotionality with which babies in heavens are lulled to sleep.

Then, we would be left with a childishly simple blinking of the cursor of our heart in its innocent readiness to play. We would face others filled with this inner purity, and start beautiful dialogues that only mature children can have, all for the sake of building sandcastles of being and knowledge in togetherness, with no pretense, rivalry or rewards in mind, innocently, holier than the holiest formal consecrations can be.

Until then, I will keep on believing that the time will come when a wonderful screen like this, blinking with sympathy and ready to start the game of life, will enlighten the heart of each and every one of us.

READY?

On the art of pursuing middle Ways

'Tao is not choosing between this or that. It is moving along with all of them'

Chuang-Tzu

'The most important doctrine is not to have any'

Heinz von Foerster

In this chapter, I have tried to demonstrate that inherently related to the idea of co-creation of experiential qualities is the art of pursuing Middle Ways in our attempts to find the harmonious solutions to the problems and perplexities of the world. For, if the very perception of ours and every other aspect of our experience derive from intersections of pairs or multiples of creative domains, then the necessity of adopting the Middle Way approach under all circumstances becomes obvious. Creative behavior is always typified by giving hands to every being and idea proposed and from there on holding hands and walking forward in togetherness.

It is, in the end, important to realize that none of the poles we could conceive of could exist *per se*, that is, without being balanced by their opposites. For example, we all know that each Yes as an answer to a question implies a No as an answer to another question that falls within the same context, as well as that the existence of empty spaces between the lines and shades on a drawing, between the notes of a musical piece and between the stars on the sky are required to endow these pieces of art, artificial and natural alike, with immaculate meanings. Which may be why Claude Debussy loved to claim that ‘music is the space between notes’, and which may be what prompted R. S. Thomas to poetize in his *Via Negativa* how ‘God is that great absence in our lives, the empty silence within, the place where we go seeking, not in hope to arrive or find. He keeps the interstices in our knowledge, the darkness between stars’. In other words, the existence of nothing is required for the existence of something. Then, the very thought of smallness implies our implicit comparison with something bigger than the system in question. Every attribute of goodness and beautifulness implies that we implicitly presume what is evil and ugly. The process of thinking implies thinking about past, and in that sense, conceiving novelties, in essence, equals recycling past. Thus, there is no present without the past, and *vice versa*. Every awareness of periodicity implies an implicit knowing how novelties should appear. And so on. The situation is the same with all the balances that may or may not be proposed within this section.

Finally, we are coming to the conclusion of this section. Having sketched a few major examples in which balances between polar opposites were shown to yield the most harmonious solutions for the progress of systems in question, we could now apply the classical inductive reasoning and say that instead of unilateral solutions, maximizations and minimizations, it is balances and optimums that present the keys to wise thinking. As pointed out in another attempt to reconcile the standpoints of idealism and realism, ‘disagreements in philosophy are due to exclusive emphasis on one member of any given dyad’⁵³⁸. Or, as Blaise Pascal stressed out, ‘Nature has set us so exactly in the middle that if we alter one side of the scales we alter the other one as well. *Je faisons, zoa trekei* (meaning ‘animals runs’ in deliberately ungrammatical Greek). This leads me to believe that there are certain mechanisms in our head so arranged that we cannot touch one without touching its opposite’⁵³⁹. And just as this ontological premise served as the basis for the erection of a heavenward, not Manichean worldview in the French mathematician’s head, streaming toward sublime morality, not unscrupulousness and apathy, so should the stardust of praise of middle ways scattered across these pages be seen as a route to the acceptance of all and the discovery of love and beauty in everything, being the grounds for purifying our hearts and making them capable of glimpsing God in the grandest of His glories.

However, we should not forget that, ultimately, perfect static balances can be as unproductive and fruitless as total and extreme, permanent imbalances. We need to accept the beauty that arises from the strange interplay between certainties in uncertainties and *vice versa*. The beauties of science, religion and philosophy lie not in firm leaning onto given paradigms, dogmas and tautologies, but in subtle combination of our faith in them and our endless questioning thereof from many different perspectives. Thus, we should not be hesitant to step away from the states of perfect balance, knowing that steps like these, although moving us temporarily away from the state of a perfect harmony, present the only way to further progress and evolve.

Even if William Hogarth did not write a whole book, titled *The Analysis of Beauty*, to justify his opinion that an undulating line is intrinsically more aesthetic than an angular sum of straight lines⁵⁴⁰, we should keep in mind by now our canoe paddler, whose only way of advancing straight ahead is by drifting a bit away from this straight course whenever he makes a stroke. Likewise, making a step away from a status quo inevitably distances us from the perfectly balanced state, although it presents a necessary precondition for the evolution of ourselves and the world. In order to be successful in this evolutionary walk, a fine dance between moving to and from the perfect balances is required. This is not to say, however, that this whole chapter with its preaching about the crucial role of balances in life is a waste. No, it still teaches us that it is essential to recognize the balances in life, and with having them in mind to engage in the wonderful systemic dance in which we make ever more beautiful moves and advance forward by gracefully playing around the balance between the balanced and imbalanced states.

In the end, whenever I have looked back at the origins of the tiny sparkles of inspirational thought that came to comprise this whole book, I realized that they have come out of my acceptance of wrong attitudes, ideals and values, although recognizing them as such due to my constant reference to the ideals of balance and eternal beauty that I have ever since carried within. The combination of these inner muses of beauty and love that dwelled inside of me and the valuing of balance and harmony at the level of pure intellect have thus always shown me the way. But the question remains: would I have been able to follow the thread of this wonderful way of balance and beauty without these temporary fallings to the imbalanced states? Quite probably not. For, that is what the ultimate story of the dialectical nature of evolution of life and knowledge teaches us; namely, all novelties arise out of the encounters between theses and antitheses, between the bright vividness of life and the gloomy dullness of death, between the peaceful aspirations to balance and keep quiet on one side and the passionate desire to throw things out of balance so as to impel them to evolve towards ever more beautiful states on another. Consequently, stepping out of balance, just so as to return to it and fall out of it again, and so on and on, may be said to present the key to creative being in this life.

Change, music, dance

Change and music as the essences of life

‘Be the change you want to see in the world’
Mahatma Gandhi

Besides the metaphors of way, road, meeting and dialogue, there is another symbolism immanent in the concept of co-creational nature of experience. And that is the one of music and of an incessant change.

One of the consequences of the ultimate systemic art of balancing balances and imbalances mentioned in the first part of the book, as well as of many other systemic balances mentioned in the second part, is that incessant flow of change and of waves after waves inevitably pervades life and being in each one of their existential aspects.

As complementary to the element of periodicity that pervades life within all of its aspects poses itself Heraclitus’ riddle that ‘on those who step in the same river, different and different waters flow...’. And verily, as much as a fruitful and healthy being needs to firmly lean to specific concepts and behavioral patterns in order to maintain certain forms of stability in life, it needs to be ready to change,

to become new and born again at almost every instance of one's life. When one finds himself deeply engaged in enjoying the reading of a spiritual book, one may know that, in fact, one's being is then open to change, striving to become a better person. Otherwise, one would give up on learning and inertly release oneself to the streams of fate, far away from the true enthusiastic waves of faith and motivation.

In fact, not determination to remain the same at all costs and only manipulatively change others by preaching, but the readiness to change oneself in communication with others, through compassionate impressions and dialogues, carries the sprouts of true religiousness. Repenting, forgiving and shingly aspiring, being the elementary aspects of each prayerful attitude, may exist only on cognitive bases permeated with the subject's willingness to change. Whereas distantness, insincerity and torn ties of trust pervade communications that we enter unprepared to change at our very core, all the essential Christian qualities flourish on the pedestal of our longing to float and change with the nature of the world. Only a sincere willingness to change can bear the passion of love that 'believeth all things, hopeth all things, endureth all things' (Corinthians I 13:7). Thence, the words of D. H. Wilkinson can be well understood: '(Dirac's imperative of selecting scientific hypotheses based on aesthetic criteria) is only echoing William Blake: 'The errors of a wise man make your rule, rather than the perfections of a fool'. We can be wrong and often are. In any testing of the human condition we must be prepared to revise our judgments in the light of new evidence or new experience: it may suddenly strike us that behind the shimmering mistiness of the Monet cathedral there is only an architectural drawing but that behind the mistiness of the eyes of the Rembrandt there are the feelings and experiences of a lifetime'⁵⁴¹. Such astonishing, groundbreaking observations in our explorations of the world are, of course, reserved only for those who are ready to change with the wholeness of their knowledge and being.

The Way of Love and the nature of our existence are all about the Middle Way: being simultaneously united and separate, which is exactly what the metaphor of music signifies to us. Analogous to simultaneous separateness and connectedness symbolized by the imagery of the Way, acoustic oscillations arise through alternate moments of approaching and distancing of two nodes. They should neither become too distanced nor completely merged if the charm of music is to keep on existing. For, if we get too close to the beings of the world, we would also become literally closer on the inside, that is, estranged from our inner waves of inspiration, which is probably what Ian Curtis wanted to tell us with the famous title of the last record of his band, Joy Division: Closer. Even though the contact with a fellow human being is the sole source of spiritual happiness in this life, some distance between one and another must be preserved, lest the meaning of the story about all those Parisians who dislike the Eiffel Tower gathering at the café near its base because it is the only place in the city from which this grandiose architectural piece is not visible fall flat on our heads. On the other hand, if our distantness from the needs and heartbeats of others becomes symptomatic and pervasive, the flame of our creativity would become equally extinguished. The music of life arises only as the result of alternate moments of approaching and distancing of interacting entities.

Music has a power to change the world. Many wonderful characters from the history of modern music illustrate how nothing more than a guitar and a voice filled with awesome emotions and aspirations to deliver peace, goodness and joy to people is enough to start enlightening the world. Once I went to a local club to listen to a friend of mine playing music. And what I noticed was that all the faces around me shone with goodwill and warmth. Only later I began to wonder if I had been fooled by the enchanting way he played that night. Maybe it was the music in the air that provided a context in which all the surrounding creatures were seen as irresistibly bright and beautiful. In the end, I said, as there always needs to be an interpretational context present, whatever the cognitive attitude we adopt is, the fact that that evening, just like many other times before and after in my cognitive world, it was outlined

by a graceful music floating in the air and ringing across the walls is simply a natural way to make the world a better place.

In fact, as it teaches us to simultaneously listen and create, playing music presents an excellent way to practice the art of co-creation and the Way of Love. Once we make a step forward from our unskilled inability to listen while we play (and the other way around, resulting in our notes dissipating from the rhythm of the songs), the art of finding brilliant answers to carefully listened and understood messages of our surrounding in a way that blends our technical mastery with an intuitive sense would dawn upon every aspect of our daily communications.

During my ruminations on the necessity to intuitively sense the zeitgeist pervading the tiny piece of the Universe in which we stand and adjust our expressions thereto, in, naturally, always new and unrepeatable manners, the following story often comes to mind. It is about a young pastor who came to a small church to hold a sermon on a topic he had usually spoken about. There, however, he saw only one person sitting in the pews. He immediately recalled the story of a shepherd who went on a search for one lost sheep and left ninety-nine of them in the safe of a sheep pen. When he found the lost sheep, he was 'happier about that one sheep than about the ninety-nine that did not wander off' (Matthew 18:13), as the famous Christ's parable from the Gospels tells us. 'If a single sheep should be loved as much as the whole flock' said the pastor to himself, 'then even though I have one person in the audience only, I ought to strew it with as many beautiful insights as I would strew a hundred of them'. And so he started lecturing just the way he would have spoken to a tightly packed audience. After his talk was over, however, the listener, though delighted, raised his hand and made the following comment: 'You know, the lecture was fine, but I am only a poor shepherd, and when I have to feed a single sheep, I do not give her a food for the whole flock of a hundred of them'. This is not to say that we should not bleed with passion even before a single soul that listens, remembering all the while Iggy Pop, who first shed blood on the stage before 12 people seated in the Ohio Wesleyan University auditorium with the capacity of 1500⁵⁴². After all, if Os Guinness' precept, 'I live before the Audience of One. Before others I have nothing to prove, nothing to gain, nothing to lose'⁵⁴³, is comprehended not as a deliberate deafness to the cries of the neighboring souls, but as freeness from the seeking of approval for one's actions from the society, then we could be sure that this divinity with which we co-creatively communicate as we meander through life urges us to treat every surrounding spirit as a universe in itself. For, both the value of a human life and the value of the totality of the world as we know it are infinite and neither is, for that reason, greater and worthier of our attention than the other. Correspondingly, as the story about the shepherd at the sermon instructs us, we should never underestimate the need to adjust our way of delivering thoughts and emotions to people that we have in front of us, lest we be accusable of disregarding one of the two central Christian commandments, that of loving another, in order to listen only to the one that complements it, that of loving God whose voice and guidance resonate inside us. This is exactly what the co-creational thesis with its dialogical and co-evolutionary aspects is all about: active listening, unreserved absorbance of influences and receptiveness to all kinds of impressions befalling us, while at the same time endless giving and yielding of actions that arise from the deepest core of our being with the purpose of impressing and enlightening others. At the end of the day, each being at each moment in time is a unique cognitive apparatus that evolves into something new with every tick of the cosmic clock; as such, at any time point it requires a distinctive, unrepeatable and inimitable approach to reach enlightenment.

These waves of intuitive inspiration should be like flying kites across the sky of our mind. But they need to be tightly sealed to firm logical foundations of thought, lest they be flown away. Similarly, in order for guitar strings to produce music, they need to be firmly sealed on their ends as much as to flexibly wave upon their touch. Without either of the two, the sound of the music would not be able to

arise. When rigidity is too high, the strings would break, but when the flexibility is too high, the strings would be too loose to vibrate with the right frequencies. It is the balance between logically preconceived and improvisational that comprises all the masterful deeds in life. Furthermore, the metaphors of flying kites and their supporting bases and of guitar strings could be identified with an endless number of events. As such, they present wonderful systemic guidelines of thought.

When asked about the sources of inspiration for developing his theory of relativity, Albert Einstein merely said: ‘The theory of relativity occurred to me by intuition, and music is the driving force behind this intuition. My parents had me study violin from the time I was six. My new discovery is the result of musical perception... If I were not a physicist, I would probably be a musician. I often think in music. I live my daydreams in music. I see my life in terms of music... I do know that I get most joy in life out of my violin’⁵⁴⁴. At another place, Einstein alludes to the complementarity of science and arts by claiming that ‘both music and scientific research are nourished by the same source of longing, and they complement one another in the release they offer’⁵⁴⁵. And on yet another occasion, Einstein says the following: ‘I am enough of an artist to draw freely upon my imagination. Imagination is more important than knowledge. Knowledge is limited. Imagination encircles the world’⁵⁴⁶. We can thus conclude that the sense of beauty and inner harmony presents a core of every truly productive exhibition of the powers of the brain. Henceforth, love and compassion could be considered as the essence of rationality and intellect. At the end of his Critique of Pure Reason, Immanuel Kant observed that ‘two things still fill my mind with ever increasing wonder and awe... the starry heavens above me and the moral law within me’. Not only may his division of an ultimate mystery of being to two elementary poles be correlated with metaphysical poles – the essences of mind and Nature – that in their co-creational interaction give rise to the spiritual and physical evolution of life and matter, but it is apparent that the two resulting aspects of human creativity – the productivity visible in the world outside and a compassionate heart cultivated within – always go hand-in-hand and can be thus considered as one and the same⁵⁴⁷. There is wonder that drives the wheels of science swirling around the stars of love, and *vice versa*.

The ethics and aesthetics of the blind spot effect

‘What does a fish know about the water in which he swims all his life?’

Albert Einstein

‘What my net won’t catch isn’t fish’

Arthur Eddington

‘He was condemned as a friend of harlots

And the harlots became virgins.

He was condemned as a friend of thieves

And the thieves restored their stolen goods fourfold.

He was condemned as a friend of poor fishermen

And the poor fishermen caught the universe in their nets’

Lao-Tzu, *Tao-Te-Ching* 22⁵⁴⁸

A considerable amount of research on human perception has been conducted to confirm the fact that we can perceive only differences. As biological creatures in general, we are all predestined to sense only differences as information. In other words, only boundaries are able to produce something perceptible. The same reason can be applied within all other cognitive aspects of our beings as well. The

blind spot in our visual field, implying that we do not see what we do not see, presents an ultimate illustration of this stance.

In short, the ‘blind spot’ effect, inherent to any imaginable epistemology, tells us that we ought to be incessantly switching perspectives of observation and contemplation in our learning about life in order to avoid being ‘blinded’ by some rigidly held premises of reasoning. If you have ever wondered why martial artists ceaselessly move while waiting for the opponent’s assault, it is because long time ago the Japanese swordsmen realized that there is not a single posture that would make them perfectly receptive to every possible angle of attack⁵⁴⁹. Similarly, to avoid blindness with respect to wondrous little perceptions and ideas that may unnoticeably pass by the eye of our mind if we happened to be staring in one epistemic direction only by dogmatically relying on specific sets of premises, we have to constantly move back and forth on the wheels of infinite doubtfulness, curiosity and the ability to empathically embrace all kinds of worldviews that pop up all around us. Dynamics is thus once again confirmed as the new statics.

Thereupon it becomes clear why ‘it is sometimes hardest to see what is right in front of our eyes’, as Wolfgang Goethe once observed. It is the common fate of humans in social milieus to start valuing qualities of certain aspects of life only after they vanish. After being for a while in the presence of some lovely and precious beings and things in life, they may start sinking into the ‘blind spot’ background, and we may suddenly become startled with the very idea of possibility of their disappearance. On the other hand, temporary shifts away from some lovely things and creatures in life present the best way to truly meet them and increase the starburst of our love towards them. For, moving to and fro is how every type of music becomes created. And music has once and for all been the essence of all life.

The blind spot, inevitably present within each observational perspective, ought to remind us that moving away from objects and beings of the world is sometimes the best way for improving our understanding of them. For, if we were to remain in a constant state of facing them, these blind spots in our perception and reflection would produce a serious ignorance in our knowledge. The concept of the Way of Love, related to simultaneous connectedness and separateness, can be thus shown as neatly tied to this, blind spot effect. In my native language, Serbian, a single word, *put*, is used not only to denote a way, but also a journey, a road, a path, a line, and a few other things. As such, it coincides with the point that we have to be on a journey all of the time – metaphorically, that is, either in the domain of our reflections or in the real life – in order to avoid these blind spots in our thinking and behavior.

In view of this argument, a perfect ethics should not hesitate to openly show joy or gladness in face of some temporary leavings and breakaways. However, the right attitude is inseparably dependent on the context of the actual situation. For example, if a colleague whom you share office with at your working place announces his leaving for a conference or if a passenger sitting next to you on a train announces his moving to an empty cabin, it is quite ethical to express contentment due to the fact that you could now spend some time at work alone or have more space for a more comfortable journey, respectively. However, if a neighbor whom you had never got to know well decides to move, all your delays in opening your heart and becoming friends with him would seem to hurt now. Particularly because the element of connectivity in this case was missing, the element of parting may seem to be filled with regrets. When we do everything that is in our powers to revive love in the proximity of the fellow beings, the element of parting seems to be inspiring and sententious as well. The permanent question is, of course, how one can know that the best is really the best. In fact, it never is, which implies a certain eternal sadness to permeate every love in the Cosmos. The right ethics, therefore, always lies in preserving and promoting the balance of the Way of Love.

This also explains how good old friends that spend too much time together often make jokes with each other, as if mutually repelling each other, without any unpleasant consequences, whereas strangers normally greet themselves kindly, welcoming each other in their respective worlds, thus equally establishing the fruitful balance between closeness and distance. We should make sure to keep the loved ones enwrapped in the waves of a harmonious sense of unity that we shine with as much as to keep them mildly at distance, thus promoting their independence, self-responsibility and autonomous creativity. It is with this idea in mind that Khalil Ghibran wrote the following words: ‘When you separate from a friend, do not despair; For what you most love in him will be even brighter in his absence, like a hill that reveals itself to a mountaineer from a champaign...How can anyone be close unless he departs far away?’⁵⁵⁰ Unlike Confucius’ petty man, who ‘loses chastity in the presence of another man and grows hostile in his absence’, the holy man idealized in Ghibran’s poetry is diametrically opposite: cordial and loving near a friend and ever more loyal and amicable when the friend is not around, making the appearance in one’s thoughts only. This is to say that we need to endlessly dance back and forth, rejoice and join our hands and wave goodbyes and back again in order to live up to the ideal that true ‘friendship ought not to have any other purpose except to deepen the spirit; for love that asks for anything other than to reveal its own secrets is not love, but a net in which useless are being caught’⁵⁵¹.

The blind spot effect guides us to incessantly move away from where we stand in order to avoid the blinding effects of permanent observational perspectives. It essentially teaches us the importance of revisiting our own premises of reasoning by nourishing a childishly chaste and all-inquiring curiosity.

In order to define a single word, we need to step out of its own structural frames and use other words to describe it. The same is with everything else in life. Whatever it is that we desire to understand, we have to travel back and forth with respect to the given entity and place it within a variety of observational contexts in order to form a thorough representation thereof. If we want to analyze the stone that we use as a pedestal for our observations of the world, we need to step aside first; we cannot move it and get hold of it while still standing on top of it. As a result, the blind spot effect points at nothing other than a continuous cognitive dance through which we try our best to avoid the unavoidable invisibility of our implicit presuppositions. However, by learning how to vigorously dance around ourselves, as an ingenious whirling dervish dancer does, and thus endlessly revisit our own premises from various different perspectives, we have a chance to minimize their damaging effects on our reasoning.

No wonder that the virtual reality simulations in which one can guide animated representations of one’s own in interacting with others are nowadays used for treating social phobias⁵⁵². Namely, as we step out of ourselves, a new window to reality forms, and many of the frightening experiences that are persistent for as long as we are confined to single perspectives simply vanish. In order to overcome the freezing ignorance, frustration and fear, we should be open to incessantly changing our views, possibly all until we realize that the world is bigger than ourselves and immerse the modest limits of our ego into the endless vastness of the Universe as One.

The effect of time can be seen as a natural mechanism to enable incessant changes in perspectives. To be is to travel in time. And to travel in time is to relentlessly change the perspectives of looking at the world. Studies have shown that the memory of migratory birds is significantly better than that of their resident counterparts⁵⁵³, from which it could be deduced that going with the flow of perpetually new perspectives should make us intrinsically brighter than if we were to sit in a single niche for an eternity. No wonder, then, that time is the best teacher, and that all we should do is to learn how to flow with the subtlest stimuli that Nature drops before us in the course of the passage of the train of time.

Finally, the blind spot effect neatly explains why even the most enlightened creatures, the ones that illuminate the world with the sun of their cheerful and divine spirit, never realize their own greatness. They become, in fact, blinded by their own light, not seeing it because it is incessantly present in their perceptual field. For this reason, the most spiritually evolved beings from the history of humanity have with their modest attitudes and intellectual austerity implicitly pointed out that they have considered themselves as equally imperfect and fallacious as less advanced creatures of the world.

Be that as it may, the blind spot effect tells us that by looking at the world we cannot see the eye that looks at the world, that we cannot embrace our own shadow nor touch the rainbow, and that we cannot move the pedestal upon which we are observing the world unless we step aside from it. It tells us that when a traveler sets off to a new land, he does not go there to see solely its marvels, but to see the beauty of the land he has left behind as well. In fact, the essences of Heisenberg's uncertainty principle and Gödel's incompleteness theorem can be comprehended as the consequences of the blind spot effect. In the end, this all-encompassing effect tells us that we should not keep the Sun for too long in our sight, but appreciate its life-sustaining importance by realizing the reflectance of its sunrays in various biological aspects of the world. Shifting our sight away from the most beautiful and precious things in our surrounding can thus be the best and the only real way that deepens our knowledge and appreciation thereof.

On the phenomenon of *ngoma*

‘And the Spirit and the bride say, Come. And let him that heareth say, Come. And let him that is athirst come. And whosoever will, let him take the water of life freely’

Revelation 22:17

Once I opened an African encyclopedia. As usual, on my way to look up for something specific I unexpectedly found a plethora of other interesting things. One of them was the definition of music. Indeed, an amazing answer did I find. Namely, music was described as an artificial segment of *ngoma*, associated only with the sound forms of the latter. *Ngoma*, however, is a Swahili word that stands for an undivided and holistic form that comprises not only sounds of a musical performance, but body movements and emotional, psychologically beneficial and socially gathering effects thereof as well. As a matter of fact, no African language has a word analogous to the term ‘music’ existent in Western languages⁵⁵⁴, as on this continent music is still said to be mainly experienced inseparably from movement, dance, life-force, festivity and multiple other of its facets, the reason for which African musicologists accused the European intellectuals to have fallen prey of the cerebral reductionism inherent in Descartes’ ‘I think; therefore, I am’, while the authentic African lives with her holistic heart up to the norm ‘I sense the other; I dance the Other; therefore, I am’⁵⁵⁵.

Consequently, it may be argued that Western civilization in its endless stream of analytical rationalizations had scrapped music from its more natural form of experience in order to observe it more closely and manipulate more precisely with it, albeit thus producing more intricate and exciting musical forms. ‘All white men are wanderers’, someone said long time ago. And if not present as an outward form of adventurousness, this innate thirst for wandering occurs in the domain of human imagination. In contrast, for many indigenous tribes music is a holier form of expression. Whereas members of a Wintu tribe from northern California use cardinal directions in describing various points on their bodies, Chemehuevi nomads navigate using songs that are descriptive of even the tiniest geographical details of

their habitat. A question ‘how does that song go’ means, in fact, ‘what is the route it travels’ in the mind of a Chemehuevi.

A juxtaposition of these two attitudes towards music – civilized and indigenous – may neatly reflect the nature of evolution of human beings and their knowledge: endless entwining of analytic differing and synthetic uniting. So in order to preserve joy and happiness amidst diligent scientific categorizations, and cleverness and smartness among a joyous dance of holistic excitement, one needs to think about both sides and balance them skillfully. In the end, science and its original linguistic root in Indo-European word *skei* – meaning ‘to differ, discern and divide’ – and religion with its linguistic root derived from Latin *religare* – meaning ‘to connect and unite’ – might be in fundamental terms seen as complementary human cognitive attitudes on the pathway of epistemological and spiritual evolution of life. Differences and divisions that increase the informational content and the miraculous intricacy of our cognitive landscapes and realizations of sacred uniting ways that overcome divisions and see the whole life beating as one thus complement each other, as much as a bright mind and a loving heart do.

However, the more of a listened composition we are able to keep in mind to provide a context in which each particular note that strikes us would be experienced, the greater the potential for our enjoyment in music will be. This particular form of holistic experience has been well known to the classical musical theory. However, the importance of inducing expression and experience of other forms that surround music in the concept of *ngoma* has been forgotten at the account of a purely thoughtful and limbless Western experience of music. The latter can be, although, argued to induce the building of excitement within the body, which is then, in accordance with the thermodynamic nature of informational enrichment, used to transform the organism into states of richer and more superior internal organization.

And once we grasp the indivisibility of this whole composed of mental processing and physical movements, we touch the seat on the clouds wherefrom we could question some of the central premises of the Western civilization that have led to the breeding of a generation after generation of lifeless and lackluster, earthbound men and women. The tragedy of transforming children, born with this strong innate bond between the mental and the physical, into inherently unhappy adults, shackled by the chains of hypocrisy of speaking incongruous messages with one’s mind and one’s body, becomes perpetuated on the basis of this false dichotomy. The moment we send young boys and girls to schools that take their behavioral freeness of a bird and imprison it into a square foot of the classroom seat, insisting that one ought to sit still as electrifying impulses travel through their mental spheres, is very often the moment from which there is no return to the paradisiacal state of unison between the mind and the body and from which aimless and purposeless roaming of a sickled spirit begins, rarely even understanding that its healing would be initiated by the reinstatement of the marriage between the two. As movement and incessant change are inherent to life, all our cognitive impressions should be paralleled, naturally, by the impulses of physical excitement, yet the world would mark anyone truly doing so as a looney and he/she would quickly end up in a gutter, if not a mental institution, thus confirming the validity of the Biblical story about the fate of the Christ in perhaps any world, regardless of how developed or underdeveloped it is thought to be. Nevertheless, with every breath drawn in and out, all the facets of our bodies should appropriately move and our minds, like chameleons, should traverse through all four seasons, if only they could. Consequently, one of the essential arts we should learn in this life is freely involving our whole bodies in our gliding through space on the daily basis and, correspondingly, making an everlasting jazz tune that never repeats itself out of the waves crashing in harmony against the coasts of our minds.

Fractal and all-encompassing nature of the cosmic music

‘In our world, static stability is an illusion; the only permanency lies in a continual change and transformation’

Ervin Laszlo, *Manifesto on Planetary Consciousness*

Music as swaying and swirling of natural entities, irrespective of their complexity, from atoms to stars, indeed occurs everywhere. It is a signal of the inner, rhythmical and melodic self, a self whose vibe, in turn, yields life to more complex cosmic wholes that it is a part of. As a corollary, patterns observed at any level of complexity of the physical order resemble those below and above them. That is, if you recognize a wave somewhere, you can be sure that there will be waves of those waves showing up at one point or the other, as much as that each one of those waves is composed of some smaller waving entities. It is as if a thought of Pablo Neruda can thus reasonably spring in our minds: ‘I spin on the circle of the wave upon wave of the sea’. This is how the microcosmic and the macrocosmic come to mirror one another, all in accord with Hermes Trismegistus’ axiom: ‘As above, so below’. This is also why systemic knowledge, i.e., knowledge of the process of knowing, so-called meta-logical knowledge can be inaugurated as the king of all knowledge.

To give a simple example, I will refer to an addictive personality. It has been widely known that such personalities are inclined to become addicted to many things: not only alcohol, pornography and drugs, but also to specific food (or abstinence from food), exercise, work, daily habits, *et cetera*. To cure them for good, it is not enough to send them to a rehab, a shrink or a hypnosis treatment, as this could wean them off only one of their addictions. In the best possible scenario, this partial healing would amount to their merely substituting one of their more harmful addictions for a less harmful one. Instead, they must be made to understand their addiction to addiction, which can be done only at the level of the systemic, meta-comprehension. Once they understand the mental clutches that cause them to hook up on various sensations, they could be healed from all their addictions at once. Proficient educators could concordantly remind us that meta-learning rests at the very top of the Bloom’s taxonomy pyramid, the climbing onto which is a prerequisite for the exhibitions of the highest levels of creativity. To that end, making learning the learning the ultimate learning objective in the classroom is a must in their curricula. Thus come the benefits of comprehending the fractal nature of the reality wherein patterns observed at one of its levels are reflected in both higher and lower levels of it.

However, we should always bear in mind that the fractal depiction of the Universe is only a metaphor of its organization. It would be oversimplified to say that patterns of the physical reality are identical to each other at different scales. Fractals and holograms signify possible, but not necessary calculable similarities between the natural patterns at different levels of the organizational complexity of Nature and experience. Music heard on the Earth today is unique in itself, although its unprecedented complexity may spread towards other, more and less complex material vibrations of the Universe. The creativity of human thoughts, which are also a form of music, has thus contributed to the refinement of the planetary material structures and their interactions, and there is still hope that someday this civilization might extend its influence towards other solar systems and the whole galaxy as well.

The whole physical reality and the entire existence could be seen and explained in terms of musical vibrations. Whether at the level of acoustic oscillations, electromagnetic waves, atomic vibrations or superstrings postulated as extending throughout the entire physical reality, music not only permeates everything, but it is truly everything. ‘In the beginning was the Word, and the Word was with God, and the Word was God’ (John 1:1), are the words or, I should better say, a music of a kind, which the Gospel according to John begins with, in which ‘Word’ could be naturally understood as a vibration, a sound, an all-encompassing AUM.

The quantum theory revolutionized the world of science when Louis de Broglie demonstrated in 1924 that electron orbitals can be represented in terms of musical harmonies. Many paradoxes arising out of the particulate nature of electrons moving according to the classical laws of motion, as assumed within Bohr's solar system model of the atom, have thus been circumscribed. In fact, as a consequence of the particle-wave duality, the whole world from the perspective of quantum theory could be seen in terms of an all-encompassing music. Quantum theory suggests that atoms in a crystal lattice possess a finite vibrational mode at the absolute zero, meaning that even when everything else is kinetically at rest, atoms in a close vicinity to each other would make music, so to say. Not to mention the incessant movements that exist at the level of the so-called 'quantum sea' that underlies the whole particulate physical reality. These incessant fluctuations are deduced from Heisenberg's uncertainty principle and were suggested by Stephen Hawking as the cause of the unintuitive, but realistic evaporation of the black hole matter⁵⁵⁶.

To continuously dance. That is what the substance of the Universe does in each one of its tiniest details. Magnify any cell membrane and you will recognize a constant movement of phospholipid molecules comprising its bilayers. These molecules tirelessly wiggle and swap places, allowing bigger receptors and ion channels on it to uninterruptedly travel, like rafts, all across it, which, when watched with wonder, could be a powerful sign of the necessity for a healthy human being to continuously dance with each and every detail of its interface with the environment, a thing that only a child in us perhaps still knows how to do, a child shackled under the murky layers of pretense and affectedness, but whose liberation and endowment with the leading role for our movements displayed on the stage of life would instantly turn us into an inexhaustible source of inspiration for the world.

Yet, as we see, the omnipresent cosmic music makes not only living things dance to its rhythm, but the inanimate ones too. Each crystalline body, although seemingly motionless and in a perfectly resting state exhibits an unrelenting dance of the atoms within. As we see, even if we were able to freeze a material down to the absolute zero, quantum mechanics predicts that the basic levels of atomic vibrations, oscillations and what is casually imagined as spinning of subatomic particles would still be there. Hence, even the most static things that we can imagine – crystals, the prototypes of 'dead' matter – display an astonishing dance of intrinsic movements. Thence, everything we could think of is a form of music played across a wide range of frequencies, from gamma- and X- rays to waves of electromagnetic field that bear visible light to waves of pressure that give rise to hearable music to radio waves to the silent hum of the spinning Earth as a whole.

Furthermore, a crystal precipitated from solution finds itself in a dynamic equilibrium between the incessantly occurring processes of precipitation and dissolution. The same process of continuous structural dissipation and recreation is what typifies every living entity in the Universe. It can be easily calculated that in every breath we take there are on average a few atoms that once constituted every person that has ever lived on the face of this planet. For, the atoms comprising our bodies get continuously exchanged between the organism and the environment, as the result of which a single person today and a few years ahead in time will have had completely different atomic ingredients, meaning that patterns, not entities that they build, are what constitutes life, which is, as such, similar to Trigger's broom from *Only Fools and Horses*, which has lasted 20 years, even though he changed the handle 30 times and the brush 40 times. Not only is matter constantly exchanged between organisms on Earth, of course, but so are also ideas and other elements of the cognitive makeup of each individual, which, as such, reminds of the colorful Mayan sculpture I saw standing in the garden of a museum in Cancun, being a composite of a human, a bird, a tiger, a crab and a dragon. In other words, one person's traits are but a hodgepodge of traits of other people that he picked along the way and that found a fertile soil in his mental terrain. In all, every boundary that rests seemingly unchangingly in the state of a

perfect static equilibrium is, in fact, acting as an interface of continuous interactions between the phases in contact.

Everything else can be explained in terms of music, that is, of an enduring balance of antagonistic impulses: moving back and forth, merging and diverging, precipitating and dissolving, uniting and diversifying. Even this whole book can be interpreted through the metaphor of a musical piece – a symphony. Namely, whereas its first chapter/movement brings forth a serious theme central to the whole work, the second chapter in the spirit of solemn and tranquilizing Beethoven's second movements brings about a balance and outlines moderateness. The third chapter resembles a scherzo with its reference to dynamics, liveliness, music and dance. The fourth chapter reminds the reader of the all-pervading dialectic nature of life in all its potential somberness and inescapability. As it shows how only the battles of harmonies and disharmonies can lead to the rise of the most wonderful qualities of life, it may seem depressing for someone expecting pure happiness to soon start to reign over the face of the Earth. As such, it may present the final temptation of the streams of dark passions in a grandiose symphony of life. It can be seen as the darkest moment that, however, as Bob Dylan noticed⁵⁵⁷, comes just before the dawn. The dawn is nothing but the last chapter of the book, which all in bright colors of hope and faith encompasses the beautiful ideals that what humans carry in the depths of their hearts provides the crucial determinants for the appearance of the whole world. In this chapter, we descend down to the epistemological foundations of human experiences, and once and for all become convinced in their reflections in the beauty and prosperity of all the details of the world of our experience.

Dance as an inherent aspect of the hypermodern man and communication

'Ye are the light of the world. A city that is set on a hill cannot be hid. Neither do men light a candle, and put it under a bushel, but on a candlestick; and it giveth light unto all that are in the house. Let your light so shine before men, that they may see your good works, and glorify your Father which is in heaven'

Matthew 5:14-16

'Two errors: 1. To take everything literally, 2. To take everything spiritually'

Blaise Pascal, *Pensée* 252⁵⁵⁸

Sensory-motor system of the body comprises inherent feedback interactions between neural signals and muscular actions. This implies that during the incessant flow of perceptive events, sensory information should initiate a specific response of a given set of muscles in the course of their continuous dynamic feedback correspondence with the sensory signals. Our experience of the unending stream of novel stimuli at any given moment, therefore, leads to the conclusion that we always ought to react in novel ways thereto. In other words, we should steer the sailboat of our experience as if it is a lively jazz song in which the central theme never repeats itself twice. Consequently, in a perfectly healthy feedback between one's cognition and behavior, change, dance and a unique body dynamics need to arise in concert with each exciting thought, idea and sensory information that we bring forth or face in the world within or around us.

However, people nowadays seem to more frequently follow the opposite route. They spend thoughtful and productive daytimes in rigid postures instead of dancing themselves around, and preserve fine or sharp muscular tensions throughout the nighttime when they ought to be perfectly relaxed. In that sense, we could probably learn much from simply watching and imitating elegant and spontaneous

movements of certain animals, particularly those that are graceful and vigorous in their movements and yet sleep relaxed like a piece of rag. In fact, whereas the modern trendy gym exercises emphasize repetitive movements that often neglect the fine ranges of motion present in natural actions (particularly in joints, which thus often collapse owing to an unbalanced distribution of stress), such as dancing, playing in water like a dolphin, a monkey on a tree or an antelope on the ground and dancing ‘samba’ while juggling ball on a meadow, animals can teach us how to master the art of exercising during which powerfulness and elasticity are invigorated in us in parallel. Only animals in captivity, grown mentally disordered due to deprivation of their natural hunting habitat, can be seen exhibiting repetitive behavior, such as the tiger I saw in Belgrade Zoo, walking along the same trail over and over again, for hours at a time. Knowing this, one can start to wonder whether humans are similarly treading towards trails of psychological illness as they run on the treadmill and lift weights in the gym, when they ought to be finely dancing with their bodies in an unrepentive, natural manner at all times, from the dawn to the bedtime. Even when it comes to outdoors exercise, repetitive movements, such as jogging along the same trail every morning, like a human taken over by a bug of habit and turned into a computer, are practiced by most people, as opposed to walking with twists and turns, hops on the benches and squats under the shades of big chestnut trees, silhouettes and somersaults in the air as natural accompaniments of a lively mind in encounter with the wonders of Nature. Seeing this defeat of man by the machine calls for the echoes of the sentiment of Blur’s anthemic Britpop song a.k.a. Parklife in its humoresque portrayal of rivers of people crowding parks in alleged attempt to escape the rat race of the modern urban life, when in reality, by jogging like robots, they extend this race to another level. Unlike ballet or other lyrical dances that encourage the coupling of physical moves to creative expression, which makes them emotional balancing acts, in a way, such ties are bluntly ignored in the spiritually sedating mechanical workouts that most gym members indulge in⁵⁵⁹. Even Yoga, whose goal is, as per its etymology, the attainment of ‘union’ of its practitioner with the world, has been bastardized in these western shrines where false gods of exercise are being worshipped and reduced down to only one out of eight limbs of Yoga, as envisioned by Patanjali in his Yoga Sutras⁵⁶⁰. Naturally, the healing of these new yoga robots who think that setting oneself in right postures is all that is needed to do yoga properly must involve their infusion with the life energy, with the impromptu flow of the movement that is in harmony with the spirits of the performer, of those around her and of the whole Universe at the moment, which are all essential characteristics of the art of dancing. Another thing we could learn from the art of dancing is that it has been clinically shown that in addition to the so-called peripheral fatigue, which results from overworked or strained muscles, dancers are also prone to suffer from a more systemic, so-called central fatigue, which is a form of mental exhaustion that occurs due to prolonged repetitive activity⁵⁶¹. Therefore, we ought to be sure that whatever the action we are being given the task to perform, we should do it the way some of the nimble animals would do, each time in a new manner, completely unknown to the history of the Universe, lest we start to feel lethargic, depressed and irritable if we become overly monotonous and machinelike, like the beat of a techno tune, in our behavior. As yogis of present and ancient times alike have known, to reach the enlightening state of mind of Sattva, brimming with harmony and happiness, and avoid the inertia and the apathy of Tamas and the agitation and the aggressiveness of Rajas, we ought to descend as far from these godly spheres of consciousness as possible, down to the kingdom of animals, and unreservedly mimic their movements. And when it comes to copying animals in their agile flow of movements, the only thing we need to amend is to transcend their emotions of fear with the ones of love, and lo, we would probably come up with a man of hypermodern communication. Within the latter we would find not conversations pervaded with tiring rigid staring and mechanical nodding, but the ones filled with exciting wandering of our body language that follows in step the wandering of our thoughts in search of the bricks of ideas that would superpose

some mutually built towers of knowledge and understanding. With the naturalness of infants that sustain the spirit of compassion and sympathy in spite of their absentminded neglect of the creatures in the nearest proximity, bodies and spirits inhabiting this enlightened future would sway through space with subtle elegance, unceasingly, from the crack of dawn until the lights go out, and some even more.

If you have ever wondered how come all the pockets of stress and irritation piled up within our bodies magically dissipate away the moment we jump into the water and begin to lightly move so as to keep ourselves afloat, know that the reason lies in this dancing of our bodies in it, coming as a cure to grumpiness and exhibitions of negativity that sitting still, like a Greek column, naturally brings forth. Thence, I know that, like candle flames, whose bottoms are flickeringly still and whose tops are ceaselessly wiggling around the wick with mesmerizing naturalness, human beings of the future will dance with similar grace around the axes of their spines, unstoppably, even when their feet are firmly planted in the ground. The way to this enlightened future is, however, extremely long, yet as of this very moment we should begin to train ourselves to shake off the conformist in us that impels us to be as dull and dishonest to the dancing of the spirit within as the piteous social norms of the day dictate it. And if we ever realize how terribly stiffened we have become during communication, fearing that we would be accused of childish disrespect with every glance lightheartedly scattered in the wind and every move dancingly shed into the stellar space surrounding us, we should recall Jon-Roar Bjørkvold's figurative saying that 'death comes neither when the brain stops working nor when the heart stops beating, but when the foot stops tapping'⁵⁶², briefly visualize the terrifying feel of becoming like Bob Dylan's 'angel who just arrived here from the coast, who looked so fine at first, but left looking like a ghost'⁵⁶³, flip the page and engage our mind and body once again in exciting dances of expressions that never cease to amaze us with their inventiveness and the capacity to inspire both us, their deliverer, and the dull and listless spirits posed like pillars of salt – one of which a Biblical figure turned into when she opted not to be guided by the angels, but to stand still and look upon the burning brimstone of the fortresses of Sodom and Gomorra (Genesis 19:24-26) – all around us.

It is still a matter of elementary respect and a genuine sign of carefulness to listen and absorb every word that the other person in communication utters, but it does not mean that we need to respond by staring at her and tiresomely nodding our head all of the time. As the Way of Love has suggested, our minds ought to drift between paying loving attention to others and residing within the inner space of aspirations and thoughts. The latter provide creative drives for our assertions and acts in communication. And as we see, the vivid meandering that takes place in the realms of our thoughts and deeply moving aspirations should ideally find a reflection in an imaginative and dancing style of our physical expressions. These expressions should be, thus, also springing forth partly from our emotional core beating with creative impulses that silently crave to find a way to the dancing surface of our being and partly from our natural intentions to compassionately react in facing the other.

Each rousing cognitive impression thus ought to induce a range of revitalizing physical expressions performed in parallel with the former in the course of our unending dancing through the cosmic ether and *vice versa*. Hence, whether we plunge deep into that magical moment of Now, the preciousness of which the acting instructor, Viola Spolin highlighted in her lessons⁵⁶⁴, and produce a liberating movement, so natural and spontaneous that it surprises with its gracefulness even us, the performers, in order to initiate a creative thought process, or follow the opposite route by meditatively opening the door to an unforeseen idea that will impel us to bring about a matching range of physical movements, to truly complete creatures this matters little, for theirs is a closed circle between the abstract and the physical whereby one does not exclude, but reinforce and harmonize the other. And not only that, but 'to make the sound without movement is meaningless; it means that you are closed inside'⁵⁶⁵, as the acting instructor, Lee Strasberg noticed, impelling us to realize that every word uttered

should be coupled with a spontaneous physical expression during our flawless floating through space. Despite knowing all of this, however, most inhabitants of the planet Earth still disjointedly exhibit each one of these actions separately: when they talk, they either adopt clichéd grimaces or gesticulate agitatedly, in both cases being wholly ‘dead from the waist down’, as Cerys Matthews of Catatonia would have noticed; when they dance, their thoughts are frozen as they self-consciously and weightily pull themselves through to the other side of the night; when they contemplate, they are still as a stone. However, the future of the aesthetic expression, which, as we see, is as inextricably tied to its antipode in terms of inspiring impression as much as inhalation and exhalations are connected to one another in healthy breathing, belongs to creatures that will succeed in finding a fascinating unity between their physical movements, intellectual insights, emotional arousal and sensory impressions, all connected into one big wheel of energy that they would be spinning between their insides and outsides with every instance of their lives.

Such a spontaneous, dancing expression of our emotions, intentions and ideas presents the way to transcend many, if not all, illnesses that have stricken humanity. Because, in the end, keeping our eyes, necks, spines and other anatomical substructures in unchanging states, free from the natural fluctuations, can be seen as the unapparent cause of many physical and mental disorders. As these two are tightly coupled, it does not matter from which side we tackle the imbalance occurring within ourselves. We can start from purifying our thoughts and endowing the beings and objects of the world with grace and beauty that we see and foster in them. But we can also start off by instilling a rejuvenating bioenergetic dance within us, which would, in turn, have a revitalizing effect on the clarity and freshness of our thoughts as well.

In that sense, we should bear in mind that practicing physical exercises with the purpose of maintaining the majestic interplay between strength and flexibility in our behavior might not be enough unless we include their bioenergetic principles in most of our daily movements. It is worth recalling that the routine that many people undergo, which is to do some sort of healthy exercise for some time in a day while spending the rest of their daytime in rigid postures, may be analogous to the little healthy habit of eating one abundant meal in a day while abstaining from food during the rest of it. And just as the contemporary nutritionists advise consuming small portions of food more frequently rather than overfilling our belly once a day and then fasting for the rest of it, so must the key to the development of a flexible figure and harmonious energy streams through it lie in multiple short exercises interspersed throughout the day. For this reason, ceaseless dancing of our body structures, whereby a dynamic flow of energy is let enliven each part of our bodies at any given moment, can be said to be intrinsic to the art of truly healthy living. Henceforth, the British researcher, E. J. Basseby, observed that a physical training program by itself ‘will bring no lasting benefit unless it catalyses a change to a more active life style which incorporates an appropriate amount of spontaneous exercise’⁵⁶⁶. Of course, transforming this inherently wrong callisthenic culture of the Western world – based on insistence on relatively short periods of time spent on intensive workouts and rests of the days spent in slumped postures, giving way to physical passivity and inertness – would not be such a big challenge had gymnastic exercise not been such a huge business in it. Back in the days when I was still intensively exploring the city of San Francisco, I remember climbing the steps of a gloriously looking architectural edifice in the downtown, right on the corner of Pine and Sansome, walking through its arrays of Doric pillars and thinking that it must have been a museum, but then realizing upon entrance that it was merely a gym. It was then that it dawned on me that gyms are indeed shrines of the modern American culture sinfully indulged in the values of materialism, lustfulness and sexual appeal. ‘When I run on Sunday mornings, I pass seven packed, bustling fitness boutiques, and five nearly empty churches’⁵⁶⁷, notes a NY Times columnist and, verily, it is this increasingly pervasive substitution of the spiritual with the physical, so characteristic for

the modern, materialistic age, that the indulgence in shallow workouts aimed at shaping the body only is a sign of. In school we used to be taught that the ancient Romans vomited during their feasts so as to be able to eat more and with greater appetite, and sometimes I think that the new breed of Americans, as gluttonous and prone to bacchanal debauchery as the Roman riches, sweats in the gym solely so as to be able to eat and enjoy in every bite of food ever more. Even worse, being tricked by the workout advertisements, even on clear, sunny days they could be seen running on treadmills in closed and often little ventilated gym spaces instead of exercising outside, in fresh air, thus contributing to the same global warming effect whose reduction they would loudly pay lip service to on another occasion. It goes without saying that with their traditional emphasis on weight lifting and body building, gyms have fostered the same muscular swelling of our bodies that Constantin Stanislavski – only one among many of its opponents from the field of aesthetics of human movement – considered one of the greatest enemies of harmonious physical expression, the one whose mastering is of indispensable importance in ‘conveying to others the inner, living spirit’ of our beings. ‘What direction will you take? Proceed along the line of muscular development of a weight lifter, or follow the requirements of our art? My only duty is to warn you that the acquisition of such over-development is ordinarily unacceptable in the theatre’⁵⁶⁸, he thus wondered on one occasion. Strangely, there is no one in these body temples to refer these beefy physiques as stiff as boards to studies that demonstrated that, in contrast to light cardio exercise, such as jogging, which benefitted neurogenesis of the hippocampus in rats, brains of the weight-lifting rats, who did become stronger at the end of the experiment, did not show any change compared to the sedentary control group, while those subjected to high-intensity interval training, a.k.a. boot camp workout favored by many gym devotees, led to minimal, hardly discernable neurological benefits⁵⁶⁹. It goes without saying that since the basic hunting skill of our African aboriginal predecessors, without which there may not be us now to discuss these very ideas, originated from the ability to utilize physical slenderness for the purpose of persistent, long-distance trailing whereby they would chase down the prey not by outsprinting it, but by outrunning it, any excessive muscular development must be detrimental, not beneficial for our survival and wellbeing. Once again, by revealing the fallacy of the perspective that sees fitness as equal to muscular bulginess, it becomes evident that weakness is none other but strength in its essence, as St. Paul the Apostle would have reminded us (Corinthians II 12:10). Yet, the most profound teachers of practically any art or method since the dawn of the human race, from Lao-Tzu and the art of living he had taught us to John Warner and the field of green chemistry he founded⁵⁷⁰, have maintained that only when the day comes when the world does not need to be taught anymore the given arts and when the latter start to disappear into oblivion will their mission be accomplished. The same can be undoubtedly said for the art of working out: not before the workout spaces start to vanish from the streets of modern cities and every living moment of ours becomes pervaded with invigorating physical activity could we say that the population of humans on Earth has begun to truly live healthily and harmoniously. Conversely, for as long as gyms pop up like mushrooms all around us and gym memberships are multiplying, we could know that ours is quite an unhealthy society overall. Thus, whatever it is that we do – walk, write, quietly observe or contemplate – let us make sure that we have enabled all the elements of our physical structures to exhibit free dancing movements, spontaneously and naturally, following each wave of excitement arising in our mental and emotional spheres.

Have you ever noticed how a graceful act of walking makes us set all the segments of our body in harmonious motion? Our hips, arms and shoulders seem as if floating left and right, whereas our neck and glances freely move in all directions, strewing the world with the glowing rays of our attention. In fact, mastering the art of ordinary acts that we semi-consciously perform on daily basis, such as walking, sitting, breathing, eating or sleeping, presents an incredibly complex task. Thus, although most people believe that there is no need to every now and then revise and relearn the proper ways to exhibit these

basic forms of human behavior, I feel that there is a lot to improve and thus try my best to master the art of these simple movements. However, as they in large extent involve an adoption of a natural and spontaneous attitude of body and mind, whenever we find the right harmony in performing these basic acts, the way of getting there looks simple enough. But once we fall from grace and focus our intellectual capacities to return back to the right state, all looks complicated. This becomes thoroughly reasonable once we realize that we have been using a wrong tool – namely, pure intellectual powers – to find the way to spontaneously act.

Hence, I am free to say that it is all in the mind. Once we get back to the perfect balance between deliberateness and spontaneity in our mind, we are back to the old track in the way we conduct our physical acts. There will be just enough deliberateness to guide ourselves along the way of kind, reasonable and well-crafted acting, and yet there will be the spirit of spontaneity to make our acts glide with a delicate charm and appeal. For, true creativity, inspiration and grace lie exclusively in such a harmony of reason and naturalness. We always need to aim towards being one with the grounds of our biological nature on the bottom side and to be one with the gift of divine profoundness of our mind on the top side. It is in the reign of the heart that these forces, coming from opposite directions, encounter and produce the glow of love, grace and eternal wonderment.

Essentially, the physical appearance of ours and the internal domain of thoughts, aspirations, anticipations and emotions, concealed from the face of the world, are tightly connected, and each one of the two domains – inner and outer, invisible and visible – mirrors the other one. Behavioral traits can be thus seen as reflecting the psychological elements of a given personality, whereas the latter can be changed or reiterated by applying specific actions. Simply saying, the inner psychological sphere determines the way we relate to the world, whereby the way we relate to the world determines who we are at the inside in this closed feedback circle. Therefore, it does not truly matter if we start improving our personality from the inside or from the outside, i.e., by enlightening the domain of our wishes, ideas and emotions, or by starting to act in freer and more inspiring ways. For, mind and body resemble semicircles on a wheel, and if we want to spin the wheel of inspired living, we can start by drawing any of the two sides of it. We know, for example, that facial gestures and physical postures quite clearly give signs of the feelings and intentions that the person cultivates within. Thus, if performed sincerely, toying with ears, nose or neck is the sign of being deceptive; rigid mouth and flexing jaw indicate a discomforting or resenting determinateness; stiff and elevated shoulders speak in favor of uneasiness in one's expressions; intense eye contact that tends to stare the other person down is the sign of aggressive tendency to control; a sneer-like grin where each side of the face tells a different story may be the sign of divided feelings or unresolved intentions; a tight-lipped smile may signify a stiffening over-respect of the person's company; besides tightly sealed lips, biting one's lip is also the sign of anxiousness about the impressions that the words spoken will leave on the overly respected person on the other side; raised eyebrows and bulged eyes are another sign of insecurity and the frightening over-respect of another, while its opposites in terms of corrugated forehead and eagle's eyes signify one's aggressive tendency to dominate; the more elevated the chin during smiling, the further one is away from the empathic, soft and smitten chin-down smile and closer to the scornful or insolent smirk, or the emotionally detached, so-called toothpaste grin; sitting on one's hands or with toes pointing to each other means that the person is either unsure in herself or gracefully concealing her feelings; looking up when everyone expects an expression from one is the sign of helplessly looking for guidance and inspiration, whereby upper left angle is thought to signify searching for honest words or acts, while the upper right angle may conceal dishonest tendencies; tilting the head is a sign of obedience and fidelity with its lowering one's height, imitating the tender act of placing head on someone else's shoulder and revealing the neck, the most sensitive and vulnerable part of one's body; and so on. On the other hand, it has been shown that

adopting specific facial postures helps in inducing the states of mind that correspond to those particular expressions⁵⁷¹. Smiling even when our spirit is infuriated or melancholic can thus help in rocking the boat of our emotions towards some brighter skies. And when we reach those brighter spaces of spirit, we can simply let ourselves float with the stream, for the spiritual purity of ours will then spontaneously shine its way to the surface of our being in the world.

One of the difficulties associated with the feedback interaction between body and mind is that specific bodily responses become memorized in both brain and muscles, which makes their reprogramming a hard task. Namely, in response to every tendency to restore the optimum balance, either muscular impulses or the ones coming from the brain would easily bring back the unbalanced state. If you try, for example, to relax the fine muscles⁵⁷² around your eyes, you may notice that as soon as one group of muscles becomes relaxed and your attention turns to the other ones, the former spontaneously tend to adopt the tensed state again. The same normally happens with other chronically tensed areas of the body, and one out of many personal examples evocable here pertains to my pervasive habit to clinch the jaw and grind teeth. Stress to which I was exposed during war-stricken childhood, the rebellious adolescence and agitating academic life concentrated itself in many areas of the body, one of which was the oral cavity, where the clenching of the jaw caused by it degraded the alveolar bone to such an extent that it made a number of teeth loose. A feedback loop between the mental states and the physical action was obvious: the anger and the will to resist the worldly circumstances that threatened to grind me into a lifeless mush caused the grinding of the teeth, but this grinding itself also tended to cause the pain that aggravated me about these worldly states of affairs even more and predisposed my mental sphere to be filled with more and more of tumultuous thunderbolts, creating a vicious circle at the end of which a toothless physique resided. However, after this feedback looped was recognized, a mental therapy could begin, whereby the conscious resistance to grind teeth would make the mind calmer, but also softening of the temper would reduce the jaw problems. Because of the muscle memory effects, however, in this case and in the case of any other mind-body interaction, the road to healing is long and difficult, implying that learning in the long run how to improve the complete set of our postures and gestures and endow them with a combination of sagely stability and childlike flexibility requires a colossal effort.

Another particularly striking example of this mind-body feedback interaction comes from my own experience. Namely, a humbleness and quietude of my mental attitude has been for a long time reflected in my tendency to constantly keep my neck bowed forward. This incorrect posture caused restrains in the normal flow of bioenergy through my neck and entailed other problems, including overly contracted jaw and trapezius muscles, exceedingly withdrawn chests and an improper overall spine curvature. This is, of course, because human body is, like any other living entity, a holistic system wherein a disharmonious relationship in any of its parts initiates disharmony throughout the whole system. Even worse, the constantly curved neck gradually awoke the sense of being burdened and oppressed by the living circumstances, despite the fact that there were hardly any reasons for me to feel that way. But metaphorically speaking, the wrong posture naturally spoke with its language of the body to the mind, and managed to convince her that feeling burdened is the natural response to the adopted posture. Such an inflected stance also reflects and awakens a lack of self-confidence and a lack of creative drive to express ourselves in soulful and inspiring ways. Instead, as evoked by the very shape of this posture that resembles a body with a lifeless neck, simply hanging on the rack, we become clingy and masochistic in relationships with others, showing more the traits of passive followers than those that typify active sources of creativity.

However, as soon as I recognized that there has been a feedback interaction in which my constantly bowed neck led to a humble and withdrawn attitude, whereas the latter furthermore impelled

my neck to be bowed forward all of the time, I knew what the way to improve this situation would be. And, as ever, the latter can be ameliorated only in the domains of body and mind in parallel. Thus, I started substituting the timid attitude of mine with bravely embracing options in life that I was most afraid of, as opposed to avoiding them and opting for the safest ones. In accordance with the Rushdie's vision of 'mountains as earth striving to become air, and glaciers as water wishing to become earth', I had to remind myself that I was also a stony mountain that wanted to attain an angelic airdrawnness and unconstrained flights of spirit. Awakening golden, sunny eyes and a high, sublime attitude of mind thus managed to counterbalance the tendency towards shy and timid withdrawnness of mine. However, an inharmonious attitude of body and mind transcended once is not overcome forever. Blink your eyes, and a few moments later it may inconspicuously creep in, and we would normally be unable to tell if the initial impulse arose in our body or mind. Thus, every time my neck would spontaneously bow, I had to remind myself to raise it and bring it into a position in which a healthy and unconstrained flow of energy is fostered. And every time a thought or a feeling that would drive me to keep them winded down within myself and shutter the petals of the flower of my heart arose in me, I had to illuminate and dissolve them with the shine of graceful joy. Hence, we always have to think about adopting both an appropriate posture and a harmonious thought, because these two are inseparably related.

I will give you another example of this mind-body interaction in which it truly does not matter if we purify and beautify our thoughts and intentions or make our spontaneous movements and the ways of consciously expressing ourselves more splendid, for they will both in the end influence each other. Graceful thoughts and emotions make our physical appearance more graceful, and *vice versa*. Now, most of us are able to instinctively discern gestures of true politeness and at least a momentary sincerity from the fake ones. One of the ways to do so, and most probably the most reliable one, would be to look at the dance of the eyes of the given person. If they wiggle with joy, that may be the sign of sincere kindness expressed. But if they are fishy, frozen and glassy, no matter how servile and respectable other bodily expressions are, this may signify a disguised hate or indignation. As a matter of fact, the world of ours is mainly inhabited by humans who have been trained over years of conditioning to behave with kindness, coldly and inertly, rather than to emotionally engage themselves in each act of theirs. A clear sign of this is, once again, readable from their eyes: if glassy and cold, no matter how kind these acts appear on the surface, we should be sure that they do not come from the depths of their performers' hearts. In contrast, if carried out with warmly pulsating pupils and lively dancing irises, they could be taken as honestly caring and arrived straight from the empathic core of the given beings. And now try exhibiting these two forms of eye dance: frozen and shimmy. Do you think you would be able to express hatred with eyes playfully wiggling? Hardly. But do you think lovingness could be sent from the core of our being to the surface with our eyes stoned? Hardly, too. Hence, it truly does not matter in which direction we spin the wheel of our wellbeing, in the direction of enlightening our inner world or embellishing the outer one, because these two are inextricably looped. By fostering the shine of love inside of us, the joyful dance of our eyes will naturally tend to be exhibited, whereas if we find ourselves lacking the warmth of this inner glow of love, we can as well start dancing with our eyes as if we have a plenty of it inside, and, lo, soon this glow will start increasing in intensity.

Another consequence of this feedback nature between our subconscious intentions and postures we adopt is that all the incorrect postures we could think of have their background in thoughts and desires we cultivate, and *vice versa*: healthy and flexible body movements naturally tend to yield beautiful thoughts and feelings. In that sense, people who complain of scoliosis (i.e., curved spine), for example, could be subtly notified that it is them that have continuously curved their spines, and that it has eventually been their unconscious decision to do so. After one becomes aware of this dynamic and psychosomatic nature of every static posture, which is also in perfect agreement with the autopoietic

nature of life⁵⁷³, which postulates that everything in Nature is a cycle whose beginnings and end products are intimately tied together, we may expect one's postures and bodily expressions to be slowly transformed into something more balanced and beautiful.

In accordance with comprehending life as music, every posture, no matter how well established and healthy, presents an imperfect choice. Just like we should not settle our mind into any permanent thinking rules and rigid patterns of judging, but incessantly wonder instead, it is the dynamics of movement and harmonious flow of postures that brings happiness and satisfaction to our behavior. In other words, it is an unremitting dance of movements, subtle and obvious alike, radiating with a mixture of deep wisdom and childish joy that comprises the essence of a truly healthy physical aspect of living. While he was coaching Barcelona in the 1980s and the 1990s, Johan Cruyff recognized that the midfield diamond in the 4-4-2 formation is futile unless it constantly transitions from the 1-2-1 diamond to the 2-2 box and back⁵⁷⁴, and similarly, our mental and physical stances must endlessly fluctuate and never stay in one state for too long if we wish to inspire and be inspired. Moreover, the fact that crying babies are calmed down by being gently dandled can be taken as another strong argument in favor of the hereby elaborated idea that only a constant flow of movements can be inherent to truly fulfilling ways of being. Only through dancing our way through the world with our body expressions is that we avoid a confinement into expected and uninspiring, clichéd patterns of human behavior.

If we were to look closely at how macromolecules that comprise our bodies behave, we would come to realize that they too are engaged in an incessant dance with their structures in space. Protein molecules, for example, are known to never, strictly speaking, exist in the same conformation twice during their existence, which is owing to fine and continuous 'flow' of their structures⁵⁷⁵. Some proteins exhibit less of this effect, while other, such as antibodies, exhibit more, which is thought to help them in recognizing and reacting with the corresponding antigens. DNA is also known to display an effect colloquially known as 'breathing', which relates to fluctuations in the distance between the corresponding base pairs due to the flexible nature of hydrogen bonds that link them. During these fluctuations, segments of the DNA chain denature all by themselves, separating the two strands and exposing them to their environment, even when there are no transcription or replication activities going on⁵⁷⁶. Dancing up to the very limits of flexibility is thus an intrinsic feature of biological molecules.

Should we compare the inherently dancing nature of biomolecules with the comparatively rigid, mainly vibrational internal music that inorganic materials, which preceded the biological ones during the history of the evolution of planet Earth, ingrain, we could infer that an increase in liveliness of the structural dancing of molecules in relation with their physical environments has entailed the evolutionary ascension of life. Had these biomolecules decided to stop dancing with their conformations, their functionality would have instantly diminished. Still, of course, a balance between preserving the overall structure on one side and letting it breathe, change, flow and never be the same as before on the other has to be maintained to ensure a proper biological performance of these molecules, which reflects yet another balance between rigidity and flexibility that endows the simultaneously sustainable and evolutionary life as we know it. In any case, if we too are to continue the evolution of consciousness on this planet, we should likewise engage in dancing with all that we have.

Maintaining a lively feedback between sparkling thoughts and feelings that arise in our mind and heart and our physical responses thereto and *vice versa* is certainly one of the vital preconditions for our becoming an inspiring spiritual dancer in life. In order to restore the lost psychosomatic memory of spontaneous responses to our cognitive experiences, and start cheering with every atom of our body whenever we come to an exciting conclusion in our mind, we may reasonably turn to children. For, they tend to display natural waves of excitement in their eyes and their overall body language following every sparkling thought or miniscule impression that arises in their minds. To every exciting idea, child

responds with a rousing movement that in turn brings over new sources of inspiring insights, thus immersing the child into a positive feedback loop that typifies learning processes in general; or, as pointed out by Jon-Roar Bjørkvold, ‘Impressions and expressions take multidimensional forms in which immediate and synchronous reciprocity among thought, action, and feeling give cognitive processes depth and a continuing grounding in the center of consciousness’⁵⁷⁷. As it emerged from cognitive studies conducted by Warren McCulloch in the 1950s, performance of any mental tasks, be they associated with learning or application of knowledge, is paralleled by the performance of specific physical moves, be it the wiggle of the eyes, the trepidation of the jaw, the tapping of the tongue or the ultrafine flit of the fingers, the experimental blocking of which hinders the thinking process⁵⁷⁸. This member of the seminal order of cyberneticists, perhaps the last generation of scientists to have preserved the intimate relationship with the ontological and ethical foundations of their sciences and incessantly explicated their thoughts on it in addition to running empirically rigorous studies in labs, upon hearing about this correlation, immediately concluded that the traditional insistence that learning is to be accompanied by sitting still in the classroom or a library must be indubitably wrong⁵⁷⁹. Yet, it is a pitiful fall from grace that socially enslaved adults have imposed on children over centuries by teaching them to learn by sitting still rather than by moving around in all their natural spontaneity, thus inducing in them the notorious gap between thought and action, between word and deed, along which the chasm of hypocrisy, a greatest sin that keeps human souls in its clutches, has been born and sustained. In that sense, we could be sure that ‘the child is father of the man’⁵⁸⁰ when it comes to depicting the growing ideals of an inspiring humane communication.

In fact, children tend to enter the lives of human beings right about the time when humans begin to give in to stiffness and hypocrisies of the adulthood. And once they find themselves facing each other, the mutual learning process is bound to begin. The grownups will teach the children the merits of order, logic, discipline and verbal communication, while the children could teach the grownups – if the latter were only to accept that there are bountiful treasures of invaluable precious qualities that they could adopt by imitatively learning from the former – about the forgotten communication of the heart, about the ways to restore the gracefulness of natural, dancey movements that kids so spontaneously exhibit as they glide through space, and about the manner in which the most minute moves and glances of ours, as quiescent and unpretentious as they could be, can move the heaviest rocks that block the gentle flow of love through human hearts and enlighten the whole wide world thereby. The two will thus serve as precious guiding stars to each other as they, holding hands in tender togetherness, continue to advance towards novel evolutionary horizons.

With the process of aging, the tendencies to reduce flexibility on the account of an ever growing rigidity become naturally manifested. When a man is young and the world is filled with surprises and wondering signs, his cognition endowed with curiosity naturally reflects itself in the flexible states of his body. This is all related to the principle of constructivism, according to which our first cognitive impressions are filled with streams of impulses from which the subject constructs meaningful perceptual and interpretational wholes. But as the being gets older, this whole active process of cognitive construction of the world settles down into preformed conceptions, expectations and prejudices. These constancies are essential attributes of human reason, but when they start eating out the aspect of unknown, uncertain and mystical in the world of our experience, rigidity throughout both our body and mind starts dominating on the account of a vanishing flexibility.

One of the important exercises for restoring this flexibility is Yoga. Its central principle is that by straining our bodies into uncommon postures, we have the chance to maintain their childish flexibility. By adopting positions that ideally reach the very limits of our physical suppleness and border a mild feeling of pain, we tend to increase the elasticity of our bodies. The fact that the most useful way of

performing these exercises is not to swiftly flow from one position to another, but to stay in a single one for prolonged amounts of time does not say that their seemingly static character goes against the grain of the paradigm of flow, music and change proposed hereby. In fact, when properly performed, Yoga exercises induce internally much more dynamic processes than the wildest body grinding on the dance floor we could imagine. Also, by mentioning that each static trait is essentially filled with some dynamics, I wanted to point out that it takes a bit of wisdom and fancy to recognize that every seemingly still object is underlain by the streams of continuous change. This is not to say that certain constancies cannot be recognized in natural systems or their interfaces, as, for example, it could be argued to be a general law of physics that wherever two physical objects meet, invariance of a property must exist⁵⁸¹, but that every seemingly static and unchanging state can be broken down to endlessly dynamic processes of change. Just like every chemical balance implies a continual exchange of atoms and molecules between the phases in equilibrium, the same unending interaction and communication can be said to permeate even the stillest and most desolate systems in Nature.

There are also so-called somatic exercises aimed at erasing the psychosomatic memory imposed onto our body by the brain. One of these exercises for maintaining visual flexibility will be presented in one of the following sections, but the same principle applies to other parts of the body. The idea is that certain muscles tend to move in synchrony, and during the course of our lives their simultaneous activation becomes so habitual that it turns out to be almost impossible to separate them. To maintain flexibility in our movements is then to decouple the spontaneously coupled moves, gestures or elements of a posture, and combine the moves that do not tend to be instinctively paired. For example, practically all infants are born with the tonic neck reflex that urges them to lift the arm over whose shoulder they direct their gazes and resemble a fencer, in a way, every time they look sideways. Consequently, vision and the muscles that control neck and arms tend to limit each other's ranges of motion and we know by now that many, if not all, physical impulses have their sources in the starry pools of our eyes. Therefore, our glances most of the time determine the movements of our neck and over time these mutual restrictions naturally increase the behavioral stiffness and predictability of our actions. However, even though our visual focus and our neck often move together, if we carry out an exercise in which our eyes would move in one and our neck in the other direction, we could immediately feel a relaxing effect on our body and mind, similar to the feeling of unlocking some burdening node within ourselves. This may be because robotic habitualness and drowsy automatism on one side and a wide-awake awareness and the very consciousness on another could be seen as complementing each other; where ones end, the other ones take over, and *vice versa*. Whenever we unlock our eyes from their automatic following of the movements of the neck and habitual scanning of the visual field, some of the physical space that has over time become occupied by pure automatism becomes returned to the reign of consciousness. However, none of the two, i.e., the autonomous and the conscious nature of our beings, is better than the other. It is the balance between relying on an instinctive spontaneity of our biological makeup and on rational faculties of our mind that needs to be reestablished whenever it appears to be lost.

This perspective brings us over to the core concept of Merce Cunningham's approach to modern dance, whereby one is taught to consciously counteract the habitual flow of movements with unintuitive and seemingly unnatural moves and gestures. By means of such incessant going against the flow rather than with it, which, as G. K. Chesterton would have reminded us, only living things can do, flexibility, naturalness and liveliness of our being are, however, all increased. In such a way, the bridge between animalistic behavior, spontaneous, impulsive and lively, which sucks the energy from the earth, and that of a superman, rational and sublime, breaking the law with each moment of our existence and bringing down its sources from the heavens of our mind, is being built. The usefulness of coupling hardly compatible segments of postures so as to erase the imprints of habits and socially imposed expressional

clichés, ‘develop flexibility in the mind as well as in the body’⁵⁸² and produce more sincere and enlivening gestures thus becomes clear.

These types of exercises could also be carried out with any bodily movements, including facial expressions. Interests in facial Yoga are currently still emerging, though in this light it can be practiced together with somatic de-memorizing exercises in which two uncommon facial expressions would be coupled together with the purpose of eliminating memorized facial responses that tend to involve the work of numerous small muscles in parallel and yielding more relaxed and spontaneous expressions. Another type of exercise recently investigated experimentally involved children told to simply touch shoulders or toes on the command to touch toes or shoulders, respectively. Interestingly, it was shown that subjects who were more prone to touch toes when they were explicitly told to touch shoulders and *vice versa*, that is, who were able to consciously break the pattern of behaving based on habitually obeying the given instructions did significantly better in school later⁵⁸³. This comes as no surprise if we recall that all the progressive features of humankind and its members stand out as such primarily because they break away from the patterns of regularity, routine, expectedness and habitualness. Most of these exercises, however, tackle the flexibility/rigidity balance from the physical plan, and as such should be necessarily paired with the ones that attack the problem at the abstract plane, that is, from the level of our thoughts and emotions. Cultivating the art of questioning, never giving the same responses twice, enjoying in swimming in the sea of diversity and uncertainty, searching and not dogmatically holding onto fixed sets of premises and inferences are some of the cognitive traits that, if practiced well, could lead to extension of the childlike flexibility of our body and mind alike up to our oldest age.

However, the day of this hypermodern, dancing communication still seems to be very far away. Shakespeare’s Romeo did not dance and neither would a sublimated personality of a Che Guevara. All it would do is gaze forward, willfully and somberly, with a powerful determination to conceive acts that would save the world rather than to foolishly waste precious time and energy by leaping sprightly on the dance floor. This does not say, however, that such archetypes of profound paramours and revolutionaries did not dream about dancing and that they were not presupposed to become great dancers at all. If Romeo had survived the perplexities and the eternal sadness that his youth had confronted him with, I am absolutely sure that he would have become a phenomenal dancer, similarly to many people who readily face the mysteries of life in their young days with determination to resolve them. Those who spend the days of their youthfulness in silence and solitude, deeply engaged in finding answers to the secrets of life and the Universe, may become cheerful beings that celebrate life at every step of their old days and thus be a true inspiration for the world. For many such wonderful people have been said that they had the gestures of old men while they were young and yet maintained vigor in their spirit and movements long way into the old age. In fact, brilliant minds, as a rule, reflect a balance between charmingly infantile traits and an incredible wisdom-bearing maturity. Lao-Tzu’s name literally means ‘an old child’, and one such combination of infancy and wisdom is ingrained in the very language I have used here. In it, one may recognize a boyish ignorance of proper grammar and of correct vocabulary encountering an old man’s usage of intricate philosophical terms and expressions. Be that as it may, although we may someday start to seem old to other people, one thing that no one will ever be able to take from us is the privilege of being a child forever and ever in the eyes of the divine Cosmos, from the beginning to the end of our lifetimes.

But it is true that dreams sometimes present sources of true fortune and happiness compared to their fulfillment. For as long as people dream, there is a hope for humanity. A single innocently and silently pondering child may be the source of its spinning and evolution and we may not know it. As King Solomon once noticed, ‘Where there is no vision, the people perish’ (Proverbs 29:18). Conversely, before eyes illuminated by enlightening visions, everything is made possible. This is why Edgar Degas’

painting entitled *Semiramis Building Babylon* shows the Assyrian queen dressed in white and standing on the banks of the Euphrates River, expressionless and visibly enraptured in a rapturous and sublime vision, quite unlike the long procession of mundanely expressive attendants behind her. It was as if the famous French impressionist shared the semantic vision impressed in these lines, which is that when a dazzling vision illuminates our insides, we need not do anything but stand still, in wonder and awe, and even the creations as complex as the entire city of Babylon would magically assemble from scratch before our eyes. With the divine vision in our pocket, accordingly, everything is possible. And as for today, dancing is our vision.

Though in order not to become like Pharisees from the Gospels, for whom the Christ said that ‘whatsoever they bid you observe, that observe and do; but do not ye after their works: for they say, and do not’ (Matthew 23:3), we should try our best to live our dreams and make every moment of our lives a sensational dance of joy of each atom within our beings. But on the other hand, we should be aware that ‘we ought to fly so as to live’⁵⁸⁴. Which is to tell us that dreaming on the magic carpet of inspirational thoughts, with mind and spirit as pure as the rustic snow, is what, deep-down, drives the evolution of human race.

We must dream. It seems to be the only way to be. For, if the world is in part a magnificent projector of our deepest intentions, then the more wonderful our dreams are, the more beautiful the world will be.

But if we were to live all our dreams instantly, there would be no dreams to be dreamt about. And both the evolution and this majestic flying in spirit, as the famous Platonic bird did⁵⁸⁵, would vanish too. This is also the reason why the relations between our dreams and deepest aspirations and their coming true are concealed, mystical and, as it seems, an eternal source of human wonder and theological explorations.

All in all, we need to be determined, decisive and willful beings, unstoppable in the drive to transform our dreams into reality, to live our ideals and walk the talk with every breath, and yet to be quiet, wistful and silently pondering souls that endlessly weave dreams around the perceptions of themselves and the world. Heinz von Foerster’s imperative, ‘If we desire to see, we ought to learn how to act’⁵⁸⁶ should be, thus, anchored to our heart at all times, while we should simultaneously be aware that the purest form of divine beauty lies within mindsets that save grace by treasuring the most precious thoughts and emotions at the end of the rainbow, among the invisible pillars of the soul. Hence, we should strive to change in the direction whose horizons are the ideals of hypermodern communication outlined here and thus let and support other people change freely, but we should still bear deep in our mind that there always is a ‘light that never goes out’⁵⁸⁷, as in the monumental song by the Manchester band, the Smiths.

In that sense, we should walk along the path which leads us to fulfill our dreams and start ‘rejoicing with them that do rejoice, and weep with them that weep’ (Romans 12:15), but also learn to think independently and look for original and different ways to be, think and act. We should learn how to fly with birds and swim with dolphins, but we should not even then stop keeping an eye and a yearning heart on the birds while swimming and on dolphins while flying. This is not to say that we should become a person unsatisfied in every circumstance, thinking that elsewhere is always a better place and ignoring thereby the meaning and merits of the immediate features of our surrounding. No, we should become a sincere being here and a quiet dreamer of there.

After all, not the things we possess here and now, but the extent up to which our dreams illuminate the imagined future with bright and sunny trails predisposes us to have brilliant memories of this dreamy here and now.

Still, quite contrary to the usual description of the natural development of human consciousness, streaming from the empty and inert in youthful days to the complex and deep-thinking in the old age, these two aspects of human mind – meditative and reflective – ought to be developed in parallel. Only through such a balance would we be able to attain the ideal of living our beautifully crafted ideas and ideals.

And yet, we should not forget that if our aim is to travel on the all-fulfilling journey of human lifetime wherein we are born crying while the surrounding beings are smiling and die smiling while the beings of the world are washed not in the tears of sadness and repentance, but in the ones that signify a pure divine beauty, we need to know that the only right way lies in awakening an ever more intensive and radiant beauty of love with the passage of our lives. This beauty is the one that overcomes all the physical hardships that getting older normally brings. The ultimate meaning of life is reaching for feelings, aspirations, thoughts and values that would enlighten the physical constraints of the body and miraculously bring the heavenly daylight in the setting body. ‘While we look not at the things which are seen, but at the things which are not seen: for the things which are seen are temporal; but the things which are not seen are eternal’ (Corinthians II 4:18), as St. Paul the Apostle professed. And as the art of music and dancing teaches us, it is only through humbly accepting our biological nature and humane fragility that we can attain this aim and grow angelic wings in this seemingly old, unmovable and tired body. But what an amazing liveliness could be in it. Verily, the one that sends suns of good vibrations to peoples of the world over mountains and seas.

And as the final days of our lives are approaching, we should not forget to invoke our mind seeing an everlasting and indescribable beauty permeating every moment of our lives, every trace of our cognition, every weary glance of ours and every speedy beat of our hearts. Every moment of our lives could be thus transformed into an immaculately joyous and optimistic communication with God. The song of our hearts would match the One of Nature, and we would, filled with the divine beauty, march towards an all-fulfilling meeting therewith.

Moving as one

‘That which is below corresponds to that which is above, and that which is above corresponds to that which is below, to accomplish the miracles of One’
Hermes Trismegistus, *The Emerald Table*

‘Cinderella, she seems so easy,
It takes One to know when she smiles’
Bob Dylan, *Desolation Row*

To restore the forgotten joy and spontaneous excitement in our expressions, we should perform our actions using our whole bodies. This implies shaking hands with the fellow beings with everything, from the crown of our head to our hips to our feet, and saying hello with everything from our forehead to our toes. Even the most elementary moves should be thus made involving each segment of our bodies, integrating them all within a single complex wave of energy that is then able to crash over the person or an object which we interact with, producing an incredibly powerful effect.

When Janelle Monáe and her homies envisioning the futuristically electrifying behavior that shakes the stardust off the drowsy spirits of the world and awakens them into a supersonic dream that life is repeatedly talk about ‘getting down’⁵⁸⁸, they hint at one such descent of our awareness into the lower energy centers of our body and rooting our mind in the ground beneath our feet, so to speak, so that the water of life could be freely sipped from it, thus endowing our moves with an unusual freshness

and fairylike flows of grace. For, the secret behind karate kickers' ability to achieve amazingly powerful strikes that break wooden planks and ceramic bricks lies in their usage of entire bodies, from their feet to their head, in delivering the blows, and the same principle applies to the powerfulness of far subtler gestures of ours. Conversely, remember, not only what comes out of our bodies ought to be expressed with every single one of their parts in togetherness, but what gets into them too has to be received in an equal manner, embraced wholly and thoroughly, with eyes, ears, shoulders, hips and soles of the feet. Hence the way Sensei of Sesame Street taught Cookie-san how to break a biscuit into two with a karate kick by telling him that he should not listen with his ears only, but with his whole body instead, from head to toe.

Alongside innumerable insights of the science of body language that demonstrate that physical expressions are akin to a book in which secrets of the spirit behind them are written, a popular saying that feet unconsciously point where the heart aims at does not only speak in favor of the natural integrality of the human body and spirit, but also tells us that the our interface with the Earth is the starting point for the exhibitions of our emotions and spirituality. The prime bioenergy therapist, Alexander Lowen used to say that man is as youthful as his legs are young and flexible⁵⁸⁹, while the eminent performance arts theorist, Tadashi Suzuki struck the same note in his essay entitled the Grammar of the Feet: 'The way in which the feet are used is the basis of a stage performance. Even the movements of the arms and hands can only augment the feeling in the body positions established by the feet'⁵⁹⁰. Likewise, when the Italian mime artist, Maurizio Nichetti asked his biggest idol in the filmmaking realm, Jacques Tati, what he thought of one of his comedies, the only comment he could get out from Jacques was a complimentary 'You have good legs'⁵⁹¹, a subtle reaffirmation of the argument in favor of feet and legs as the starting points and bases for harmonious movement. Then, during a walk through a southern French forest, the sprightly 84-year old Zen Buddhist monk, Thich Nhat Hanh, as supple and agile as a 5-year old, advised his adherents to 'put their minds in the sole of their feet'⁵⁹², thrusting their minds in the direction of understanding that right at the interface between the moving man and the earthly environment, where feet touch the ground, is where every movement of theirs ought to begin and where its quality is being defined. We were, in fact, born with a great subtlety of the sense of touch in our feet, as anyone who has watched an infant explore the environment with its hands and feet to an equal extent could attest to, and, in turn, restoration of this sensory faculty after years of deadening it via wearing shoes and disjuncting our moves from any sense of the ground beneath our feet may be akin to the rebirth of the child in us and a gateway to enlightenment, as many sages, including Thich Nhat Hanh, would have surely agreed with. For, our level of comfort in walking barefooted could be an indirect indication of the intimacy of our relation to the earth beneath our feet and all around us, which is the starting point for setting the grounds for enkindling the fire of enlightening empathy with fellow earthlings and undergoing that grand phase transformation into a paradisiacal form of being for which we are all here. Hence, the difficulty with which the wretched soul of Estragon vainly attempted to take off his boots in the opening scene of Beckett's *Waiting for Godot*; the easiness with which my Belgrade buddies would unlatch and remove their gritty, threadbare shoes in the middle of the cheering parties in the days of wine and roses to symbolically signify the apex of feeling good and being in harmony with it all, needing no artificial shields to hide their starry selves behind anymore; and, finally, the inevitable revitalization of the spirit that entails the act of flinging flip-flops at the seaside and starting to walk barefooted over seashore pebbles and shells. To not end the day by slumping into a bed with feet as soiled as Mowgli's is, therefore, as I have always held, to not live rightly, the reason for which the fashion style I invented in my twenties was about being dressed up to the nines from the ankles to the neck and then topping the outfit with the dirtiest and most threadbare of shoes one could put on. Then again, I have noticed how shoes one wears largely determine the comfort of one's

movements and thus – because the way one interacts with the world draws the essence of one’s inner being and *vice versa* – from bottom up, in a subtle and inconspicuous manner, shape one’s spirit as well. Thus, when Marilyn Monroe proclaimed her famous punch line, ‘Give a girl the right shoes and she can conquer the world’, she spoke no nonsense since the meaning of her words could be interpreted in a far more profound light than it may seem at the very first sight. Most runners are aware that a blister on the pinky toe can cause a chain reaction of biomechanical malfunctions, extending from the little joints and tendons in the foot to the spraining ankle to the sore calf to hernia in the hip and beyond, which is an insight that directly points at the touch of our feet with the ground as the starting point for the spread of harmonious waves all through our bodies and, perhaps, souls too. I, myself, dealt with one such upstream flow of biomechanical disturbances resulting from a punctured sole of the left foot, including plantar fasciitis, a shin splint and Achilles tendonitis, forcing me to walk for many months as coolly as Spike Lee in *Do the Right Thing*, which all, miraculously, as an illustration of the holistic nature of our physical makeups, began to heal itself following a chronic, many months long injury, right after I suffered a heavy blow to the left side of the head while chasing Theo through the tangled web of shrubs and tree branches of the regional park in Laguna Niguel. Strong reasons to believe that flip-flops may potentially cause a painful biomechanical imbalance in hips and lower back by their lopsided shape and the sideway drag that they force feet into were also recently expounded⁵⁹³, speaking equally in favor of the fact that flawless posture and harmonious physical movements both originate from the dynamic interface between the feet and the floor. Hence the acclaimed Hans Christian Andersen’s story about a girl wearing a pair of red shoes to the ball and, though she became tired at one point and wanted to go home, the red shoes weren’t and went on to ‘dance her out into the street, over the mountains and valleys, through fields and forests, through night and day’⁵⁹⁴. In fact, my assurance in the enormity of the extent to which the shoes worn outline the magnitude of our spiritedness made me jokily proclaim on a couple of occasions that I won’t be surprised should it be revealed that the American government subsidizes the shoe industry and clandestinely directs it to fabricate only bulky and not so comfy shoes so as to keep its citizens deprived of vital energies and thus less capable of rebelling against it. Should this be true, limiting the scope and the agility of movement via a corrupt shoe business would add to, according to conspiracy theorists, an already present domestic policy of reinforcing distances between people, both physical and spiritual, as through destroying cities by distribution of drugs and weapons to increase the white flight and suburban population, because socially disconnected humans, with no sense of community amongst them, are invalids when it comes to proneness to start a revolution against the crude and inhumane capitalism. And just like the subsidized growth of the American food industry and the amount of processed food that it makes available to the consumers directly contributed to a pandemic rise in obesity, producing physically sluggish individuals of a little capacity to strike up a revolution, prompting the director of the MIT’s Center for International Studies, John Tirman to observe how ‘really fat Chinese people may not be interested in devouring Taiwan and a Twinkies-rich diet for the Middle East may reduce terrorism’⁵⁹⁵, the paradoxical trend that we could delineate in the recent decades is that the more athletic and high-tech shoes inhabitants of the modern age wear, the less athletic and nimble they become⁵⁹⁶. This, of course, is because such shoes were created to disconnect the walker from the ground under the premise that absorbing the treading force will lighten the load on his joints, when the opposite becomes true in the long run: namely, the walker, deprived of the energy flow to and from the ground, turns flabby and frail.

But there is a way out of this trap into which the modern age has thrown us. It starts from reforming our body into a coherent and sprightly unit, where each physical movement will, so to say, speak to the ground and be the recipient of its trembles, acting as a suspension bridge between it and the higher grounds above. Tai Chi masters, for this reason, have advised the visualization of a mystical

shiny ball the size of our chest or so, not only in our hands during the sets of traditional exercises, but also everywhere we go, which is an excellent way of adjusting our center of gravity and moving our body around as a whole. Also, karateka have instructed their disciples to always walk as if someone is going to ambush them, being ready to pull a defensive stance and strike back at any given time, which is another way of ensuring that there is a stable flow of energy going from the ground whereon we stand to the tip of our head. Moreover, to increase our awareness of the vital role that feet play in transmitting energy waves from the ground to the crown of our head and back, Roger Copeland of Oberlin College defined modern dance as ‘a love affair with the floor’⁵⁹⁷. Therefore, when you sit by the computer and type on its keyboard, let the energy of the movement of your fingers come from the whole body of yours, including your feet and the earth beneath you, lest your shoulder and neck or the lower back – depending on whether you are predisposed toward exerting Red Light or Green Light reflexes, which are described just a bit later in the text – become overstrained and achy. Dance accordingly with all that you have. Do not forget your fingertips, eyelashes, the finest joints and even the tips of your hair. Even when you sing, try to do it involving each part of your body, from toes to the head, so as to enrich your voice with color and profound depth. And remember not to give the cold shoulder to people you meet in the street, in both literal and metaphoric ways. Because the waves of excitement should traverse throughout our whole bodies with each sparkle of delight arising in our thoughts. Impressions of the world around should find a natural response in subtle or uproarious dancing of the tiniest pieces of our bodies. That is because all the atoms that physical reality is composed of and the entire existence find themselves in the states of constant wiggling, reeling, swirling, and swaying. Let your smiles come from the ground, as if a joyful sunny vibration leaps from the touch between your feet and the soil, enlightening and rejuvenating the whole body of yours on the way up. D’Arcy Thompson recognized once that ‘the form of an object is a diagram of forces’⁵⁹⁸, and if the upright and vertical form of human bodies, overcoming gravity that tends to flatten us on the ground, point at something, it has to be the vital force spreading in the bottom-up direction throughout ourselves. The Christian symbol of the cross, from this point onwards, could be seen also as a guiding signpost that inspires us to root our feet deep into the ground and let all our movements originate from them, while extending our upper body upwards, in the skyward direction, and then reaching out with our arms and other extremities left and right, all around one, just the way this symbol would have it. Channeling this earthly stream of energy to every segment of our bodies is, thus, inextricably connected to attaining the art of harmonious and graceful movements. For, this physical wholeness of our bodies in action naturally yields the manner of movement that bears resemblance to a shadow that sheds stardust of ethereal grace as it fluidly glides through space, inaudibly, lightly and leisurely, as if walking on tiptoes, similar to the way in which the ancient Tao masters are said to have walked, leaving no sound nor any other trace behind, as opposed to the modern man’s stomping across space like a dismantled and ungainly pile of rocks.

Such an attitude of moving as one can be regarded as intrinsic to both the art of Tai-Chi and Alexander Lowen’s idea of harmonious bioenergy flow⁵⁹⁹, being the key to healthy, youthful and naturally inspiring body and mind. Considering the original meaning of the word Yoga, that is, Union, we may relate it not only to spiritual unison with the divine music that beats within our hearts and pervades entire Nature, but to reaching oneness and a perfect integrity within our bodies and minds. This can be also notified as one of the emanations of the holistic physiological harmony. For, being whole and being One within oneself is a precondition for achieving a perfect unity and harmony with the whole world that, as we may realize from the co-creational thesis, is not only ‘around us’, but is us as well.

Even a relatively short practice of this art of being whole at the physical level may make us feel as if we have started to rejuvenate our mind. We may begin to have childish pure sensations owing to an increased spontaneity and directivity in emotion and thought, which are entailed by preserving this

physical integrity and unison of our body movements. Thence, we may not be able to discern anymore if it is the wholeness of our bodily expressions or the juvenile and sincere wholeness of our emotions and thoughts that are responsible for us feeling like a child again, embraced by a forever youthful spiritedness. After all, we may never know what the real cause behind the revitalization of our bodies or minds truly is, because the two of them – the inner and invisible world of our thoughts and emotions and the external and apparent world of our bodily expressions – are inextricably looped into an endless self-referring circle in which mind invigorates body and body invigorates mind. The ancient Greek saying that ‘a healthy mind dwells in a healthy body’ could thus not be separated from the *vice versa* argument which tells us that a healthy spirit is the key to maintaining a healthy body as well.

How physical habits affect our mental states may be evidenced by comparing how we feel after playing soccer and after exercising yoga, for example. Namely, whereas the former may occasionally make us feel explosive and kicky, the latter typically instills calmness and serenity in us. The effect that physical activities have on the states of mind may also explain why soccer players are generally more aggressive and less prone to exhibit fair play than, for example, tennis or basketball players. Moreover, we could realize how physical healthiness naturally leads to spiritual vigorousness by noticing how the same songs or details of our world appear distorted and disharmonious whenever we experience them while feeling sick, while they tend to shine with harmony when we observe them from the pedestal of physically healthy outlooks. On the other side, the fact that mindsets in which waterfalls of inspiring thought and teardrops of compassion wash over sunshiny emotional landscapes and yield beautiful rainbows on the horizon of our spirit with many a treasure concealed at its end, form a shield of eternal juvenileness around our being speaks in favor of the mind-body feedback in the opposite direction, that is, along the way in which mental states affect the physical stability of ours.

Speaking of soccer and fancy footwork, Chuang-Tzu used to say that a proper man breathes with the toes on his feet, meaning that his breath is so deep that the waves thereof protrude all the way down to the ground. The essential common feature of both Tai-Chi and Lowen’s bioenergetics is the tendency to be in constant contact with the ground. When Paul Haller, the abbot of San Francisco Zen Center, made all of us who were in a room with him stand up and sit, slowly and cautiously, claiming that the whole content of his talk on that June day could fit this miniscule, yet infinitely important act, his intention was to instruct us never to lose touch with the ground, as in that instant when we slump into a chair. Rather, as he had it, we should always maintain the energy streaming from the crown of our head to the floor and back, which would prompt us to be seated with utmost awareness, as if the seat under us could disappear at any time and we slam into the floor. Then, while sitting, we should be aware of our feet remaining firmly anchored to the floor, so that the center of our body weight remains close to the stomach, as if the seat supporting us could, again, disappear in an instant. Instead of leaning on walls and chairs (some people do it with bottles and cigarettes, let alone smart phones these days) in our surrounding, we should, thus, start leaning on the ground and subtly bouncing off it with every single move we make. That way we should be able to face and beat many spontaneous expressions of insecurity that leaning onto walls of the world is emblematic of. By intimately communicating with Earth in this manner, at times we might feel as we have become as stable and sound as Gaia herself, moving everywhere with her, in oneness with the world, and disseminating her message of the magic of creation spontaneously, with our mere presence.

To illustrate how inspiring body movements are always well grounded in the earth underneath, Alexander Lowen gave the example of a charming actress whose smiles, as he was tempted to believe, owed their dazzle and vividness to their arising on her face as if travelling all the way through her body, from the floor to the face. In such a way, we may infer that rousing gestures always involve our entire bodies. In fact, smile is an epitome of joy, vim and vigor and, as such, stands in harsh contrast to uptight

postures that dominate contemporary social settings. Thereupon, the only sincere way of smiling is to let a smiley joy permeate every segment of our bodies, freely engaging them in an exhilarating dance that parallels and feeds on our spiritual outbursts of vivacious emotions. To that end, one should make sure to invest an effort to make no effort at all and allow one's effortlessness to soften and melt the gates that prevent the easy flow of these divine energies all across our bodies and minds. This, however, as we transition into the adulthood and then into the ripen age, becomes an increasingly more difficult task than investing effort to maintain posture and composure at the cost of blocking and weakening these energy flows.

Indeed, it does not take much to be a Christ-like creature for the modern times, the one that bedazzles and inspires by one's mere mystical presence, with pure movement and spiritual vibe, without a single word being said. In a way, as ever, it takes going back, to the earliest of the early childhood, to reach this most sublime of all states of being. To arrive at this marvelous destination, to become a true superstar of spirit in life, the waves of excitement spreading through our mind and body should be let incite each other all until our body starts to freely respond to our states of mind and *vice versa*. With beautiful thoughts fostered inside and opened doors to their unconstrained reflection in the subtle or wild dance of our bodies in the world outside, ever more gorgeous thoughts and movements would naturally induce each other over time. We may then turn into a celestial cartwheel performer that bounces off the ground with arms spread to the world in the act of selfless giving with each move of ours, rolling as such through the fields of reality and spontaneously scattering stardust of divine inspiration across many eyes of the world.

All the movements should thus originate from the ground, involving our whole bodies on the way as their impulse spreads upwards. Postures that are naturally adopted based on the ideal of moving as one and being in constant contact with the ground are more balanced, and by keeping them many excessive and imbalanced strains of muscles or nerves can be avoided. Stress, be it exhibited in form of a thought, an emotion or as part of a physical exercise, may thus become harmoniously distributed throughout the body, just like in a bridge or a lightning rod that are grounded well and able to conduct large amounts of stress and electrical discharge, respectively. When a rod is not grounded well, the buildup of electricity might be significant, leading to its damage. But when we are grounded well, we have the chance to become a transmitter of tremendous energies from heavens above and a deliverer of messages from the divine planes of reality to less sublime and more depressed regions of it.

A branch of the ancient Hindu science of human health, Kundalini Yoga, concordantly emphasizes that enormous spiritual and physical energies, inseparable *per se*, could be made to enter our beings through sets of specific exercises, but at the same time it unrelentingly highlights the risks emanating from the disciples' not being prepared to handle these vast flows of energy. What happens in such cases is that the young yogis become horrified by this expansion of their psyches and voluntarily let go of the newly gained luminescent states of mind so as to return to energetically impoverished states, thus living up to the anecdotal Kierkegaard's idea that 'we do not know truth not because we cannot reach it, but because our beings could not withstand grasping it'⁶⁰⁰. In fact, posing itself as a major barrier before the aforementioned propensity of our beings to become endowed with ever greater spiritual treasures and powers in parallel with the exponential explosion of information that benefits our spirits all around us is exactly the inability to cope with these terrific emotions that tend to naturally multiply in versatility and intensity in us by our interactive immersion in this digital age. Instead of using them as bars on the ladder that ascends us to godly levels of consciousness and/or channeling them into unusually spiritually potent expressions, they are being extinguished out of fear that they would break the bridge of our being in two. The result of this is our dwelling in an age of confusion caused by the amount of signs usable for the spiritual enrichment greatly surpassing our ability to absorb them. In

other words, images of wondrous living could be found everywhere around us, yet the souls to live them are nowhere in sight. And every time theory leaves practice behind, a sense of inferiority in face of the world is bound to ensue, imposing an immense burden on our hunched backs. A step toward the solution is, of course, to ground our beings in the earth under our feet and relay through it all of the impulses traversing us up and down and left and right, alongside reintegrating each segment of our bodies into a wholesome unity, a step that would have powerful repercussions on both physical and spiritual planes, proving itself over time to be of magnificent proportions for both ourselves and humankind.

Innumerable sprained ankles, misplaced knees and other joint injuries could be prevented if we were to move our body as one. Eventually, we might be able to reach an old age and yet be as flexible as a newborn. As I was stopped during jogging along a particularly steep block of California Street in San Francisco by a gentleman who asked me how in the world he could run without hurting his knees, I merely asked him to sit on a nearby jardinière. Just as I expected, he threw his whole body onto it like a bag of bones, which is, by the way, the habit of the majority of people. Hence, I merely said, ‘Once you learn how to sit down as if the seat is going to disappear at any moment and to run as if the ground beneath you is about to vanish at any time, you will heal yourself’. For, such a Zen awareness whereby each segment of a move is carried out slowly and consciously is a vital aspect of harmoniously moving as one. The graceful movements akin to those of a lazy cat in a chill out room, or of Taoist dancers who step lightly and inaudibly, flexibly flowing in space with their moves, would be then brought to life by our bodies. Saying this, I turned around and ran away. With this running away I did not want to exhibit signs of carelessness, but merely to strike up an unusual act which would make my message stay firmly impressed in the gentleman’s mind. It is the trick I often use during lectures to make my points appear more impressive to the listeners.

Recall now how the self-constructive aspect of the co-creation implies that we partly see merely reflections of ourselves in others, as well as that the eyes of others are akin to mirrors in which we can observe the reflections of our deepest aspirations and underlying beauty. However, rather than being blinded by the facial expressions of other people, by observing both them and us as whole bodies our eyes would flow in a relaxed way over the surface features of the surrounding beings. Seeing both others and ourselves as wholes thus proves to have a rejuvenating effect on the way in which we perceive the world.

This is not to say that we should stop observing others in the way in which the famous horse-keeper Po Lo used to do⁶⁰¹; namely, to penetrate with our attention and insight from their external appearances to invisible, holistic features thereof, ‘forgetting the homely details in making sure of the essential, losing sight of the external by being intent on the inward qualities’. The balance between this looking from the ‘inside’ and the aforementioned watching from ‘outside’ is what makes us whole observers.

In this context, we ought to keep in mind that it is Cartesian *Res cogitans* – an observing objective Eye that seemingly isolated from the rest of our being, self-consciously and conspicuously judges about us and the world whilst we are engaged in acting therein – that is responsible for our sloppiness and the lack of grace in our acts. Our attachment and leaning on this *Locus observandi* in our everyday observations is the reason behind our panicky constrictions in face of the others.

Yet, this point does not mean that we should give up on this basic trait of human consciousness, namely self-awareness, and begin to inertly and instinctively float through the world. In the end, the ability to observe the self is not only responsible for the rise of the sense of ego in our consciousness, but for all the creative aspects of personality that self-awareness brings forth. The point is, therefore, that a well-balanced lifestyle provides a ground for the synchrony between exhibiting conscious and voluntary traits on one hand and the spontaneous and instinctive ones on the other. It is one of the

greatest challenges of the modern era to conjoin these two aspects of being, mental and physical, within fulfilling and profound patterns of expression.

In that sense, one of our main missions in life is to learn how to dance with both our body and mind in the course of our creative engagements in the world. Which is where the art of balancing periodicity and novelty, as in the modern musical arenas, comes forth. In contrast, if we stay disconnected from our bodies, i.e., ‘five feet to the left (from it) and unhappy’, as pointed out by Spirit to the faltering heroine of Noah Baumbach’s mumblecore homage to a personality that embodies the authentic spirit of America, with its goddess-like monumentality and colossal affection, but also devilish cravings for success, we will remain alienated from the divine spirit in us, too. For the sake of reawakening these celestial spiritual powers dormant in us, the body and mind ought to move as one, so that body postures and their dynamic flow inspire mental processes, while the wonders of the mind in turn inspire the dancing wonders teeming with life within the human body.

‘And Jesus increased in wisdom and stature, and in favour with God and man’ (Luke 2:52), stands written in the Gospels as an account of the Christ’s youth, whereas one of the I Ching hexagrams says that ‘the superior man consolidates his fate by making his position correct’. These words are here to remind us of the importance of the mutual connection between healthy physical postures and mental attitudes as well as between harmonious physical movements and the unrestrained flow of emotions and thought. Nurturing these precious bridges between the domains of our impressions and expressions stands in sympathy with the central tenet of the Way of Love. Living through it, we care for the inner guiding melody reverberating within our body and mind as much as we look after beautifying every object and being that arises in front of our eyes. Thereby we uniquely live as one with the divine path inscribed within our heart and yet maintain compassionate oneness with the creatures of the world.

Dancing and loving eyes

‘The light of the body is the eye; if therefore thine eye be single, thy whole body shall be full of light’
Matthew 6:22

‘Then touched he their eyes, saying, According to your faith be it unto you. And their eyes were opened’
Matthew 9:29-30

‘Beauty will save the world’
Fyodor Dostoyevsky’s Prince Myshkin

In one of the most inspiring dialogues from the history of philosophy of ancient Greece, Socrates mentioned that ‘eyes are the windows of one’s soul’⁶⁰². In concert with the physiological fact that about 80 % of our sensory impressions derive from our eyesight, Arthur Eddington observed that ‘all our knowledge in the universe could have been reached by visual sensation alone – in fact by the simplest form of visual sensation, colorless and non-stereoscopic’⁶⁰³. Ian Astbury, on the other hand, sang of how through ‘fire in your eyes’⁶⁰⁴ he had found sanctuary, while Iggy Pop praised TV eyes⁶⁰⁵, those that ignite imaginative wonder in the world around by their multi-hued liveliness, reminding us also of how merely glimpsing such vibrant eyes is enough to instantly recognize the level of our attractiveness thereto. For, the subtle dance that eyes exhibit could be used to read the greatest secrets of the sphinx of the spirit that dwells underneath. Accordingly, not only does more than a half of all the environmental stimuli that we ‘collect’ at each perceptive moment result from the action of our visual apparatuses, but

it is the other way around as well. Namely, the finest and the most delicate expressions that our beings both voluntarily and unconsciously shine with come from the radiance of the eyes themselves.

All neural impulses reach eyes first after becoming initiated in the brain. Thence, relaxed or tensed eyes tend to be naturally reflected in a relaxed or tensed body, respectively. To illustrate this, I invite you to observe the tensions collecting within your body after adopting a focused, eagle-eye stare, which, as we all know, sometimes helps us focus our mind and integrate our energy and thoughts. But notice how gentle feelings start to wash away these fine tensions as soon as we switch onto a childishly relaxed glance. The way we move our eyes across the visual field is tightly linked with the way we guide our body and mind in behavior and thought. Learning to gently, fearlessly and gracefully dance with our eyes is, therefore, the first step in learning to dance in an utmost inspiring way with our whole body.

Two major bodily reflexes were witnessed as inherent threats to preserving a long-term flexibility of the human body, along with balanced and healthy movements thereof. Whereas the one, so-called Red Light reflex, is driven by sensations of fear and extreme tension that arise in the face of a sudden peril, the other, so-called Green Light reflex, appears as the consequence of the inner ambition and pressure to act and leave the impressions of stability and vitality⁶⁰⁶. A chronic adoption of the Red Light reflex, also known as the ‘withdrawal’ response, leads to contracted jaw muscles, eyes, brows and trapezius muscles, resulting in bowed neck and shoulders lifted and pushed forward (typically producing stooped and chronically sore shoulders and neck), bend elbows, palms turned downward, and strained abdominal muscles bringing the trunk forward and simultaneously pulling the rib cage down, curling the body forward and preventing deep breathing. In contrast to contracted anterior flexor muscles in the Red Light reflex, a chronic adoption of Green Light reflex leads to contracted posterior extensor muscles, thereby lifting and arching the back in the opposite direction.

Now, both of these reflexes essentially present a response of the body to the underlying emotions of fear and insecurity. However, whereas the Red Light reflex reflects one’s withdrawing into an emotional shell and passively flowing with the stream, the Green Light reflex displays one’s enforced and unnatural tendency to stand forth and prove oneself in face of the streams of the world. Both of these imbalanced postures lead to a disharmonious flow of energy throughout the body, resulting over time in chronic physiological disturbances. In order to achieve a truly balanced flow of energy, we need to find a middle Way between the two. This can be done by complementing the Red Light looseness and relaxedness with being an exciting and energetic ‘self-rolling wheel, a first movement, a holy Yea’ that the Green Light epitomizes. In such a way, we may become neither a passive and dejected Red Light nor a blindly running Green Light, but a wide-awake Yellow Light, standing between these two undesired extremes while displaying a blinking charm and sunny *joie de vivre*.

In both cases, however, one could recognize an enormous role that eyes play in both creation and preservation of these stressful impulses. Be they shrunken and moving quickly like beast’s, cumberously clouded with layers of burdening eyebrows or wide open and kept frozen in a state of panic, such eyes always exhibit a piece of gracelessness when compared to a gentle eyeball dance that radiates with distant peace and energetic enthusiasm, cheerfulness and empathic warmth at the same time.

This balance between excitement and peacefulness may be roughly described by the means of the interplay between focal and peripheral vision⁶⁰⁷, famously applied in Leonardo da Vinci’s painting of Mona Lisa. The great master managed to make our peripheral vision notice Mona Lisa smiling only for as long as our focus is placed on her eyes, whilst focusing practically anywhere else makes the smile disappear. Hence, only while we mildly focus on Mona Lisa’s eyes and flexibly let our peripheral vision ‘surf’ along the nearby light waves we can enjoy her subtle smile, which owing to this balance between

focal and peripheral vision also produces a calming and meditative effect on our awareness. Moreover, in support of the constructivist nature of our perception, the eye itself is what largely draws this mystical smile; namely, as the visual focus traverses Mona Lisa's eyes, the conflict of the visual information appearing at the boundary between the focal and the peripheral vision expands the smile and makes it more pronounced in the viewer's eyes⁶⁰⁸. The focal vision does possess a higher resolution, but every time we glimpse a faint star in the corner of our eye and have it vanish when we focus on it, we should remember that powerfulness often comes at the cost of diminished sensitivity and that 'strength is made perfect in weakness' (Corinthians II 12:9) for all of us who wish not to let the finest and perhaps the godliest of signs pervading Nature pass unseen. All in all, to focus too much and too hard would be equal to fostering merely a tunnel vision of ours, which entails blindness to many secret smiles and twinkly winks Nature sends to us in her subtle ways, whereas to disperse our attention too much in peripheral directions would be equal to losing our focus and directivity of our attention and thought alike. The key is, thus, to learn to precisely maintain the aforementioned harmony between sparkly excitement and radiant calmness through a natural flow of attention between the focal and peripheral areas in our visual field. A parallel of this focus-periphery dance of attention in the domain of human reasoning corresponds to continuous shifts of awareness between the topics of our analysis and the contexts in which they are placed.

In fact, this balance between focused directedness and loose dreaminess, which is engrained in a graceful and inspiring dance of our eyes, can be seen as a reflection of the balance between rigidity and flexibility mentioned earlier in the text as one of the most profound systemic principles. If we are to make our scientific endeavors truly productive, we need to rely on strictly focused examination of logical threads comprising the models of the explored systems, but also let intuitive waves, crashing over us in the moments of relaxed reflections, frequently initiated by insights into metaphoric messages Nature has strewn in front of us, be another guidance in choosing the proper paths in our research. When examining a piece of art, we should similarly know that with merely focusing on its details, without ever letting our mind float around them in a relaxed way, letting the piece of art spontaneously ignite a fire of compassionate understanding inside us, our approach would be too analytic and we might never be able to meet the essence of the messages intrinsic to artistic works and become, so to say, true, warmhearted friends with them. Finally, a similar harmony between focusing and loosening up is implicit in the way eyes that invoke empathy and understanding gaze at each other. Whenever we find ourselves staring at a fellow being's eyes with too much of attentiveness, excessively directing our focus therein and scanning overly fine details thereof, we may realize that this observational tightness has started to extinguish the fire of compassion and understanding within us. 'Idle minds fix upon each other', said a note on the Radiohead website circa 1997, warning us of what we would become, a sluggish, shiftless, dead soul, if we only continue to engage in this practice of freezing our gazes in view of a fellow human being. On the other hand, when we become too loose in our facing the eyes of another, we may realize that we begin to 'look through', as our interest becomes dissipated and unable to focus the rays of valuable impressions into the heart of our being. In both of these extreme situations, we may end up being unable to 'connect' our mind and heart with those of the creatures we communicate with. However, the loving eyes know how to overcome these imbalanced stances by properly blending masculine, tight focusing and feminine, chatoyant shimmering in the way they look at the world. Because they rest on the Way of Love, precisely balancing wide-awake, 'right here, right now' absorbance of impressions with distant dreaminess, the eyes of love appear as 'burning holes'⁶⁰⁹ due to their laser-like directedness, as much as they radiate with an eternal peacefulness, as if the most enchanting dark whirlpools, reflecting twinkling stars, swirl inside of them.

Many other insights relevant for setting the attitude of our mind in proper frames can be derived from learning the art of simple looking at the world. For example, we could easily realize how different mindsets and emotional states correspond to specific focal distances in our vision. When the focus of our attention is too close to our eyes for too long, our skills in discerning fine details in the investigated objects and problems naturally magnify. In contrast, when it is positioned far away in the distance, the holistic inclinations in our thinking become expressed. Thus, highly spiritual, all-unifying worldviews, which however naturally see forests better than they discern individual trees, correspond to such positioning of our focal distances on some faraway horizons in our visual field. Keeping the focal distance fluctuate at some mean distance, therefore, presents the healthiest choice. By implementing this rule, we may become capable of analytically discerning ‘trees’ and yet synthetically keeping our mind on the calming unity of things.

A similar exercise can be performed by alternately setting our sight and the position of the neck below and above an imaginary horizontal line that in its height corresponds to the level of the horizon when we stand at the Ocean shore. Straining our neck into either of the two directions predisposes our mental attitudes to being ignorant and lofty when we look too much up, and too loose and spiritless when we spend too much of our time shoe-gazing at the floor. No need to mention how Green and Red light reflexes that correspond to these unbalancing attitudes of our vision apparatus can produce long-term strains in our physical and mental postures and responses, predisposing ourselves to old-age manners and behavior. And how important this imaginary plane is in the daily eye-to-eye communications may be best noticed by observing the effects of shifting our focus above or below the plane along which an eye contact has been made. If we drop our glance, even briefly, for a moment of a second, below this imaginary plane, a message of repulsion, mild dissatisfaction, disagreement or passive submissiveness is spontaneously sent across. But if we raise our glances above the eye contact plane, a sign of appreciation, acceptance, welcoming and enthusiastic exuberance is naturally shone forth, provided we do not role our eyes, of course. This may also explain why shifts in eye focus left and right along that imaginary horizontal plane normally radiate with a delicate and intriguing appeal. Nonetheless, we need to find the way to balance solemnity and sublimity of looking up and gracefulness and humbleness of looking down in our enchanting dance covering all the dots in our visual field, and connecting them into products of a marvelous and inspiring eye-dancing vision.

The aforementioned ‘eye afraid’, the eye that occupies the state of panic, typically upon finding oneself in a situation in which specific acting or expression becomes imminent, exhibits sudden and ungraceful shifts of focus which gives others the impression of unpleasantness, impatience and hostility. Sometimes it tends to overcome this panicky focal swirling not with the loving, composed and graceful vision, but with an attitude of ignoring others, and occasionally even looking through people around us. However, this approach would present a typical switch of the imbalance towards its opposite, which in this case corresponds to the aforementioned ‘dull eye’ that ignorantly skips the important fine details in the astonishing world around us. At other times, it may resort to the trivial solution of simply hiding behind the screens impermeable to foreign looks. Eyes are, as Socrates mentioned, a window to the soul and we are innately aware that our deepest feelings of the moment are easily readable by the empathic souls that know how to look into the bottom of their oceans, which is why hiding them with sunglasses or carnival masks has traditionally been the way to veil our whole selves before others. Naturally, however, channels through stimuli are absorbed are the very same ones along which the expression of the corresponding impulses occurs, which explains how come we feed our spirit through our eyes more than through any other senses combined and at the same time radiate its essence outwardly more than through any other expression channel in our body. Therefore, blocking our eyes from the view disables us from becoming a shiny spirit capable of profoundly touching and transforming the earthly souls. And

just like an escapist seclusion from the society is analogous to a failure in the exercise of altruism, so do such instances of shyly hiding eyes present the sign of our being downgraded from a striver to reach the spiritual state of a superman, always on the mission to save the world of one kind or another, to a despondent caveman, a deserter into the lonely chambers of our self.

A similar situation exists in the case of some queer advices for achieving good lecturing skills. Namely, instead of constantly referring to the attention of the audience and being dynamically open to feedback interaction with the listeners in real time, certain lecturers advise complete ignorance of the audience and paying attention only to the inner landscape of our thoughts, emotions and intuitions. But this would correspond to emanation of only a single pole of the mentioned Way of Love: paying sole attention to the core of our being. However, another complementary pole pertains to loving observation of others and an empathic immersion in the state from which we may watch how the world looks from their eyes. We never ought to forget either about enriching ourselves or enriching others with each act of ours.

It is true that a sense of mild withdrawnness entails serene states of mind in social communication, but this is not to say that we should become insensitive and ignorant to the beings around us for the sake of achieving this ideal of inner tranquility among the social buzz of people's looks and opinions (recall how Swami Vivekananda described a sacred man as the one carrying still and untouched mind in the midst of a rustling city, being in 'exile on Main St.', so to speak, and yet holding on to a fulfilled, cheerful or storming spirit in the loneliest landscape). Quite contrary, neither should we become like those frogs that say '*ribbet*' in front of almost everyone and sing and dance around a few persons only⁶¹⁰, nor express ourselves in a predetermined manner, independently of the actual social surrounding. For that sake, a special synchrony between preconceived ideas and spontaneous improvisations ought to be brought about in each circumstance. With every new creature and perceived detail within the horizons of our attention, our being inevitably becomes changed and our expressions necessarily ought to spontaneously become adjusted so as to satisfy both the still voice of our heart and act for the sake of bringing some similar peace and happiness into the hearts of the others. And in order to do so, our eyes need to reflect the genuine interplay between Love and Wonder through their resemblance of the gentle and loving waves of the surface of the sea from which enchanting sparkles of sunrays are reflected in a wondering and glittering way.

Constantly staring at other people during conversation is not a sign of respect, but rather a sign of being trapped in the hounds of an external authority around which we then blindly circle like a satellite. The balance of the Way of Love can be thus lost, with our careful listening to the voice of our heart dissipated and the authority of the faced creature left all alone to inertly guide us along our ways. Hence, while dwelling on the Way of Love we rarely stare at another being in an absolutely focused manner, without the gentle eye dance that continuously navigates our attention across numerous beautiful details in our visual field. To do so would be equal to drowning our attention into a blind spot from which we would not be able anymore to discern qualities that others radiate with. In order to prevent that, we need to constantly switch perspectives, no matter how subtle the cognitive changes that this process involves are. Thus, an enlightened mind can be said to incessantly shift one's attention back and forth between the beings in the vicinity and the distant landscapes of one's heart and mind, thereby often appearing partly disinterested in others or even disrespectful of them. Despite numerous condemnations that such an eye-floating attitude can induce, we can be sure that it is a kindhearted one whose role is to maximize one's enjoyment and impressiveness in encountering others as well as to foster an offering of the most creative impulses one can possibly deliver. In fact, behavioral science has shown that prolonged eye-to-eye stares during conversation are signs of one's tendency to shut the party stared at out⁶¹¹, which is consistent with the aforementioned 'blind spot' effect. Namely, by fixing our eyes onto another being,

we do not maximize information captured while facing him/her, but instead subconsciously close the gates that lead to inflow to new perceptive insights. In order to enable this inflow, we need to incessantly wander with our gaze, alternately glancing at the person we communicate with and at numerous details in the surrounding visual landscape. From stylish and charming actors to effective marketing specialists, many are those who are aware that stares are associated with offensive, dominant, disinterested and cold behavior, whereas its opposites in terms of warm, affectionate and sympathetic appearance all involve stellar orbiting and dancing of one's eyes in communication. Even when ceaselessly facing the most adorable creature of our lives in pure amazement, we can recognize ultra-subtle shifts of attention, similar to the aforementioned micronystagmic eyeball movements, which produce minute changes in perspectives and help us maximize the clarity and amount of absorbed impressions. To get the best out of facing any details or creatures of the world, rigid stares and fixed rays of attention ought to be substituted with flexibly flowing from one angle of looking at them to another, as if we have turned into an angel that flies around the objects of our attention, while propelled by the fuel of genuine wonder and love. A recent study has thus shown that just as constant perceptive stimuli tend to put brain to sleep by gradually making it blind thereto, so is with thoughts swirling in our heads: namely, fixed attention to a thought leads to its disappearance from the screen of our mind⁶¹². Hence, we need to hop around the object of our attention, be it a physical or a mental one, just as the Little Prince did, in order to avoid falling into blind spots of our awareness and sustain the given object in our field of perception. Or, as the Way of Love has already suggested, to switch between facing the beings in our presence directly and looking at some distant landscapes of our soul is to see and feel others in a clearer and more beautiful light.

The dancing of our eyes reflects a childish wonder that swirls in euphoric vortices within our mind and heart, and it never stops. Even during the sleep, our eyes switch between the moments of complete relaxation and 'rapid eye movement' intervals. After all, we can clearly recognize a feedback loop spread between the wide awake nature of our senses and mind and the dancing wondrousness of our eyes. Whenever we find ourselves in the state of lazy and dejected drowsiness, we may recognize that our eyes have started to exhibit a similar sluggishness. In fact, just like the impulse behind every sincere smile begins from our eyes (making the subtle smile of our eyes the key in which the difference between honest and fake smiles lies), the same can be said for every other state of mind. Owing to the feedback loop that connects our eyes with all the other levels of our physiological appearance, they could be said to simultaneously cause and reflect each state of the body and mind. In view of that, to maintain the steadiness and the intensity of the rays of our attentiveness, we could go ahead and impel our eyes to wonderingly dance in their curious looking at the world. But also, in order to preserve the inspiring dancing of our eyes, we need to nurture the glow of childish wonder and love that enlighten our being from the inside.

However, this constant dancing nature of our eyes does not mean that our eye muscles should be strained instead of relaxed. Quite opposite, we ought to practice the art of maintaining our eye muscles as relaxed as possible in spite of the frequent stressful tendencies of ours to keep them strained. When overly strained, the movements of our eyeballs are limited in a way that our lateral glances feel unpleasant and may become almost painful. Our eyes in such extreme circumstances may have enormously limited span of movements and almost always stare at the center of our visual field. Even worse, whenever we want to look aside, our neck has to move together, resulting in a mutual tyranny with which eyes constrain the flexibility of the neck and *vice versa*. Physical exercises in which the subjects move their eyes and neck in opposite directions are precisely designed so as to overcome this constraining somatic memory of the mind/body system. In fact, whenever we notice that our sight has transformed the gently waving movements of our eyeballs into fixed staring at fine details in our visual

field and jerky switches from focus to focus, a simple exercise in which our neck would move in one direction and our eyes in the opposite should be performed. Even after a few seconds of doing it, one can usually notice an enormous sense of relaxation when this somatic amnesia that causes the rigidity in the movements of our eyeballs shatters and disappears. Thence, even ordinary glances are not anymore fixed stares, but gentle, wavy and radiant subtle dances around the observed objects. Meanwhile, Linton Kwesi Johnson's prerequisite for 'rewinding our hearts' has become fulfilled: 'The look is always fixed, it must be unhooked'⁶¹³. Stars twinkle with beauty and grace, and our looks should follow the same ideal: the one of resembling the dance of sunrays reflected from the sea surface.

As such, the focus of our eyes should gracefully and elegantly move from one point to the other in our visual field, covering each point thereof and loosely shifting the three-dimensional depth up and down, so that none of the visual areas around us would be avoided and queasily swirled about. We should also keep in mind that the central part of the retina responsible for the focal vision covers only a tiny portion of the whole visual field (~ 0.04 % thereof)⁶¹⁴. This implies that the peripheral vision is essential in defining our visual impressions at any given moment. The importance of not too tightly focusing our eyes like an eagle does upon its pray, but gently balancing the loose pay of attention to peripheral details and the focus on fine details, thus becomes naturally highlighted. In other words, we should keep both the forest and individual trees in our views. For, qualities of the forest co-define qualities of the trees, and *vice versa*. That is, just like every line, letter, word or sentence within a book are defined both by their own intrinsic constitution and the linguistic wholes that they belong to, qualities of the natural systems are always defined from within as much as from without.

In our vision as much as in all the aspects of life in which we have the chance to exhibit our creativity, we should balance Hegel's concepts of precise correctness, known as *Richtigkeit*, and of being in agreement with the sense of the whole, known as *Wahrheit*. The attitude of soft and graceful, Yin wavering that gracefully adjusts to all things should thus be always combined with hard and stony, Yang determinateness and unbreakable will that bends to nothing. Just like some of the proposed theories of the origins of life refer to the gentle dance of ocean waves that had crashed over ancient pebbled coasts, every form of knowledge likewise needs always to concern an interaction between a watery flexibility and firm, rocky foundations. 'Each thing carries Yin at its back and Yang in front; through the union of the pervading principles it reaches harmony' (Tao-Te-Ching 42), Lao-Tzu said. Skeptical openness and solid faith are thus evident as fundamental balancing opposites in all healthily developing systems in Nature. We should be aware that the guiding sings of Nature fall upon us only after we direct our attention and emotions towards the right aims. Even the compass needle has to be designed as north-seeking in order to be able to point us towards the North magnetic pole of the Earth⁶¹⁵. In that sense, the little blue engine's puffing out, 'I think I can, I think I can', as it barrels toward the top of the hill⁶¹⁶, Jacob's grabbing an angel, saying 'I will not let thee go, except thou bless me' (Genesis 32:26), the Christ's bursting through the gates of Hell and grasping firmly the hands of Adam and Eve on the Byzantine anastasis fresco adorning the interior of the Church of the Holy Savior in Chora to pull them out of the dark grave and into the empyrean light of eternity, Van Morrison's dream of a ballerina who chants 'grab it, catch it, fly it, sigh it'⁶¹⁷ deep inside her psyche, like a child chasing butterflies or popping bubbles in the park, as well as the fairies' walking up and down the stairs of a darkened house and singingly threatening to 'bust down your door if you're not there'⁶¹⁸ are only metaphors of the strong, strong will that underlies every truly graceful body-and-mind-floating attitude of divine gentleness.

In fact, the more I look at people, the more I realize how their traits could be, roughly speaking, described by means of simple Yes and No epithets. Personalities with strongly expressed Yes tend to be aggressive, self-confident, determined in the pursuance of their dreams and less self-conscious, whereas

the ones through which the energy of their consciousness typically reverberates No tend to be more defensive, self-contained, hesitant, cautious, self-conscious and ponderous. Ever since the all-embracing outlook was uttered by the seers of this world, from Lao-Tzu in his Tao-Te-Ching to St. John the Divine at the end of Revelation (22:17) to James Joyce at the end of Ulysses ('...and then I asked him with my eyes to ask again yes and then he asked me would I yes to say yes my mountain flower and first I put my arms around him yes and drew him down to me so he could feel my breasts all perfume yes and his heart was going like mad and yes I said yes I will Yes'), Yes frames of mind have been correlated by the progressive mindsets with blissful, angelically judgeless and all-accepting attitudes to which our spirits should stream in their evolution, whereas No stances have been associated with those who inquisitorially rejected the sages and posed blocking dams of arrogant and accusatory negativity all around them, and we know that the word 'dam', signifying obstructions and barriers, that is, essentially No, is engrained in the very core of the Hebrew word 'Satan'. Dam is also a metaphor that healers often use to describe a disease, holding that each illness is a dam placed by biology on a habitual and toxic type of behavior⁶¹⁹, as the result of which healing can be visualized as a positive, affirmative act of crushing these internal dams and setting one's spirit free. Henceforth, the theatre directors nowadays consider the two cardinal sins in the art of improvisation to be: (a) leaving another actor stranded as the scene vibe begins to dwindle away, and (b) 'a denial of the possibility of encounter', also known as blocking action, that is, refusing to accept what another is offering, which is, again, essentially saying No to events unfolding around us. Yet, as pointed out by the drama instructor, Keith Johnstone, who 'grew up hating school and chose to reverse all that his teachers had told him in an attempt to create more spontaneous actors'⁶²⁰, 'good improvisers develop action, even when they aren't sure where it's leading; bad improvisers block it... the motto of scared improvisers is 'when in doubt, say No'. We use this in life as a way of blocking action. Then we go to theatre, and at all points where we would say No in life, we want to see the actors yield, and say Yes'⁶²¹. Of course, both of these Yes and No switches that turn us on or away from things in life, pushing us to or from them, opening the petals of our heart or folding them down, respectively, exist in the deepest troughs and gutters of the dome of our consciousness; hence, Yoko Ono's Yes painting painted on the ceiling, to get to which one has to use ladders and then read it with a magnifying glass, and it says one word only: Yes⁶²². Still, though, we could argue that just like one cannot always clemently keep one's palms pressed together close to the heart nor have them constantly spread towards the entire Cosmos, so do the most balanced choices in life usually correspond to endless shifts between Yes and No, resulting in their fuzzy combinations over long periods of time. 'Only in the market-place is one assailed by Yea? Or Nay? Slow is the experience of all deep fountains: long they have to wait until they know what hath fallen into their depths'⁶²³, Nietzsche's Zarathustra taught, and a harmoniously working hardware of the human brain could be correspondingly seen as akin to a microprocessor composed of millions of electronic logic gates, some of which are in the state of openness and some of which are closed at any given moment, incessantly switching between 1 and 0, Yes and No, over the course of time. Henceforth, Nietzsche's own overly aggressive and individualistic attitude symbolized in the Holy Yea outcry and apparently inspired by then-modern theories of Darwinian evolution of being and the dialectic evolution of knowledge should be complemented with an equally holy withdrawnness in spirit. Only in such a way could one reach the balance of the Way of Love and refresh the inner fountains of an inexhaustible creativity flowing from one's heart. Prayerful and meditative withdrawnness and strong-willed and domineering openness ought to be finely balanced within each one of us.

Indeed, these well-balanced Yin and Yang energies are supposed to be findable within the elemental aspects of the most inspiring and creative personalities. In the frames of the modern cognitive science, this balance is usually referred to as the one between the analytical and synthetic brain

hemispheres, whereas the Eastern traditions of knowledge on the human body and mind are filled with diverse metaphors of masculine and feminine forces that meet therein and are responsible for producing a variety of enlightening cognitive effects. If you look close enough, you will notice that the majority of sublimely creative men from the history of humanity have carried some intriguing female features in them, whereas most of the creatively accomplished women have exhibited quite apparent traits of a stereotypic male personality. In one part, this may be the consequence of creative females' subjugation to the fantasies of omnipotent masculinity and of many male visionaries' having the habit of watching the world through the eyes of their muses. I have even heard a story about a world champion in one of the martial arts, who claimed in an interview that he constantly looked at the world through the eyes of a woman, whom he felt to be the essence of himself. For the very same reason, G. K. Chesterton wittily claimed that 'men are men but Man is a woman'⁶²⁴, pulling forth magical words that call to mind my own strivings to blend Yin and Yang in the hermaphroditic alchemical pot of my mind, as I endlessly spun on the dance floors, with my teenage-riot arms wide open, to the androgynous Britpop anthem that went 'girls who are boys who like boys to be girls who do boys like they're girls who do girls like they're boys'⁶²⁵, on and on. Even today I smell but a fishy conspiracy on behalf of the stronger sex, more dominant on this planet for many millennia, if not ever since, in the ascription of maleness to the image of God, when anthropomorphizing the divine nature of reality, the sacred Thou in the relation to whom everything comprising our experience is brought to existence, should have naturally led to annotation of primarily feminine features thereof, not only because the love of a mom for her sons is the strongest ones exhibited in Nature, on average incomparable in magnitude with that of fathers', but also because the biological beginnings of each one of us have lain in motherly wombs, being the prelude moments of our lifetimes that represent the grand openings to which all beautifully ending stories ought to rush hurryingly to. And if it is true that 'men favor power over love and women achieve power through love'⁶²⁶, then anarchistic I will have no second thoughts when putting a pink flower in the hair of my four-year old son; for, in this world of coldness and bloodthirsty battles for power on each corner, the feminine, not the male-mimicking feminist, must be the way to go if our goal is to save it and help it evolve into something even more beautiful. Hence, whenever I am accused of playing soccer like a ballerina, I worry not, for I know that every mannish activity has to have a dose of feminine gentleness infused in it to be truly successful as much as every womanly task one becomes engaged in has to have an element of manly willpower ingrained in it to truly bear fruit. Our eyes should also strive to attain this balance between a womanly wondrous shimmer of the sparkles of attention, reminiscent of the dance of sunrays over the sea surface, and a manly willpower, the former of which would endow them with superb liveliness and the latter of which would prevent them from becoming too flickery and our glances too cursory and instead instill a dose of stability and stealth in them. This stability would make our eyes be able to look at the eyes of another without retreating in panic; in combination with Yin flexibility, which has genuine curiosity and freedom at its core, it would also enable them to gaze into other eyes with peaceful excitement. A subtle dance between serene stillness and vivacious charms can be thus instilled in our wary eyes.

Wonder supplies our eyes with sparkling excitement and charming liveliness, but Love produces waves of heart-melting warmth in them. Subtract wonder from this equation and yielded will be eyes, loving indeed, but their purely meditative devotion would make them sink into slow, sluggish and intrinsically desperate passivity. Deprived of love, though, underneath their superficially cheerful surface plastic coldness would reside, resembling the eyes of a Barbie doll or of an immature teenager who has yet to discover the beauty and the cosmic necessity of one's heart-bleeding devotion to others, despite the charms of natural wonder that her heart beats with. For, without love, no depth that enables others to glimpse the whole Universe in our eyes could ever be installed in them and, in spite of their

vivacity fueled by wonder, they would never have a chance to resemble those of Elisabeth Haich following her sudden attainment of the so-called ego-death, as described by one of her adherents: ‘Her gaze wasn’t the gaze of a person, it was the gaze of infinity’⁶²⁷. It is, thus, only wonder and love together that can produce timeless beauty in our eyes, in which both the philosopher, the poet and the layman alike would find the seas of love with mantic sirens calling them to dive into and the mirrors of life worth endless praise and astonishments.

The same balance between Wonder and Love that I have mentioned every now and then in the course of this book ought to be intrinsic to the way our eyes express the orbits of thoughts cutting through the stellar space of our mental sphere and absorb the impulses of the world with their dewiness, like a soggy sponge, deep into our insides, where they’d be processed and forged into something precious. As we could have seen from the central tenet of the co-creational thesis, every sensory organ stands as a bridge between the inner world of constructivist cognition and the outer world of environmental stimuli. As much as our eyes bring the inner emotions and aspirations of oneself to the world with their charming glow, they also present a first door that the external impressions enter through on their way towards changing the inner landscapes of our heart and mind. Should we learn how to see our eyes as a bridge between self and others, a giant step in the direction of incarnating the ideals of the Way of Love would be made and all the merits of living our lives in the neo-Buberian spirit, as described in the first Chapter, would come to us, like a blessing from that mysterious starriness that envelops us from all sides.

A balance between firmly dwelling inside ourselves and happily glowing outside, which the Way of Love signifies, may make our eyes shine with an enigmatic warmth. Namely, a mysterious depth in them will look as if absorbing others into their starry whirling wells, whereas a crystal clearness of pure joy and happiness may be equally seen as sparkling in our eyes. As such, our eyes will equally exhibit the charms of withdrawn humbleness and clear determination, thereby living up to the ideal of a well-balanced graceful shyness and a shiny openness. We would be able to look into the eyes of another without ever getting tired or awkwardly looking away in hesitation, not only because our glances would come straight from the essence of our heart. A balance between a distant dreaminess that the partial withdrawnness brings about and an openness that the explosion of creative spurs from inside bears is the one that will make our attention and awareness float exactly between ourselves and the being we strew with our lovely glances. Such an attitude makes us neither turn away after a while nor display an aggressive and psychopathically manipulative coldness in our eyes. Just as the Way of Love teaches us, our eyes would thus be milky in their quiet and dreamy withdrawnness and energetic in their creative directness. Like an archer who precisely aims at his target, our rays of attention would penetrate the objects of our perception, discovering in them qualities sometimes not readily visible with naked eye. This ability to build a supernaturally powerful focus will sometimes be able to set ships on fire, the way Archimedes allegedly did, although an incessant melancholic dreaminess will invoke in them as much soft sadness as required to balance this masculine determinateness with the feminine waves of warm meekness.

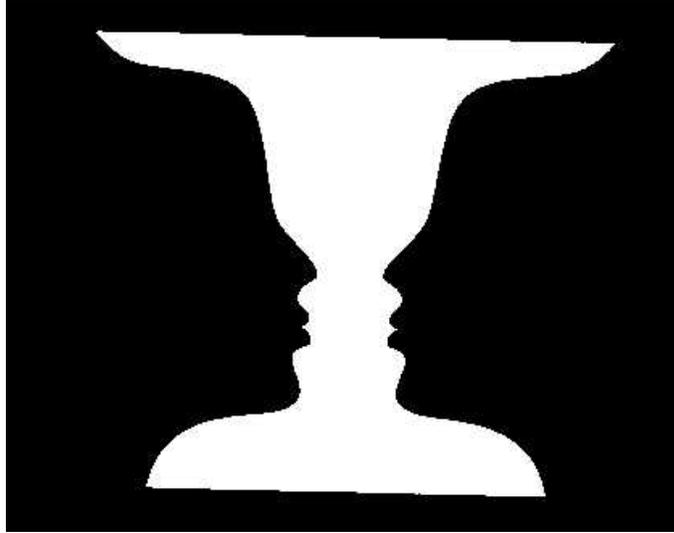
On our way to achieve the ideal of simultaneous exhibition of mysterious depths and vigorous joys in our eyes, I will use the metaphor of one’s immersion in a sea. For, in the end, who could imagine a more beautiful pool of loving emotions to dive in than human eyes? Hence, to have our eyes warmly deep in their stargazing and yet energetic in their curious flying across the details of our surrounding, we need to be a skillful swimmer and diver at the same time. Each one of these details of our visual environment hides an immense amount of information that can keep us amused for endless amounts of time. To value and appreciate the richness Nature presents to us in its finest details, we need to master the art of diving in terms of penetrating and getting deep with our focus into both visible and invisible messages that

these details radiate with. But in order to be able to pick the right visual areas in which we should dive for precious pearls and sunken treasures of miraculous small experiences, we need to be swift and vigorous in surveying the enormous informational diversity of any environment we could think of. In other words, we need to be a good swimmer as well.

This is similar to a successful exploration of Nature during which we need to precisely balance the art of swimming across general ideas and thoughts with the art of plunging deep into specific fields of scientific inquiry. If we swim too much without being persistent and brave enough to dive deep into specific topics and approaches leading to new knowledge, we may end up with a superficial and fruitless personality. But if we merely dig deep without paying attention to the general meaning of our highly focused inquiries we will turn out to be unaware of the broader picture and thus significantly crippled in terms of understanding our own work, which will, needless to mention, be reflected in similar futility of our creative endeavors.

Also, remember that it is our enthusiastic and deeply moving emotions and aspirations that make our eyes exhibit this charming balance between a deep, still focus – that seems as if attracting one into whirlpools of a starry well – and a flirtatious dance of attention. Whenever we get deprived of them we may notice how we become drowsy and let our natural curiosity and playfulness drift away, leaving us alone amidst empty and uninspiring stares. Then we would be bound to notice that we dive too easily into details of the world, just as if we would do with a piece of heavy rock tied to our body or without any willingness to swim with our curiosity and thus maintain ourselves afloat. In these sluggish states of mind, we become too easily attracted to other people's eyes and perceptive stimuli in general, wherein we inertly plunge without any inner desire to express the essence of our spirit, thereby appearing sad, lost and helpless. Another imbalance caused by this drowsiness and the drainage of creative drives from within ourselves occurs when we become overly energetic in shifting our eye focus, but without any ability to get deep and engage ourselves in spiritually healing eye contact with others. In both cases, it is the inner shine of awareness and attentiveness that sets ground for our eyes to exhibit the splendiferous dance of deep joy.

So, when we look into eyes of another and notice the brilliant balance between swimming and diving, we may know that the rays of her attention are finely oriented and stand as bridges that connect the depths of her spirit with the graceful shine of her outward expression. These eyes appear like a sea at which delicate sailors can stare for a whole eternity without ever getting bored. One is naturally invited to swim and dive with invoking a similar visual attentiveness in these eyes. Thus we come to a perfect meeting of two worlds, both optimally tuned to listen to both their insides and outsides and rest with the rays of their attention equally inwardly and outwardly, signifying a perfect harmony of the Way of Love.



As a matter of fact, our pupils present the most flexible elements of our bodies, as they normally triple in size following the moments of excitement. Thus, what two beings in love look for when they lovingly face each other is said to be nothing but the dilation of pupils⁶²⁸. Only thence comes their subtle dance of attentive excitement. Whereas contracted pupils are often correlated with mean and destructive looks, dilated pupils present the sign of feelings of pleasant excitement, curiosity and lovingness. Furthermore, what makes insincere smiles and dances so readily obvious is exactly their pairing with contracted pupils, and hypnotists know the power of dilated pupils all too well. Dilation of our pupils and awakening of an enchanting smile that penetrates and heals every miniscule part of our bodies and spreads its shine outwards are enclosed in a feedback circle, the beginnings and ends of which could not be easily untangled. With our pupils spread wide the peripheral visibility also gets maximized, which presents the right state to exhibit the balance between precisely focusing onto details in our visual environment and yet gently swinging our attention among the entire visual field of ours.

Our successfulness in balancing energetic excitement and soft relaxation in our eyes (and in every other aspect of our being as well) crucially depends on the ability to completely relax our eyes and the whole bodies. Before sleep or in other relaxing moments, one should necessarily relax first the fine muscles around one's eyes all until they become almost completely open. When perfectly relaxed, eyes are rarely closed and are normally either fully open or semi open. Sleeping perfectly relaxed, thus, equals sleeping with partially open eyes. Myopic eyes that are inherently linked with overstrained eye muscles particularly benefit from such exercises. Furthermore, the exercise in which subjects freely and gently sway from side to side, letting their mind relax and start seeing the details of the visual field as gently floating left and right is similarly beneficial, just like the one in which the subject with her eyes closed draws the train wheels or anything else with her nose⁶²⁹. As far as the former exercise is concerned, it is invoking music in our body movements that imposes a similar rhythm on the movements of our eyeballs. But the effect in the opposite direction occurs as well. That is, once our eyes start exhibiting a free and graceful dance, a similar harmonious nature seems to win over jerky, alternately fighting and stumbling movements that nowadays typify most of human glances and gestures, looks and outlooks, inner and outer aspects of their being. Also, some of the classical meditation exercises in which we gradually distance our awareness from all the momentary perceptions (through saying to ourselves 'I am not this, I am not that...', leaving us as a seemingly distant, but in fact a significantly more aware observer of the world) may be useful not only for softening up the stiffening and

psychologically burdening self-awareness, but for awakening a gentle, relaxed and yet delightful and lively dance of our eyes.

Inability or subconscious unwillingness to form eye contact in ordinary encounters with others has been already accepted in some parts of the world as a symptom of serious psychological disorders. This depressing inertness of our eyes is normally entailed by blank, expressionless faces which have been shown to produce anxiousness and frustration in children⁶³⁰, probably owing to the fact that children find them foreign and unnatural compared to their innate bursts of natural and juvenile expressions. Our typical eye movements are, however, in large extent spontaneously acquired from the social circumstances that we have lived and grown up in. An experienced mind can sometimes recognize people with specific cultural backgrounds based only on the way in which they shift their eye focus. Thus, not only can pupil patterns be taken as a sort of a personal fingerprint, but a subtle dance composed of the movements of one's eyeballs, shifts in the focus and blinking too. In that sense, we could also notice that the level in which humans are using their subtle eye signs in daily communication could be regarded as corresponding to the level up to which their social relationships have evolved.

All the subtle signs that we constantly shed with our eyes reflect the inner drives of our being in the world. Inner excitement and shining aspirations make our eyes sparkly, as if mysteriously reflecting these glows from inside. Similarly, the feelings of desperation and loss of meaning and belief in the value and importance of our thoughts and actions naturally produce weary, tiresome and muddled movements, so different from their excitingly sparkling dance, initiated by the inner glow of natural wonder. As a result, emotions, thoughts and our deepest aspirations always somehow find a way from the cognitive foundations of our being to the surface of our eyes in which they then start to leisurely swim, making them truly the window to our soul.

Solitude can, however, make eyes sensitive to eye contact as much as darkness can make them sensitive to light. After theory, therefore, there has to come a time of practice. And during that practice we should not forget to continually stretch feedback connections towards our knowledge and back, because that is the way of improving our creativity in life in each one of its domains.

And once we learn how to floatingly dance with our eyes in relaxed observational states, the task still remains to maintain the same combination of gentleness and liveliness in the moments of expression, including speech, gesture and any other form of communication. This is actually when the tendency of exhibiting the panicky frozen looks that form a sort of wall between ourselves and others, is usually the highest. It presents a special challenge to learn how to overcome these self-conscious fears of displaying our behavior freely. These blocking fears are naturally reflected in the language of our eyes, and *vice versa*. To end this self-torture, we may tackle both sides: the heart of our intentions on one, and the dance of our eyes on the other. And we should pay a particular attention to our breathing because it also tends to stop and turn into shallow one in these blocked states of expression and impression of our body and mind. Maintaining a similarly gentle, deep and yet flexible and lively breathing presents another crucial aspect of the way towards attaining the discoursed ideal of graceful thinking and acting.

In the end, all of these frozen states come out of the sense of fear. But fear is not something to be feared of. In a normal form it presents a natural and innate mental and emotional characteristic of all biological creatures. Like pain, it serves the role of letting us know when the path of our decisions becomes dangerous and potentially self-destructive. Just like pain prevents us from keeping our fingers placed on a hot stove and eventually burning them, a reasonable fear keeps us away from approaching cliffs in life too close and possibly falling down from them. Or, as Paul Tillich put it in his treatise on courage, 'fear and anxiety are the guardians, indicating the threat of nonbeing to a living being and producing movements of protection and resistance to this threat'⁶³¹. Therefore, fear can be said to pose benevolent boundaries on our curiosity, which threaten to become irrational and deleterious only when

they cross a certain threshold of normality. And if true bravery can flourish exclusively in the form of an aura around the tender and tremulous blossoms of fear and anxiety, we could be instantaneously teleported to Ancient Greece and Aristotle's definition of courage as 'the right mean between cowardice and temerity'⁶³², so as to put the stamp of eternal validity onto it.

Once it is accepted as a natural trait of our humaneness, fear could be worked on and transformed into an intrinsic feature of any pleasant state of mind; not the one in which it is freezingly refused, evaded and feared of, but the one in which it could be valued, appreciated and, most important of all, nourished with love. Then, we could be reminded of the beautiful thought from Rainer Maria Rilke's Letters to a Young Poet: 'Perhaps everything that frightens us is, in its deepest essence, something helpless that wants our love'⁶³³. And it is true. Just look into yourself. Whether we feel fear of the room full of people that we are about to enter, of specific conversations with others, of expectations and invitations to act, of our own communicative features, or of the inescapable human destiny, isn't it that all of them are actually craving to be loved by our consciousness and heart? It is not with cold-mindedness, blind-mindedness or anger that these fears ought to be transcended, as it would eventually only render us to become like those foolish souls that rush in, while sinking the dream of becoming one of the angels who fear to tread deep into the foamy sea of oblivion. It is by overcoming these fears by weaving the patterns of wonder, grace and love around them that predisposes us to attain a truly enchanting and impressive personality. The interplay between the intensity of our fears and the power of love awakened deep inside of ourselves to courageously face our fears with is the one that draws the wonderful steps towards the sunrise of grace in our movements, eyes and experience. Thus we approach the beauty and evolutionary importance of the patterns of fear, erroneousness and imperfections, which will be elaborated in the next section.

It is, therefore, essential to recognize this feedback interaction between our deepest intentions and emotions on one side and the dance of our eyes on the other. Thus, if we want to enlighten the former, we can also tackle the other side, that is, beautify the dance of our eyes, and *vice versa*: if we want to succeed in the latter, we would need to honestly orient the depths of our mind and heart towards ethical and aesthetical values that have typified humanity ever since. This seems to be the only way to beat those arrogant frozen flashes that we irradiate every time our ego draws a wall between ourselves and others out of fear and lack of self-confidence. This way of looking is torturous for both others and us, but with a proper attitude and dedication to starry training, the elements of which have been outlined herein, it can be readily transformed into humane, gentle and inspiring looks.

All our vigorous emotions and states of mind naturally become reflected in vigor and charm that radiate from our eyes. It is the subtle dance of tiny muscles and information signals that is responsible for these fine and almost imperceptible movements that are the source of important messages in each eye contact that we are engaged in. It is the reason why we can gaze into someone's eyes without ever getting bored, and feel as if we are watching the sea.

But if we have ever looked deeply into eyes of a pet or a wild animal, we could have noticed the lack of a vividness that typifies human facial expressions. Humans can visibly and meaningfully dance with their eyes even if the rest of their face is still. The evolution of life, mind and the planetary amount of information inevitably leads to a more profound dance of movements in all aspects of being, from wiggling thoughts and wavering emotions to all the atoms that comprise animated creatures and the high-tech gadgets that they use. Evolution has proceeded in an upward direction, enlightening minds of living beings, and the dance of our eyes should naturally follow the same trend in becoming simultaneously self-expressive and communicative, that is, having both the essence of the being of us and of others as the referential pair of nodes between which the music of our creativity sustains, just as the pair of elementary Christian commandments has suggested and as the essence of the co-creational

thesis teaches us. Zebras may be extraordinarily vigorous in their body movements, but their eyes are as still as a drawing, and it seems to be our divine evolutionary duty nowadays to instill this fantastically elegant bodily liveliness that these and other animals exhibit to our faces and eyes.

After all, as all the other sections of this book have at the end of their discourse touched a majestic wall on which the balance of Wonder and Love are drawn, the same will be done herein as well. We have passed a long way from giving rise to the first visual impulses of awe and wonder that made us step on the path of an adventurous quest for knowledge. We have seen life and the physical reality composed of a miraculous music and dance of particles in each one of their aspects and details. But in the end, we have returned to the eyes that see the world and found in them the most marvelous of all dances in the Universe.

On the way to attain the ideal of waking up a majestic dance of soft warmth and joyful excitement in our eyes, the one that will make the soil below and the stars above move in accord, we should once more return to Wonder and Love entwined within our thoughts, emotions, aspirations and even the tiniest expressions. Wonder and Love, proclaimed as the beginning and the end of knowledge and being, when swimming together in the pools of our eyes make them radiate with a brilliant charm. These eyes neither panicky defend themselves nor badly try to leave a good impression on others. By not being subject to fight-or-flight impulses, they neither retreat in fear nor flash in anger and resentment. There is a certain calm and peace as much as a starry orbiting excitement in them. As if warm vortices in which the all-encompassing nature of life in which wonder and love flow into each other in endless spinning cycles are enlivened in these eyes.

If our eyes would be permeated with a divine Love and yet be empty of the sparkling wonder springing from a sense of enchantment and divine magic found in each detail of the world, they would reveal mild, soggy and passive expressions. But if they would be pervaded with a pure wonder without a single warm wave of love, they would again lack something essential. It is only a balance between wonder and love that can make our eyes shine with a crystal clear and cosmically joyous excitement, and yet pulsate with a dose of warmhearted softness. It is as if we would be having crystals and water clinking and streaming; sparkly stony coastlines washed with sea waves in our eyes – the aforementioned symbol of the beginnings of knowledge and life.

The most astonishing observation, however, concerns the origins of this contemplation of mine about wonder and love blended in the most beautiful eyes imaginable. Miraculously, it was just one glance directed towards me that inspired me to come to this entire thread of thoughts. Later, I mused that if a single look can be so powerful, what about the other forms of human expression? How mountain-moving can they be? Indeed, sometimes I feel as if we as humanity have only briefly glanced into the potential of the creativity of human thought and behavior in beautifying the world. As of today, only a tip of the iceberg of the creative possibilities of human behavior is visible to most, with the exception of visionaries and prophets.

How wonderful is it to think that our eyes may carry such an immense beauty to spontaneously enlighten one whole world in a fraction of a second. What a great thing to practice our faith in would believing that a single lightening glance can illuminate human souls be. How great would it be if we could start looking at others with the underlying passion to save the world? Permeated with wonder and love, these looks would be as passionate and wavy as dreamingly peaceful and calm. As if embodying the qualities of the Little Prince – an adventurous passion to leap from star to star and a love in his heart for the lovely rose from his planet, the one that ‘makes that stars look beautiful’.

But then, my ceaseless wonder does not let me rest, and after a while I began to ask myself if those were the eyes of another that inspired me or those were my own eyes that created this impression by glancing at the glance of the eyes of another. And thus I come to the core of the co-creational thesis,

which tells us that it always takes two creative sides for any observable quality to be given rise to. As Hans-Georg Gadamer noticed⁶³⁴, it is the intersection of the breadth of horizons of an actor and of an interpreter that defines the constructed meanings in the interpreter's world.

Hence, it ultimately takes a pair of eyes looking at each other to form an immaculate source of creativity and enjoyment. Starry seas of wonder and love in our eyes, looking and graciously responding in their subtle expressions and impressions to each other. What a wonderful symbol of the co-creational thesis and the nature of experiences.

So, could there be a more exciting kaleidoscopic firework of jubilation than to go look into someone's eyes? 'What I say unto you I say unto all, Watch' (Mark 13:37), as the Christ uttered, just prior before 'the veil of the temple was rent in twain from the top to the bottom' (Mark 15:38). Thus, as the Way of Love has suggested, let us divide our world into two and imagine the shiny treasures of spirit, one part of which is at the seafloor of the ocean of our heart and another part lying scattered in Nature and amongst all of its creatures. Heinz von Foerster once observed that we ought to dance with someone in order to recognize who we really are. It is because human being is a human being with another human being. That is what a human being was in his neo-Buberian world of thoughts. But on the other hand, I argue in addition that in order to dance with others, we need to dance with ourselves at the same time. We need to be deeply immersed in our inner cognitive landscapes as much as to think about the creative ways in which we are to give our heart to others in order to live truly fulfilling lives. Yet, once we get there, we should be sure that our eyes would be the first to recognize that, releasing an immediate shine of sympathy. Because, if we were to get back to the beginnings of the Western thread of our philosophies and to the start of this section too, we would come to Socrates' proclaiming that eyes are the windows to our soul. So, let us remove the dark veils of dishonesty and make them shine to the world with the love and wonder of our cognitive foundations.

On the beauty and importance of mistakes and imperfections

'They that sow in tears shall reap in joy'
Psalm 126:5

Where fools rush in, angels fear to tread

'It is hard to be brave', said Piglet, sniffing slightly, 'when you're only a Very Small Animal'. Rabbit, who had begun to write very busily, looked up and said: 'It is because you are a very small animal that you will be Useful in the adventure before us'

Alan Alexander Milne, *Winnie-the-Pooh and All, All, All*

Humans in their youthful days almost always appear as if having an innate need to overcome their shyness and self-consciousness, whose role is to protect one from reckless and risky acting, with an exciting freedom of behavior. But when they do succeed in that, they may realize that their bodies and faces have grown to be masks and gowns, ready to dishonestly form any expression at all without involving the real emotions. And then they would want to go back. Back to the state where every tremble of the heart was a flicker of that eternal flame of love that colors things around one with celestial vividness. As if only then they find out how wonderful it is to have one's heart floating in shiver with the surface of all things.

Only then do these piteous souls remind themselves the teachings of the great actors that the worst thing in acting is acting. For, even the actors blend their hearts with the roles that they are playing. The art of making each cell of our bodies vibrate with the empathy for the music of life that beats around us would predispose us to become a wonderful dancer as well. For, in accordance with the co-creational thesis, emotions that arise out of awakened empathy and compassion seem to deepen the introspective insights into the essence of our being. The tears that we cry for others clean the mirror of our soul.

For, with each heartbeat of ours, the waves are sent through the physical environment created by our emotions, intellect and the biological nature, forming harmonies that would travel through time and space as if emitted on a radio station, and in subtle ways influence life on the planet.

In that sense, let us be reminded how only fixed nodes and flexible oscillations can together create and sustain music. Similarly, only the dynamic balance between firmness and flexibility at all levels of the living order can produce harmonious existence. Therefore, the Sun of a sacred spirit rises along our spine in the course of our lives, like a glorious bird of paradise spreading its white wings, not because we have strangled all our fears, but because we let our fears freely grow side by side with the cosmic powers of love, faith and sacrificial courage in us.

Someone has said that when reduced down to their core the emanations of life manifest themselves as either the ones of love or the ones of fear⁶³⁵. The music of life is, likewise, based on the interplay between a flexible flow of things, thoughts, emotions and energy on one side, and a firm, stony and determined strength of character on the other. We should also recall how the epithet of ‘satanic’ originated from the Greek word for ‘obstructed flow’, whereas gentleness and graciousness of love could be identified with the furtherance of deliberate and fearless flows. Though when we look at a river flow, we may never know whether it was the river that has sculpted its banks, or those were the banks that have guided the flow of the river. They might have been, in fact, mutually affecting and supporting each other on the path of the informational growth of our civilization. For, love and fear, like good and evil, seem not to be able to exist independently of each other. The moment one would perish, the need for nourishing the other would vanish, too.

As a direct consequence, we could neither imagine life without death nor anything without nothing. It is their interplay that the empyrean meanings attributed to the qualities of life originate from. The fears of dying and suffering as the greatest fears imaginable could thus be seen as vital impetuses for the ascension of humanity towards collective glorification of the values of love, beauty and grace. Indeed, somewhere deep within the spheres of my psyche, where my muse dwells, slender and soft, moving gracefully like an autumn leaf grazing the ground in an Indian summer breeze, with eyes wide and wavy at the same time in their exhibition of Wonder and Love, the two pillars on which the magical world of ours is sustained, looking deep into them I have occasionally also recognized the glimpses of fear, the emotion that essentially widens our eyes, cocooned in the core of this Wonder, as well as a sprinkling of remorse as the rain that feeds this sea of Love on which the stargazes emanating from these eyes have been gently swayed and lulled. Blinded by this insight, as if seeing eyes that just turned into swirling whirlpools of two Tai-Chi-Tu emblems, hiding the contractive forces of fear and remorse in the center of the expansive shine of Wonder and Love, I felt impelled to question whether the most blissful qualities of life could ever be exhibited without their antipodes hiding somewhere deep in their hearts. Professional psychologists later confirmed the meaningfulness of these seemingly paradoxical ruminations of mine by paying my attention to the fact that, for example, anxiety rests in the heart of hope⁶³⁶, one of the three most essential Christian qualities, and that, therefore, internal emotional conflicts are a prerequisite for the rise of any emotions inside of us. This was when I began to wonder if we could be imagined soaring towards ever more sublime states of being at all without being constantly dragged down by the depressing weights of our fears and disappointments. Could our living in the world

wherein ‘feathers hit the ground before the weight can leave the air’, as stated in R.E.M.’s *Fall on Me*, be crucial in terms of enabling our flights to the skies of otherworldly bliss? Could it be that something ought to die before a beautiful act is being given rise to? Could it be, finally, that the fear of death has motivated every single creative contribution to humanity as well as each of our runs to reach enlightenment in this life? After all, the Biblical story of the Christ’s resurrection can be metaphorically interpreted as the death of one’s ego and the awakening of the selfless, divine love as the path to eternity. The fear of death may thus have the role of providing the boundary conditions for our beings to expel the selfish roots of egotism from ourselves and be born again in the Christ, thereupon selflessly living every moment of our lives for the sake of saving and beautifying others. The battle between the two streams, the one of fear and the other of selfless love, as they flow in and out of each other, could be seen as underlying every conceivable pathway of progress in Nature. The intensity of this battle taking place within the deepest streams of human consciousness seems to be directly proportional to one’s cognitive and spiritual growth potential.

Fear has actually been an essential emotion in the human repertoire of feelings that promoted our evolution into where we stand now. The sense of perfect security and an absolute lack of fearfulness are not the attributes of heroic characters, as some might be tempted to think. In fact, the lack of fear induces spiritual and attentional drowsiness in us. Fear, in contrast, initiates a sense of alertness, and when it is present in moderate doses, I believe that it increases the longevity of human creatures too. This statement can be backed by the well-known fact that chronically homeless people picked from San Francisco streets and taken into cozy shelters often pass away in a year or two, the reason being attributable to the lethal effect of the transition from an environment where they are constantly exposed to danger and where they have to exercise their survival skills at all times into a safe haven that makes them ‘able to let down their guard and just be’⁶³⁷. Further, I have occasionally flirted with the idea that the immense disparity in success between the American women’s and men’s soccer national teams on the international stage ties to the freer displays of fear by the former players, given that fear incites vigilance and sensitivity, which are vital for any sport, especially the collective ones, whereas too much courage puts these essential characteristics to sleep and promotes irrational, kamikaze-like showoffs of individuality on the pitch. Hence, just like many other unfavorable features of life, acting as obstacles on our projected paths of development, but actually providing conditions for our ascending towards ever more beautiful features of life, fear may be also seen as a background quality that keeps us suspended in a state of strain, like a tight spring ready to relax and propel us in the right direction when the time comes and thus assist in our attaining more advanced states of being and mind. If this is so, then fear may be merely another one of those neo-Mephistophelian forces that ‘wish and act maliciously, but eventually brighten up spirits and infuse them with the glow of goodness’⁶³⁸. This would not be surprising in view of the recent studies showing a positive correlation between worry and intelligence and suggesting that these two primordial powers of the mind have coevolved together⁶³⁹, notwithstanding that the former seemingly pushes the mind back or freezes it in a current state while the latter is progressive in nature and propels it forward, resulting in the scattering of the rays of attention in all the directions, like around a shining sun. In search of the incarnation of heroism in us, we should thus not be allured to erase every last traces of fear in us; rather, to be sensibly fearful, but also bold and fearless at the same time, just as my Mom was, should be the key to the displays of the most valuable and noblest forms of valor that drive humanity forward. To support this line of progress, therefore, this balance between fear and fearlessness should be maintained, or else the fears would drag us down if they prevail and we hesitate to encounter them with ever greater armies of willful valiance arisen in us. The latter are, of course, commanded by the power of Love, resting deep within the foundations of our consciousness. This is how I am brought again to my sincerest belief that in the spirits of all the blissful

creatures in this world, my beloved mom included, the winds of fear and the sun of love clash with each other, tugging and pulling the spirit engrossed by them in opposite directions and creating cracks in their consciousness, through which the light of their soul divine emerges to the surface of their beings.

This is why we need to face our greatest fears in order to get to the most precious treasures of life. Nature, of course, does us a favor to this end, paving the way for our spiritual development by constantly bringing us face-to-face with our biggest fears and impelling us to counteract them with the power of love awakened in us. To the darkest and the most terrifying corners of the world thus we must go to pick up the voice of our soul and continue to grow angel's wings from the edges of our spirit wherefrom its saps spill over onto the world in waterfalls, as if from a silver plate resting on the back of a whale. 'And the people stood afar off, and Moses drew near unto the thick darkness where God was' (Exodus 20:21), the Bible describes Moses' ascension to mount Sinai to hear the genuine truth of sacred living and announce it to the people of Israel. 'He made darkness his secret place; his pavilion round about him were dark waters and thick clouds of the skies' (Psalms 18:11), similarly stands written in the Psalms, whereby St. John of the Cross wrote about 'the dark night of the soul' as the phase of desperation and spiritual loneliness through which all saints pass on their way to enlightenment. 'The abyss hides the truth', Democritus proclaimed; 'dark and dim, within is the essence' (Tao-Te-Ching 21), Lao-Tzu drew; 'live always at the edge of mystery – the boundary of the unknown', J. Robert Oppenheimer remarked, whereby Friedrich Hölderlin movingly touched the dialectical nature of life when he inscribed that 'where dangers are, grows the saving power too'. And many of us may be aware how every relationship (and particularly the romantic ones), sooner or later, comes to crucial make-or-break moments, preceded by a striking silence, as if preparing us to be ready to pick the right instance to bring about the moves that would either gently distance or gracefully approach us to the beings of the world. Hence, there is no truly valuable gift in life that can be opened without making trembling adventurous steps on the way to them. Like Frodo and Sam asking themselves why they actually set the sails at all for an adventure like the one in the fantasy about the Lord of the Rings, the same crucifying hesitations tear our beings apart on all the precious paths that Nature can place us on. And yet, our love in the end lights up the right way for us to follow.

Whatever the task we engage ourselves in, we could always notice a direct correspondence between the extent of inspirational glow that the task brings forth and challenging, 'troubled waters' that we have to cross on the way to its accomplishment. As we prepare for any performance, be it a lecture, a concert, a theatrical act or dancing in a discotheque, we ought to know that the first moments are the hardest, truly soar-or-sink moments, during which we either drown into a timid, uninspiring and selfish behavior or soar into beautiful, free, selfless and yet sane acting. In that sense, we should not hesitate to face and cross these dark points that mark the first steps towards every remarkable path in life, the steps that are, as we all may know from experience, the most puzzling and intricate ones. These initial moments of all valuable acts practically present miniscule crises that bring about turning points in our relation with the world, one side of which takes us to novel and prosperous opportunities and the other side leading us to muddy, teary-eyed waters of remorseful and penitent spiritedness. Unless we are ready to face these flawing beginnings, we may become like a flawless man of whom my Belgrade buddy, Željko Makivić, once said: 'So this flawless man lived, lived, and passed away, without anyone ever noticing him...' ⁶⁴⁰. The question, though, still remains whether walking with perfect precision along the thin line of the balance between a meditative withdrawnness and a warmhearted expressiveness that the Way of Love signifies, without ever stumbling and falling onto either of the two sides, might, in fact, render us reminiscent of the spotless Tao sages from the golden era of humanity, whom Chuang-Tzu wrote about, the ones who had never left a single imprint nor a trace on whatever the creative task they committed themselves to and whatever the path they traveled on were.

At each and every moment of our lives we have the choice of following either the path of the lame and predictable or the trail of the challenging and exciting. Whether we choose a person for conversation at a party, pick a dining place or sweep through innumerable possible ways to express ourselves at any given moment, we are always faced with this duality of choices. And we should know that the magnitude of potential gains and timidity arising in us are always directly proportional. That is, 'life beings at the end of your comfort zone', as it was pointed out by Neale Donald Walsch, certainly in agreement with the popular adage saying that 'dreams that do not frighten us may not be great enough'. In other words, the more we become anxious and fearful about certain paths in life, the greater the treasures that wait for us at their ends. Hence, after being severely timid for the most of my life, I have brought forth one of the most precious guiding principles. It is to always pick the options that make me most feel afraid of, knowing that the greater the abysses that we face in our quests for the proper action and knowledge, the greater the treasures we may stumble upon. In a way, this existential imperative that I have held onto is identical to the ethical principle popularized by Heinz von Foerster, namely 'act always so as to increase the number of options'⁶⁴¹, as well as to its analogue in the world of chess, namely 'move the piece with least options first'⁶⁴². For, narrowing down options is a logical way to cope with fears, whereas gradually diversifying them leads to the point of our becoming terrifyingly overwhelmed by the magnitudes of possibilities opened before us. Yet, it is in the latter that the pathway to infinite being lies.

So, next time when you step in front of a large audience, remember how love, responsibility, carefulness and stage-fright present links in a circular causal chain. Only through accepting them all would our expressions preserve the attributes of natural, lively and inspiring. To truly inspire people is not to be perfect and flawless, but quite opposite: to express a battle between our dreams of angelic perfection and humane erroneousness within every aspect of our personality and creativity. For, exemplars and leaders for the times of peace and prosperity, as I have claimed, are not the impulsive, fiery spirits prone to destroy whole civilizations when the first arrows that hurt their egos begin to fly through the air, but by the oversensitive, empathic souls, as rare as diamonds in the dust, whose entire beings tremble in fear upon making every step in life, always with deliberation, tact and grace. To fear is thus to lead the way forward, heroically, and, conversely, to annihilate all fears is to sentence oneself to standing in place, cowardly, and be passed by the starry train of divine being journeying towards stars in this fabulous fairytale that life is.

Cravings to attain perfect expression in the domain of the art of blissful living quite neatly correspond to strivings to reach the vistas of perfect knowledge in the intellectual spheres of our being. Thereupon, in the realms of science and everyday dialoguing alike, it seems that a constant struggle exists amongst people to prove oneself right and more knowledgeable than others. However, once one finds oneself at the peak of knowledge, toweringly overlooking others, one realizes that life is actually very boring and cold up there. Yet, often the way back, to the days of blissful ignorance, is thoroughly blocked then. It is then, however, that these strivers for epistemic perfection often realize the beauty of letting the sea of one's knowledge shimmer with soft uncertainties below the rigid mountains of other people's lofty worldviews. With the faint wavelets of anxiousness fully thrown out of the repertoire of feelings, they may realize that their steps, now sturdy, determinate and powerful, have grown stonily cold, ungainly and insensitive. For, not arrogance and hauteur, but the sense of honesty and faith, both of which lean onto insecurities in our thinking and behavior, provide our acts in the world with a beautiful subtle nuisance and charm.

Some might say that we should not pursue the way of honesty and humbleness, notably attributed to the character of Prince Myshkin from Fyodor Dostoyevsky's novel *The Idiot*⁶⁴³, and instead conceal our naturally wondering thoughts and ideas behind the screen of an affectedly willful and

insincere behavior. But if we do that, gradually we would realize that we have spontaneously gotten deprived of the shiny essence of our being. In other words, we would literally grow up and would desperately have to look for the ways to get back to the yellow-brick road of childlike honesty and the words idealizing the perfect transparency of our spirits handed to us by the Christ: 'I call you not servants; for the servant knoweth not what his lord doeth: but I have called you friends; for all things that I have heard of my Father I have made known unto you' (John 15:15). And the way thereto would again lead through bestowing upon ourselves the sparkles of graceful uncertainties lost somewhere along the way. This road would be marked with the acceptance of a myriad of fragilities and insecurities that the embracement of truth implies. Unnoticedly, however, as we keep on walking on it, the beauty of our being would increase in size and scale, for sooner or later we would come to conclusion that 'beauty is truth, truth beauty – that is all ye know on earth, and all ye need to know', as John Keats poetized in the Ode on a Grecian Urn, in the context of which now I also appreciate the words jolted down by the popular Serbian politician of the early 1990s, Vuk Drašković, to a friend who had asked him for an autograph: 'To Mirjana, who is beautiful like the truth', i.e., *Mirjani koja je lepa kao istina*. Hence, I still believe in the importance of what Jimmy Stewart said in the movie Harvey, a movie that, on a side note, could be seen as a neat parallel of the co-creational thesis thanks to its dialogue between the main character and the rabbit living behind the veil of his primary experience: 'My Mother used to say to me that in this world I must be oh so smart or oh so pleasant. For years I was smart. I recommend pleasant. You may quote me'. And I do. For, I can hardly imagine a greater curse than being gifted with the power of intellect, but being devoid of enlightening emotions and walking through life with a heart parched and arid instead of watered with the rivers of love. It is the pervasion of the intellectual mind with this sea of heartwarming emotions that hides the key to the instigation of the grandest phase transition awaiting it in the course of its lifetime. This transition leads from the state of smartness to the state of wisdom and the reason why it is so incredibly difficult to achieve by intellectuals is because it involves the embracement of the 'less is more' philosophy and the sacrifice of rationalizations for the sake of giving birth to holy ignorance. For this reason, *priglop od dobrote*, that is, 'dumbed by goodness', is the Serbian phrase occasionally used to describe people who appear dumb and clueless solely because the incorruptible goodness of their hearts⁶⁴⁴. For deep down, as it appears, the smarter one gets, the less goodness one will be prone to harbor inside one's heart, which hints at yet another one of the balances of key importance for determining our destinies at their moral and spiritual levels.

Sheer smartness deprived of warmhearted aspirations does inevitably open many doors in life. But pure goodness, naïve and self-effacing, without any underlying desire to appear smart, stands millions of steps ahead. When we pave the garden of our spirit with starry wishes that all our actions in life be done for the sake of saving the planet and enlightening the minds of the earthlings on it, we need not worry about the apparent prosperity and dignity of our ways. With benevolent aspirations like these streaming within ourselves, Nature herself will open the doors for us, magically, at the right moments and the right places. Sincere goodness is thus untouchably superior to sole smartness. 'My aim is true'⁶⁴⁵, the words whispered by Elvis Costello to his private goddess of affectedness, will thus for a long time echoingly bounce back and forth with their waves of striking relevancy between the walls of pretense raised all through the modern world poisoned by the ills of hypocrisy that have put our spirits into comatose, semi-awake states. It may be true that Prince Myshkin ended up in a sanatorium, but such is the metaphor of the dialectical path of all creatures like him, journeying from thetic enthusiasm to antithetic crises and confusion, which the stay in the sanatorium may have symbolized, to synthetic emergence to blissful daylight once again. A similar message was conveyed by the plot of the Diary of Bridget Jones, where towards the end of the movie, a person dear to Bridget glimpses directly into her diary, symbolizing our heroine's letting him and possibly everyone else have a perfect insight into the

crystal clear pool of honest expressions of hers. Such an insight at first threatens to ruin their relationship, but then a strange twist of fate at the very end of the novel yields a triumph for the way of honesty and sincerity, leading us to believe that even Prince Myshkin would have left the sanatorium one day and begun to fruitfully live up to the ideal of 'saving the world'. Lost battles with the bitter aftertaste of disappointment would always lie ahead of us should we decide to follow the path of universal goodness, but if we were to learn how to overcome them we would eventually leave the idealistic solitude and start to shine with the fullness of our being to the world. And instead of only saying what we think or feel, erroneously believing that words are the ends of our lifesaving endeavors, we would begin to live our ideals and dreams while floating on the ocean of emotions and let the beauty of our being spontaneously 'save the world'.

One of the most striking insinuations of the fantasy about the Lord of the Rings and many other narratives in which the storyline revolves around the battles between good and evil is a seeming flawlessness of the forces of evil and the faith in immaculateness of their ways that trails them as they ride along. Opposing them are, however, the rippled streams of goodness, swaying back and forth with all their imperfections, insecurities and doubts in the rightness of their own role and strategy, reminding us that the reason why life holds supremacy over machines lies in its ingraining 'unreliable components that achieve reliable outcomes'⁶⁴⁶. Or, as Gandalf the Grey said in the filmed version of J. R. R. Tolkien's *Hobbit* to counteract the viewpoint of his fellow sorcerer Saruman, who had held that majestic powers, flawless and colossal, are what counts most in battles to save the Universe, 'Saruman believes it is only great power that can hold evil in check, but that is not what I have found. I found it is the small everyday deeds of ordinary folk that keep the darkness at bay: small acts of kindness and love'. 'Enjoy the lighter things in life and deeper joys will follow' was a concordant message inscribed on a fortune cookie I stuck to the back of my phone after opening it side by side with a fortuneless cookie, holding no message whatsoever, and trying to untangle its wisdom from the irony, thinking all the while, albeit distantly, about the TNT group, as conceived by Max Bunker, *i.e.*, the New York City spy agency housed in a flower shop and being composed of perhaps the least physically and mentally competent bunch on a mission for a good cause ever penned by a storyteller, taking the allusions of Tolkien's fantasy to a whole new level. Consequently, one could argue that the most favorable systems from the evolutionary point of view are not those wherein decisions are brought unanimously or autocratically, without much deliberation, but those which are torn apart by conflicts of opinions and in which dissident clashes of perspectives constantly arise as they move forward in time. Therefore, if our aim in life is to pursue the path of love and benevolence, we should give up on simple and straightforwardly applicable guiding principles and the desire to reach the spirit of perfect, practically robotized fortitude. Instead, we should be aware that only continuous balancing of opposing principles, including mighty determination and doubtful indeterminateness, should sustain us on this way.

Besides, to awaken Love, the most magnificent of all cosmic qualities, descending into the hidden rooms of our psyche where the phantoms of our fears dwell, befriending them and continuing to go on our way with them on our side is needed, lest we, paradoxically but true, never find it and remain akin to the lukewarmly pious souls to which Father Merddyn Gruffydd directed his sermon in Richard Llewellyn's *How Green Was My Valley*: 'Why do you come here? Why do you dress your hypocrisy in black and parade before your God on Sunday? From love? No. For you have shown that your hearts are too withered to receive the love of your Divine Father. I know why you have come - I have seen it in your faces Sunday after Sunday as I've stood here before you. Fear has brought you here. Horrible, superstitious fear. Fear of divine retribution - a bolt of fire from the skies. The vengeance of the Lord and the justice of God. But you have forgotten the love of Jesus. You disregard His sacrifice. Death, fear, flames, horror and black clothes. Hold your meeting then, but know if you do this in the name of

God and in the house of God, you blaspheme against Him and His Word'. Moreover, softness that these fears infuse our body and spirit with, making it flexibly wave in the worldly winds, is instrumental in creating out of ourselves a channel for the transmission of Love from some sublime planes of reality and onto souls surrounding us. To attempt to edify them with the frame of mind of a lion tamer, who would tell us that a fixed gaze and a firm stance must be installed inside because at the first glimpse of fear in us the lions will disobey and all will be in vain, is, in fact, to give up on the idea of our successful transmission of this sole greatest cosmic quality to another. In contrast, with our heart trembling, veins palpitating and pupils pulsating in mild stage fright, signifying sensitivity instead of insensate robustness, we approach Lao-Tzu's ideal of 'intelligent control that appears as uncontrol or freedom, thus being the genuine control'⁶⁴⁷ (Tao-Te-Ching 38), the one that spurs independence and truly empowers the human spirit, alongside enabling us to become a divine messenger saving many worlds with the starry signs we would thence spontaneously strew all around us while dancing dazzlingly through space and time, like the wavy letters in this billowy sentence or Ian Curtis' muse when she finally lost control⁶⁴⁸ and realized that there could never be a way back again, from the realm of incessant improvisation and search for novelty to the one of dull habit and tedious repetitiveness.

Thus, if our wish is to become a person of a truly triumphant spirit, we should not aim at winning all the battles in life. Instead, first and foremost, we should learn from those that we have lost. Of course, not in a self-conscious way whereby we would stumble on the obstacles left behind us, but through looking behind our shoulder with a bright smile shimmering underneath our breath, and with sincere optimism which enlightens all our falls and faults. In order to become strong and heroic, first we need to be weak and awkward, Lao-Tzu correspondingly noticed (Tao-Te-Ching 36). Hence, it is not a coincidence that the developers of one of the most popular multiplayer video games of the day, Defense of the Ancients a.k.a. Dota, created two roles for heroes in it, one of which are 'carries' and the other one of which are 'supports', with the former starting off as weak and vulnerable and only gradually gaining their powers that become crucial in 'carrying' their team to victory, as opposed to the latter exhibiting steadiness and a higher degree of functionality in their qualities, which, however, allow them only to provide 'support' to the carries. This is, in a way, saying that by passing through the stage of weakness on the way to attainment of supernatural strengths, we are given a chance to embody the combination of graceful sensitivity of a prayerful virgin on one side and stony willfulness and heroic bravery of a warrior of light on another. One such duality is already implicit in the zodiacal nature of my being, holding Dragon on its Oriental side and Virgo on the Western one, and is immortalized in Ivo Andrić's words about a true hero – 'vulnerable, yet immortal'⁶⁴⁹. This book could have, in fact, also opened with the following words: 'Once there was a boy, weak and passive in his body and spirit, only to become wholly different later in life'. As we are able to appreciate only differences as information, beautiful and inspiring thoughts can move only those who stay in the darkness and yet dream about divinity inside and outside of them. 'The bright type could never draw, could not describe night swimming'⁶⁵⁰, as verses of a beautiful R.E.M. song float through the air, subtly shaking the placid sea of Love below and the twinkle of the smiley stars of Wonder above.

Although we live in the era in which a strong trend of moving towards eradication of self-conscious attitudes is obvious, I invite you to recognize the charming grace present in that shy disposition to look back and tell apart one's own mistakes with blushful cuteness. Strivings of the westernized cultures to attain absolute freedom of behavior may easily find us one day badly wanting to go back to the chaste and deeply humane, mildly fearful self-awareness. In fact, without self-awareness permeating every aspect of our interpretations of the world, we would have regularly been falling into many traps in life. It is this essential feature of our minds that underlies the power of reflective thought, which, needless to add, is the grounds for all exhibitions of cautiousness and sanity in life. Not only

does the ability to reflect on past experiences distinguish us from the rest of the planetary species, but it also presents the driving force behind our creative inclination to incessantly enrich the face of the planet. This hesitant, doubtful and revisionary looking back is as important as our visionary determinateness and willful runs to pursue our dreams for the maintenance of a healthy and creatively potent personality. This is especially so when we remember that the dissemination of many, if not all, ill ideologies, including those tied to the building of supremacist nations⁶⁵¹, has been conditioned by the orchestration of collective amnesia regarding some aspects of the history, the research and remembrance of which through looking back inquisitively would have made the social systems implementing them far more prudent and benevolent to humanity and the biosphere.

In fact, whenever I travel between Europe and the United States I notice this striking difference, as if, culturally, the majority of Americans are inclined to worship and reinforce freedoms on the account of the neglect of humane insecurities, while most Europeans tend to exhibit insecurities to such an extreme degree that they often seriously constrain the creativity of their expressions. Whereas self-conscious behavior is often criticized as self-oriented, such critiques are all but grounded in truth. It would be, in fact, difficult to tell who epitomizes a more self-centered personality in this dichotomy. Would it be a self-aware person who becomes sloppy and awkward because essentially wanting to leave a nice impression and thus implicitly caring for both herself and others? Or it would be the one who is never curious to ask about the quality of one's own actions and thus exhibits a dose of implicit carelessness, although normally compensated by a larger variety of creative expressions. In the end, both the attitudes of caring too much and not carrying at all about what the others will say are extreme and fall off the harmonious pathway of Love.

It was while flying across the Atlantic, between the two continents and cultures, that I realized how the best and the most productive choice must be found along the middle Way. It may truly be the forgotten ideal of the land of Atlantis to find a way to reach the harmony between looking forward and looking back; between firm determination and soft insecurities; between the choice of freedom and the choice of bonding in veneration and respect. In the end, that is what the Way of Love teaches us. Having too much respect for others extinguishes healthy self-centeredness and makes us prone to become submissive to cravings and opinions of others, whereby the inner music of our emotions and thoughts slowly disappears. But much of immersion into ourselves, without ever trying to compassionately blend with the worldviews of others, stands for a similar deviation from the Way of Love. And the fact that it was flying across the Atlantic that inspired me to propose this parallel conceals another core attribute of the co-creational thesis. It is the one that says that verily everything arises from an inextricable dance between mind and Nature. Nature draws man in the same extent as the man draws Nature.

Invoking beauty in uncertainties, in being unsure and doubtful thus presents a beautiful challenge for the current generations on Earth. As Richard Feynman said, 'Western civilization, it seems to me, stands by two great heritages. One is the scientific spirit of adventure—the adventure into the unknown, an unknown that must be recognized as unknown in order to be explored... To summarize it: humility of the intellect. The other great heritage is Christian ethics—the basis of action on love, the brotherhood of all men, the value of the individual, the humility of the spirit...It was a struggle to be permitted to doubt, to be unsure. And I do not want us to forget the importance of the struggle and, by default, to let the thing fall away. I feel a responsibility as a scientist who knows the great value of a satisfactory philosophy of ignorance, and the progress made possible by such a philosophy, progress which is the fruit of freedom of thought. I feel a responsibility to proclaim the value of this freedom and to teach that doubt is not to be feared, but that it is to be welcomed as the possibility of a new potential for human beings. If you know that you are not sure, you have a chance to improve the situation. I want to demand this freedom for future generations'⁶⁵². This is to say that, should you ever find yourself sitting quietly in

the corner of life, pigeon-toed and slumped under the burden of insecurities, recollect the blessedness that this unsteady stance of yours entails. For, feeling wobbly and insecure, lost and directionless to the core, not knowing where to turn, has always represented a sign in my head that one is being dragged in a myriad of different directions by the mysterious force driving one to follow every single heart in one's vicinity. It is as if one's soul then sees the world as a giant starry sky in which every star is a heart it wishes to follow for the sake of helping it find a way. This, logically, makes the soul bedazzled by this view, as if drunk from the nectar of empathy poured into its chalice by gods and completely disoriented as such. And when one is innately preset to think and feel this way, how much more of a blessing it is compared to behaving like a clockwork and always knowing which way to turn, how to reach out to things and what to say to them. Although responding confidently to impressions of the world is something that those feeling meek and unsteady tend to look up to, for it often appears to them that every move of these secure souls is like a subtle turn of the flower of the spirit to face a sun illuminating one's insides, their reacting in definite and unambiguous manners all the time is, in fact, most of the time the result of their being guided by the drives to satisfy their own needs only, which is, of course, a diametrically opposite path from that of Love. And, as we see, the path of Love and, thus, insecurity is the one that all the angels on Earth quiescently follow, fearing to tread where fools rush in, as Alexander Pope imagined it three centuries ago⁶⁵³. Of course, as the Way of Love has implicitly suggested, having both this starry sky of hearts and the sun of divine guidance in us, merged to such an extent that the balance between the outward pull of empathy and the inward pull of spiritual introspection is established to a perfect proportion, is the key to awakening the radiant mind of a saint in us, able to heal and harmonize everything it touches. This is, of course, not even to mention that one treading this magical middle way is bound to be wobblier than anyone else. Thus, as in agreement with the excerpt from Dick Feynman's popular writing, being certain in uncertainties presents indeed a challenge that the current generations raised under the toxic levels of self-assurance must strive to attain in their thinking and behavior if they are to witness grandiose beauties emerge from their being in the world.

Beware, of course, of the hypocrisy intrinsic to this attitude of being certain that embracing uncertainties and nothing but uncertainties counts as the only proper way forward in our explorations of Nature. Namely, just like the pure anarchistic denouncement of any doctrines, lest it be hypocritical in its essence, implies the necessity of the rejection of this very same doctrine that argues against all other doctrines and thus allows for the adoption of any doctrine in the world, creating conditions for utmost tolerance and liberality, so do proclamations of the need to be uncertain about it all necessitate an uncertainty about this very uncertainty too, thus directly legitimizing a sense of certainty about anything in this life. Therefore, we are free to say that uncertainty can benefit our world only insofar as it is uncertain about uncertainties as well and, as such, neither fears accepting certainties every once in a while nor accusatorily looks at exhibitions of certainties elsewhere.

After all, the blend of order and entropy, lawfulness and chaos in each and every segment of our physical realities speaks in favor of the fact that only a fine balance between certainties and uncertainties can provide grounds for the right way of thinking. 'In order to draw a limit to thinking, we have to think both sides to this limit', said Ludwig Wittgenstein and the boundary that encircles human knowledge and constantly expands in the course of the evolution of our beings presents none but the line at which certainties and uncertainties, periodicity and randomness, order and chaos, sand and the sea meet. For, although we have been accustomed to see order as the only thing that matters in sustaining our worlds and enabling their continued evolution, chaos, entropy and randomness are essential in providing 'food' for the developing patterns of knowledge and physical order. Stars are born from the chaotic whirls of matter, as Friedrich Nietzsche once observed and cosmologists confirmed from many different angles.

Jazz music in this sense offers a nice example. With its improvisational character, it can be used as a metaphor to illustrate the importance of the balance between rigidity and flexibility, rhythmical limitations and unpredictable novelty. But classical jazz harmonies reflect the ideals of what is usually considered as the Western lifestyle: sweetness, cheerfulness and clarity. They lack an important aspect of dustiness, mystery, awe and fear, so typical for human experience. Without the latter, I believe it can never provide absolutely fulfilling harmonies to listeners in the long term. As I wrote in the introduction of my first musical web page, ‘celestial sounds that intertwine heavenly sadness and shining joy appear beautiful through the cultivated harmony between clarity, purity and grace on one side, and the sense of uncertainty, unsteadiness and wondering on the other’. Without the passionate and fearful care for others, there could be no enlightening and mountain-moving love in our hearts. It is for this reason that I dedicated my first book to all the careworn creatures of this world and yet drew the Sun, the symbol of joy, happiness and bright intellect, on its cover. The book of Gospels, likewise, depicted probably the greatest power of love ever witnessed on Earth, but placed it in the atmosphere of dark ignorance, fear and obsolescence. As if one without the other could not exist. ‘The fear of the Lord is the beginning of wisdom’ (Psalms 111:10, Job 28:28, Proverbs 1:7), ring around the words from the Bible.

And as we bathe in the semantic echo of these words that depict wisdom as a tree rooted in the soil of fear, we ought not to be tempted to assume that the imposition of fear onto another is a route to the awakening of wisdom in them. Although religions with narratives evoking fear in their readers are effective in subduing children to the will of their parents, the reason for which they could be called children’s stories before anything else, they have never been dear to my heart and only teachings that advocate unconditional love can deserve the attribute of godly in my universe, this scruffy, awfully messy universe wherein law and order are measured in teaspoons and freedom is nurtured like a newborn by a caring mother. It follows that not the drawing of the limits and setting our heart into confines of reason, but its opening to the infinity of possibilities, as unruly and disorderly as this can be, is what underlies the route to attaining the wisdom of angels and other celestial souls. For, not a heart closed by the rules and regulations and doctrines and dogmas, but an open heart is the heart whose skies are laden with stars, each of which twinkles with anxiety, launching us to the greatest existential vistas imaginable under this canopy of fallen spirits and trifled divinity.

When exact and perfect becomes confusing and imperfect

‘The kingdom of heaven is likened unto a man which sowed good seed in his field: But while men slept, his enemy came and sowed tares among the wheat, and went his way. But when the blade was sprung up, and brought forth fruit, then appeared the tares also. So the servants of the householder came and said unto him, Sir, didst not thou sow good seed in thy field? from whence then hath it tares? He said unto them, An enemy hath done this. The servants said unto him, Wilt thou then that we go and gather them up? But he said, Nay; lest while ye gather up the tares, ye root up also the wheat with them. Let both grow together until the harvest: and in the time of harvest I will say to the reapers, Gather ye together first the tares, and bind them in bundles to burn them: but gather the wheat into my barn’

Matthew 13:24-30

Most of my previous writings embedded the trend of starting with straightforward assertions, followed by intricate and complicated sentences with a multilayered semantic character (intending to

reflect the metaphoric talk of Nature, herself), but only to once again return to simple expressions at their very ends. The idea was to depict the nature of the development of human knowledge that starts and ends with simple ideas and conclusions, as described in a Zen story in which 'mountains used to be mountains and rivers used to be rivers before the study of Zen took place; they ceased to be mountains and rivers when the study of Zen took hold; and they returned to be mountains and rivers once the study of Zen came to an end'. Nevertheless, I still believe that it takes a rare mastery to convey remarkable meanings and exciting thoughts in simple and modest ways. However, to do so, it is necessary to adopt imperfections in every aspect of one's expressions. 'Trifles make perfection and perfection is no trifle', Michelangelo suggested, whereas 'the more thoroughly you describe, the more you will confuse', was a thought of another Renaissance master, Leonardo da Vinci. Jean-Luc Godard, credited for the 'don't show every aspect of things; allow yourself the margin of indefiniteness'⁶⁵⁴ precept, is yet another artist who must have been aware of the liberation from the shackles of ostensible perfectness and the unleashing of infinitely potent creative powers resulting from the renouncement of the strivings to reach absolute exactness in expression. Thus, certain things ought to be left untouched and unexplained, lest the true excitement on part of the recipient of the message turn out to be vacated.

To illustrate how the intentions to maximize accuracy can arrive at the cost of diminished clarity, I will refer to the following example. Namely, some time ago I bumped into an old friend in the street. We engaged in a casual conversation and at one moment he remarked that he was not interested in men. Though I immediately understood what he meant by that, I felt as if this proclamation of his heterosexual nature was not stated in a very exact manner. For, saying that one is not interested in men cannot be accepted as a very smart literal assertion from a male person, as it would imply that one is not interested in his very own nature. So, wanting to say something funny and smart, I replied saying, 'I am rather not interested in men that are interested in men'. Of course, I wanted to say that I am curious to learn about the nature of man, but what I should rather not inquire about is the nature of males that are specifically interested in males. My friend found it funny indeed, but, eventually, when we both realized the reason why I expounded this assertion, we agreed that it is not perfect either. Hence, we came to the idea that saying that 'I am not interested in men that are interested in men that are interested in men' would present a much more exact way of saying what I exactly wanted to say. However, this might be way too complicated for an ordinary person to understand straight away. Hence, here we see how sometimes the more one tends to make one's expressions perfectly exact, the more confusing one can easily become. It is the balance between clarity and exactness that ought to be achieved. This example shows us how we should always be prepared to give up on reaching the ideals of perfect exactness in an ordinary communication and take on the imperfect way of saying what we want to say, while being guided by the drive to make the point across first and foremost and, as such, resting exactly on the way between us as the communicator of the message and another person as its absorber, all in accordance with the Way of Love. For, should we shift too much onto our side, there is a chance that our ideas will be proclaimed in very self-satisfying ways and yet would be unintelligible to others, while should we shift too much onto the side of another, there is a chance that we would lose touch with our sane ability to convert thoughts into linguistic constructs and appear equally confusing and unintelligible at the end of the day. However, by such trustful following the line of imperfection, be standing neither here nor there, but straight in the middle, where the chances of falling are the highest and where there is nothing to be leaned on except the tiny string of the Way of Love, the essential points of our ideas will always miraculously reach the persons that we communicate with.

You might have talked about the weather before such talks grew old and started seeming vacant and squandering to you. Then, you began to seek the light of sacramental semantics and heavenly freedom throughout the moments of murky doubtfulness, having convinced yourself that simple talk was

for simple people. And then, one day, after the enlightenment was reached, you recognized the simple beauty of small talk, be it about weather or about Sunday football fixtures, which, remember, is always ultimately a talk about the replies Nature chose to give to our deepest wishes and aspirations. In the end, it is one such simple talk about the weather that may wonderingly turn our gazes towards the great heights above and make us glimpse profound secrets that govern the celestial orbits of Heaven.

Strokes of imperfection are necessary to make things in and around us truly perfect. For, should we take a closer look at any element of life, we might notice that the balance between order and chaos, between symmetry and asymmetry, between firmness and flexibility thoroughly pervades it. The hypothetical state of zero entropy, in which all of the system components would occupy perfectly ordered positions in space and in which no freedom of movement would exist, would be a state from which no further evolution could be imagined. Thermodynamic states that offer optimal conditions for progress are, thus, typified with optimal entropy as well. This is why when a perfectly ordered and symmetrical garden was shown to a Zen master, he allegedly took a full basket of dry leaves and threw them all over the place, noticing how 'only now it looks fine'. The Japanese art of Ikebana implements the skill of balancing symmetry, order and well-crafted composition with an equal amount of intuitively distributed chaotic and asymmetric patterns. A less familiar Japanese art, a.k.a. Kintsugi, is about broken pottery joinery where the cracks along which the fracture occurred, symbolic of imperfections, are pronounced in usually golden nuances rather than disguised and hidden from view. Finally, most theologians go a long way to prove that there could be no justification for including the Song of Songs in the Bible, although from this particular perspective one might argue that one such imperfection was needed to endow this religious masterpiece with a glow of true perfection.

There is a Hasidic story that tells us about Moses' ascending to Heaven to help God write the sacred scriptures. When Moses arrived there, he was assigned the task of ornamenting the letters of the book of Torah with crowns. After a while, the Egyptian prophet became really tired of performing this relatively tedious and unimaginative task. And so he went on to ask God why his job was so modest and seemingly trivial. The answer was that in hundred generations from that moment on a man named Akiwa would study their meaning. To make the things clearer, God eventually took Moses to one of Akiwa's classes from the future. During the class, a scholar rose up and asked Akiwa why those ornaments had been drawn exactly the way they looked. To which Akiwa merely replied, 'I do not know'.

Another story tells of Bernard Maybeck's decoration of the interior of his architectural masterpiece and a mishmash of influences, from the Byzantine to the Romanesque to the Gothic to the Japanese to the modernly minimalist, the First Church of Christ, Scientist in Berkeley roughly a century ago. Interestingly, the architect wholly rejected the classical, vertically elongated structural style suggestive of soaring toward celestial spheres of being in favor of the horizontally expansive element, quite in agreement with Frank Lloyd Wright's vision, wishing to accentuate human bonds, communal values of the church and reaching out to another before being raised to the heavens. In such a way, he, quite likely, wanted to circumvent the domiciliation of 'pre-Vatican II priests, who kept their back at the congregation while chanting in Latin', whom John Updike compared to 'the modern writer' losing relevance in the modern world, 'perceiving that his reach is not wide, but hopes that it is high'⁶⁵⁵. Now, although the architect had a whole different idea on how to proceed with the decoration of the pulpit, he became so impressed by the cracks on its concrete surface that his eyes began to mesmerizingly follow them. Immediately he picked up a paint and a brush and turned these lines of imperfection into an imposing flowery ornament⁶⁵⁶. As per morale of this story, does it mean that our creations striving for perfection must equally begin from the recognition of beauty in the lines of imperfection that abound all around us? Also, should lines leading toward horizons of heavenliness always be drawn starting from

these rifts in the lute? If so, does it mean that avoiding the latter in broad circles will simply accelerate our downfall toward ever deeper spiritual blemishes in this missionary reality wherein only descends into hells open the ways toward heavens?

Every natural detail is filled with miraculous sources of unending amazement and wonder. As was written in the Book of Qur'an, 'Thou canst see no fault in the Almighty One's creation; then look again. Canst thou see any rifts? Then look again and yet again. Thy sight will return unto thee astonished and dazzled' (Al-Mulk(67):3-4). And, in fact, the more we know and the more we edify the structures of our knowledge, the more space will there be to wonder over the miraculous and enchanting nature of life and being. 'If there is one lesson more than any other taught by the methods of the physical sciences, it is the strict correlativity of fact and ideas'⁶⁵⁷, John Dewey pointed out once, reminding us that the more bricks of facts incorporated in the scientific steeple from the peak of which we view reality, the more ideas we would naturally glimpse. Science and knowledge can thus be said to be akin to building a tower whose height is directly proportional to the breadth of amazing views that it offers.

But as usual, the most inspiring metaphor of this interlacement of known and unknown takes us back to Isaac Newton's famous comparison of the quest for new knowledge with a boy playing with the sand and seashells along a seacoast: 'I do not know what I may appear to the world, but to myself I seem to have been only like a boy playing on the seashore, and diverting myself in now and then finding a smoother pebble or a prettier shell than ordinary, whilst the great ocean of truth lay all undiscovered before me'⁶⁵⁸. And indeed, the more we walk along the coastline of the firmly impressed knowledge, curious to strengthen and fortify the basic premises and frameworks of thought in which new ideas find their meanings, the more of the sea of infinite wonder will open up in front of us. But also, if we become impressed by the charms of the mysterious sea of unknown and start running along the coastline to witness the diversity of its wavy crashing against the coast, we would inevitably learn something about these firm boundaries of human knowledge. Thus, the more we know, the more of the exciting wonder will be awakened in us by mere watching of the ordinary details of the world around us. In view of that, someone has said that human knowledge is similar to an island which, as it grows over time, expands its coasts too, that is, the regions of pure wonder, those where the solid and affirmed knowledge and the sea of the mystical and yet to be discovered meet. Clearly, the more we know, the more things are there that excite our curiosity and wonder. 'The more thou searchest, the more thou shalt marvel... Lo, this hast thou done unto me, in that thou searchest out the ways of the Highest' (Ezra 4:26...12:4), as the Biblical words claim. And yet, I have always imagined wondrous travelers standing on the crossroad where one sign points at the seashore of 'unanswered questions', whereas the other sign points to the inland where 'unquestioned answers' lie. And no doubt that for the island of human knowledge to successfully thrive, creative powers need to be sent out to both directions.

However, not only is the world itself filled with inexhaustible sources of wonder. Sometimes, in spite of the fact that, as per the tenets of the co-creational thesis, we, the subject, are involved in co-creation of every perceived detail of the world, neither do we understand the meaning and the message of the fine lines and letters drawn by our own creativity, regardless of the domain in which it expresses itself. Because when our mind sets itself into a perfect creative balance, it becomes permeated with a synchrony between the conceptual and the intuitive. The reason and the spontaneity, the logic and the instinct are, thus, blended so well that even when our works shine with the preconceived results, exactly the way we had imagined and wanted them to look like, they also comprise surprisingly rich subtle meanings that reveal some secret reflections of the intentional essence of our attitude in the creative process.

The importance of the balance between 'perfect' order and 'imperfect' spontaneity may be illustrated with an example from the domain of human lecturing. Namely, when one's lecture turns into a

perfect recital that has lost any natural hesitations, openly expressed doubts and spontaneous settings of the dynamics of the voice in its melodic enfolding around the members of the audience, the talk can easily induce a loss of attention and intellectual boredom. Professional speakers are quite aware of this, and when they realize that a person that they talk to is gradually losing attention, they may consciously make a 'mistake', thus initiating a sort of subtle 'wake up' impulse. Talks that balance preservation of the flow of ideas with spontaneous diversions thereafter thus present the most enchanting lectures. Albeit having his speeches written out completely and thoroughly polished, Ralph Waldo Emerson mimicked hesitation and made deliberately long pauses⁶⁵⁹ - indicative of a considerable effort and difficulty in catching and holding on to the fleeting ideas - before and after the delivery of striking epigrams, all so as to keep the audience grasped in the web of excitement and prevent his falling off into the chasms of dull monotony. To succeed in this aim of achieving inspiring orations, as we see, anything preconceived in advance has to be complemented with an equal dose of spontaneity. After all, as it was said in the Gospels, 'When they bring you unto the synagogues, and unto magistrates, and powers, take ye no thought how or what thing ye shall answer, or what ye shall say: For the Holy Ghost shall teach you in the same hour what ye ought to say' (Luke 12:11-12). Abe Lincoln insinuated the same point when he wrote that 'I claim not to have controlled events, but confess plainly that events have controlled me'⁶⁶⁰, the events that, as ever, 'only happen once'⁶⁶¹. Or, as bell hooks put it more recently, 'to teach in varied communities not only our paradigms must shift but also the way we think, write, speak; the engaged voice must never be fixed and absolute but always changing, always evolving in dialogue with a world beyond itself'⁶⁶². To renounce prefabricated plans and embrace uncertainties born by being reborn all the way through, from the deepest foundations to the most sublime expressions of our beings, that is, from their roots to their wings, so to speak, with every moment of our existence is thus a prerequisite for becoming a spirit that strews the flowery stardust of celestial grace onto the world around us.

As already mentioned, the whole life as we see it is a living proof that unreliable components can interactively give rise to reliable patterns of development and evolution⁶⁶³. Every single cell within an organism is unique in its structural organization and epigenetic activity, despite the fact that all cells within the organism have identical genomes. Both the pathways of genetic expression and biomolecular recognition processes are subject to inherent mistakes. As for the latter, had there not been random scanning of multiple possible structural fits between host and guest molecules, most of which result in failure, the perfect match would never be found. As for the former, if genetic mutations and replication errors lead in the direction of preventing the system from viable expression, they tend to become corrected, but if they open the door for the evolution of life towards the states of higher complexity, as the classical neo-Darwinian view of the biological evolution points out, they tend to be amplified through the further genetic replication. Also, notice how a large percentage of DNA is still oftentimes considered as 'junk' genetic sequences, the meaning of which was lost in the course of the evolution and the role of which is regarded as literally parasitic. But these genetic patterns that do not encode protein sequences are increasingly gaining attention and significance in the framework of modern molecular biology. Their role in patterning the epigenetic communicational networks is being increasingly referred to. Nevertheless, evolution of the complexity of life has been precisely reflected in the growth in the percentage of these 'useless' parts of DNA compared to its protein-encoding sequences known as exons. In humans, introns, the non-coding DNA segments that separate individual exons, are longer than those in other biological species that have been sequenced so far. Most exons contain less than 200 base pairs, while 10% of introns are more than 11,000 base pairs in length⁶⁶⁴. In every single gene the percentage of introns greatly surpasses that occupied by exons. Humans are, in that sense, nowadays without any precedence in the biological world, having only 3 % of its DNA belonging to the protein-encoding function and 97 % belonging to the rest.

Furthermore, it is known that the biological evolution is crucially dependent on the opportunity to co-evolve with other species. Depriving living creatures of the chance to compete and, so to say, 'fight' against the malign and invading agents can lead to their prompt deterioration. For example, constant attacks of microorganisms on our integrity are largely responsible for the evolution and lifetime reinforcement of our immune systems. In a perfectly sanitary world, our immune systems would tend to collapse. Numerous examples of favorable effects of toxins when delivered in small doses may be found in the literature under the term used to describe this effect: hormesis. People developing resistance to snakebites after regularly being bitten by serpents and mice becoming more resistant to γ -rays after being previously exposed to smaller doses of radiation are some of the examples. The hygiene hypothesis, in fact, states that a lack of exposure to infectious agents during childhood increases susceptibility to allergies. Many parts of our body could be weakened by an excessive hygiene, such as the ear canal, for example. Our whole bodies are also symbiotic in their nature, hosting innumerable sorts of bacteria that are normally not only harmless, but useful. The ones in our mouth present the first shield against the entrance of pathological microorganisms, whereas the ones in our stomach are helping us digest the food.

If we look carefully into tiny and seemingly meaningless grains of sand, we could once again see something extraordinarily exciting. We could remind ourselves of a few more beautiful metaphors that a grain of sand carries. Firstly, when it becomes entrapped inside a shelled mollusk, it forms an irritating foreign body, sometimes causing the host organism to shield itself by crystallizing precious nacre layers around it, thereby gradually forming a pearl.

But the same tiny grain of sand is also subject to drastic changes in intrinsic potentials and value when one systematically introduces impurities to it. Namely, pure quartz is known to be one of the dullest materials imaginable, even though it is used for a number of high-tech applications, one of them being the mechanical measurement and sensory devices and another one being the audio equipment. Namely, whereas the pickups of early gramophones were made of quartz due to its stability, the ones of modern microphones and guitars are made of it due to its piezoelectric properties, shedding light on the relevancy of grains of sand to music from a whole new angle. Yet, intrinsically dull, especially from electromagnetic and crystallographic standpoints in comparison with most other ceramics, once you provide it with specific impurities in as little as one part per billion of its weight, the situation suddenly changes. Remember, this is the same concentration of impurities as that hypothetically created by dropping six of seven extraordinary people on planet Earth and all of a sudden changing its course from that symbolized by a sandy beach, lifeless, dry, desert-like and monotonous, to that pervaded by computers and electronic gadgets on every corner, bedazzling and electrifying, elevating human senses to more enlightening vistas. Such a material, even though possessing an extraordinary minute amount of impurities, can now be used for a variety of semiconducting and optical applications. For example, in its nascent, silica form, the material has been used with success as a broadband multimode optical fiber after being doped with nitrogen, germanium, aluminum or chlorine, whereas in its processed, silicon form, it has been used as a semiconductor in virtually every electronic application after being doped with electron acceptors such as boron, gallium or nitrogen or with electron donors such as phosphorus, antimony or arsenic. Conventional solar cells are, further, composed of, essentially, impure sand, albeit deoxygenated and processed into a functional microstructure. And the fact that this renewable energy source of the future is founded on the interaction between what is up and what is down, that is, between the Sun and the grains of sand, draws in front of us an ever more beautiful metaphor. The fact that seashores as probably the most inspiring landscapes on our planet are often filled with millions of tiny grains of sand, whereby each one of them is endowed with the potential to transform the energy of sunrays into electricity, is speechlessly astonishing. It is hard to find a more striking and pragmatic

metaphor of how devotedly looking down leads us to see the immensely large, the whole Sun, in every small grain of sand.

Now, as a bone researcher, I have always wondered how come silicon as an atom has come to possess such an enormous potential to promote the bone healing and growth when implanted in the body. Bioactive glasses are routinely used to repair the hard tissues in humans, and silicon is even being added to scaffolds based on calcium phosphates which naturally present the ingredients of bone and teeth. Although hypotheses are many, I usually have my own vision. It is the one closely related to the already mentioned idea that life had originated where waves of the ancient oceans crashed over the mineral coasts. The same idea will be elaborated a little bit more in the following passages. For now, it is enough to recall that these very coasts comprised mostly sand, i.e., silicon dioxide, and only then calcium and phosphate ions, and that in significantly lesser quantities. Could have it been possible that these primordial grains of sand served as templates for the formation of first organic molecules on Earth and their multiplication into organized biological structures? The idea is crazy, but the craziest ideas in science are usually those that become accepted as reigning and truthful with the passage of time. Instead of incorporating themselves into the very biological structures that would go on from there and live the life of their own, silicon atoms may have given that role to carbon atoms, the two of which possess a high similarity in the bonding potentials and are often considered as the only possible candidates for the atomic backbones of life on any planet of the Universe. Could it be that silicon promotes bone formation because it had given an essential impetus to the arising of life, billions of years ago, on the coasts of some ancient seas? Could it be staying still in the shadow of the suns of human attention, quietly smiling at its creativeness and waiting for the future researchers to discover some new suns in it, similar to those it had given rise to? Could it be that the creatures and things crucial for the progress of life remain hidden in the shadow of the colorful display of charms of life? Is it because the essential sources of the beauty of being reside in small and neglected details of the reality that Nature invites us through the roads of scientific exploration to focus on them, and rewards us most when we find grand and wonderful meanings in these little things in life?

So many wonderful questions that do not even graze the surface of the essential beauty that lies dormant in tiny grains of sand. Another metaphor relevant to the present discourse can be found in the way in which the potential of impure quartz to act as a solar cell was discovered. Namely, one of the scientists involved in the research of silicon-based semiconductors at Bell laboratories accidentally left a sample of silicon doped with impurities in the sun. What a surprise it was when he noticed an electric signal coming out of the detector that the sample was connected to. Hence, like countless other scientific inventions and discoveries before and after, including sulfonamides and penicillin, polio vaccine, polytetrafluoroethylene a.k.a. Teflon, polyanilines as the first electrically conductive polymers, cyclamates as artificial sweeteners, quinolones as antibacterial drugs⁶⁶⁵, cisplatin as a widely used chemotherapeutic drug, mauveine as the first synthetic aniline dye and Béchamp reduction as the method for its large-scale manufacture, hexacyanoferrate a.k.a. Prussian Blue, Velcro, nylon, molecular chirality⁶⁶⁶, X-rays, the ability of microwaves to effectively heat water molecules, Big Bang and many others⁶⁶⁷, the first solar cell was also discovered somewhat serendipitously. Remember that it had to take World War II and Allied aviators with pieces of poly(methyl methacrylate) from the shattered gunnery turrets lastingly settled in their eyeballs before it was realized that some materials need not provoke an immune response and could be safely implanted in the body⁶⁶⁸. To this very day this epitomizes the accidental nature of causes of some of the most important scientific discoveries. As a result, research with a predetermined path and goal is only seldom predestined for success, despite the fact that this predetermination is exactly what is requested from scientists to justify the funding of their research. Still, as we see, the quest for the discovery of something in the best case scenario results in an equally

worthwhile discovery of something else. One example comes from sildenafil citrate, a.k.a. Viagra, which had been conceived of as a hypertension-relieving drug, but failed in that and was only later associated with the side effects for which it is currently demanded. In contrast, JQ1, a bromodomain inhibitor drug with potent anticancer properties, currently tested both in my lab and in broader clinical trials as a potential chemotherapeutic, was originally developed as a male contraceptive. Then, after 80 % of patients with glaucoma had unexpectedly experienced significant growth and thickening of eyelashes upon applying bimatoprost, a drug used to treat glaucoma, the FDA decided to approve the drug as a pharmaceutical product for eyelash growth⁶⁶⁹. A similar instance has occurred in late 2014, when a group of researchers from Madrid tested an anti-inflammatory drug developed as a potential chemotherapeutic medication and realized that it acts as a powerful hair follicle growth stimulant, the reason for which it might soon be used as a cure for baldness, not cancer⁶⁷⁰. Four years later, a group from Manchester tested the immunosuppressant drug Cyclosporin A for an effect against osteoporosis and realized that the drug can actually be a more effective promoter of hair growth⁶⁷¹. The abovementioned cyclamates were similarly studied as a potential antipyretic when the taste buds of a curious researcher came to a contact with it and signaled exceptional sweetness to his brain, which became the beginnings of its consideration and subsequent usage as an artificial sweetening agent⁶⁷². Then, that insulin-like growth factor-1 (IGF-1) can act as a growth hormone was discovered after intraperitoneally administering pituitary extracts to rodents in a study aimed to fix their disrupted estrous cycle and unexpectedly noticing accelerated growth of the animals^{673,674}. Also, mebendazole, a drug used to treat pinworm infections, has been recently shown more effective in slowing down the growth of low-grade gliomas than vincristine, the most common drug of choice for alleviating this ailment⁶⁷⁵. Terazosin, a drug originally used in the treatment of enlarged prostates, has, likewise, been shown to be capable of delaying or even preventing the onset of Parkinson's disease among elderly⁶⁷⁶, while an anti-HIV drug is now, after 20 years of use and a series of follow-up metastudies, known to prevent blindness caused by age-related macular degeneration⁶⁷⁷. In fact, most drugs sold today by the pharmacists to alleviate and prevent migraines were intended to be cures for different ailments: β -adrenergic blocking agents, such as propranolol, for angina, calcium channel blockers for cardiovascular disease, amitriptyline for depression, topiramate for epilepsy, the mixture of sodium valproate and valproic acid for convulsion and mania, and so forth⁶⁷⁸. In fact, in view of the approaching patent expiration dates for most blockbuster drugs and the increasing failure of drugs in the late stages of development, yielding a consistently dropping drug approval rate, pharmaceutical companies in search of cost-saving business models are expected to increasingly resort to repurposing of drugs already approved for therapeutic applications other than the intended. This rapid increase in the number of repurposed drugs does not only demonstrate the nil rational design capabilities that pharmaceutical science holds in its hands today, but it also reiterates how huge of financial obstacles stand in the way of developing new drugs, thus reinstating the fact that pharmaceutical science is, before all, founded on financial interests rather than on sound science or true humanitarian aspirations. A topic this is, however, to be elaborated more thoroughly on another occasion.

Meanwhile, there are countless more reports on serendipitous discoveries in science adorning the literature. The use of adenosine deaminase (ADA) in enzyme replacement therapies for severe combined immunodeficiency (SCID) syndrome also has a history in serendipity; namely, because of her expertise in the use of isoenzymes of ADA as genetic markers, Eloise Giblett was requested in 1972 by certain primary care physicians to search for a suitable histocompatible bone marrow donor, but to her surprise realized that the patient's hemolysate showed no detectable presence of ADA, and when the same absence was seen in another child with the symptoms of SCID, the findings were published⁶⁷⁹, becoming the first report on the link between enzyme deficiency and a defect in the immune system⁶⁸⁰.

Similarly, guided somewhat on the wings of the spirit of unusualness and peculiarity pervasive in the hippie era, brewing in the late 1960s and the 1970s just a few blocks down the Parnassus Hill where the main campus of UCSF was located, Herbert Boyer and his colleagues isolated the restriction enzyme EcoRI from a strain of *E. coli* found in the bladder of one patient only, never to be detected again, and went on to use it to cleave bacterial DNA strands and produce the first recombinant proteins, including insulin, by cloning⁶⁸¹. Then, when Bob Langer and his colleagues isolated two hundred rabbit eyeballs to test for the inhibition of angiogenesis, that is, blood vessel formation, only in a single eye did they notice the intended effect⁶⁸², an effect that set grounds for the development of a new generation of anticancer drugs, thus confirming the oft-forgotten rule that although data points agreeing with a model bring most joy to a scientist, it is the outliers, albeit frustrating the scientist, that conceal the route to the greatest discoveries conceivable. Likewise, measuring high levels of expression of MDR1, a gene encoding for P-glycoprotein, a cellular pump that protects the cells from toxins by excreting them into the extracellular space, in a single patient, a four-month old infant unresponsive to an antiepileptic drug led researchers to hypothesize that drug resistance can be conditioned by cellular transporters, thus giving birth to an important subfield of pharmacogenomics and personalized medicine⁶⁸³. That single events deviating from the common trend need not be treated as outliers, but as potential starting points for groundbreaking discoveries is also illustrated by Edward Jenner's successful work on the world's first vaccine; namely, the paper which he self-published in 1798, after being rejected by the Royal Society, contained 23 case reports, but only one of them, involving the inoculation of eight-year-old James Phipps with a sample from a cowpox lesion on the hand of a milkmaid, Sarah Nelmes and his complete resistance to subsequent smallpox variolation, directly confirmed the immunizing effect of cowpox vaccination⁶⁸⁴. This and similar discoveries emerging not from statistically confident samples of data, but from single events departing from the trend, which could have easily been discarded as outliers had they fallen in the hands of less scrupulous scientists, have instructed medical science of the value found in single medical cases, which are nowadays regularly reported in the literature, supplying it with a taint of wisdom compared to the heavily statistics-reliant methodology used in its cousin of biological sciences. Finally, although every schoolboy knows that Alexander Fleming unexpectedly discovered the antibacterial effect of a substance secreted by mold, nowadays known as penicillin, upon his return from a long vacation, rarely anyone knows that he found the inhibition zone on a single bacterial agar plate; though in the dusty lab of his, most bacteriologists would have discarded this single plate as the common effect of one bacterium interfering with the growth of another, Fleming isolated the mold he detected on it and from it produced penicillin, a potent antibiotic against staphylococcal and streptococcal infections, a compound that was only a decade later extracted and produced for clinical use by Howard Florey and his team at Oxford University⁶⁸⁵. An even more obscure and amusing historic fact in favor of 'one and only'- or 'only the lonely'⁶⁸⁶, as Molly Nilsson would have phrased it - rather than homogenous ensembles and happy collectives is that this original strain of mold provided by Fleming, *Penicillium notatum*, could not produce a desirable yield, owing to which the entire penicillin supply of the US was needed to treat one patient by 1941 and ten by 1942, a decade and a half after Fleming's discovery. But then in the summer of 1943, Mary Hunt, a lab technician from Florey's team, based in the Northern Regional Research Laboratory in Peoria, Illinois at the time, brought one moldy cantaloupe from the farmer's market to the lab and this single piece of fruit proved to contain the best strain for the mass production of penicillin, *Penicillium chrysogenum*, thanks to which hundreds of billions of penicillin units were in supply by the end of World War II. In fact, were we to look deeper into the nature of evolution of microorganisms that antibiotics have been designed to tackle, we would clearly see that the same principle applies here as well, predisposing outliers and small, selected populations to be the starting points of the evolution, including, most critically, that imparting the antibiotic resistance to the

microorganisms in question. Correspondingly, 1 % or less of a bacterial population that survives a treatment is where the resistant traits to the given treatment evolve⁶⁸⁷, meaning that if we were to discard this minor population as a statistical error, we would never be able to trace the evolutionary path in this or any other biological system. This is where the biblical story about the good shepherd venturing out to find a single sheep that got lost while leaving ninety-nine of them that never left the safety of their pens behind (Luke 15:3-7) comes handy, for it reminds us that single, solitary events and ideas must be delved into in search of clues for breakthroughs in every branch of science and life alike. As it is seen in every walk of life, not sheepish processions of paradigm followers, but single acts, unique in space and time, disconnected from the mainstream and largely deviating from the mean and the median, are those that provide sparks for the evolution of the natural systems toward states of greater sublimity.

In the context of this brief invocation of research in pharmaceutical sciences and failure that valuing many over one brings about, it does not hurt to mention how drug discovery has traditionally relied on statistical methods to prove the effectiveness and the safety of pharmaceuticals. At the same time, the drug dose ranges are defined to be safe and effective for the majority of individuals enrolled in clinical tests. Finally, the regulatory approvals are conditioned upon the average therapeutic efficacy, hoping to minimize the variations in the patient response. All these three effects combined have contributed to the fact that drugs are developed for mass, not individual use, creating illusion that everybody can be successfully treated with an identical therapeutic impetus. For, patients put on the same therapy will have always displayed different responses and the number of reported and verified genetic variations, affecting both the pharmacokinetic and the pharmacodynamic fates of the drug in the body, as in the case of cytochrome P450 enzymes that metabolize countless drugs and that hugely vary in expression across the human population, has multiplied over the years, highlighting the need for more individual drug design approaches, such as those stemming from the field of pharmacogenetics. As of today, they are hoped to bridge this chasm between individualism and collectivism in the realm of pharmacy and wash away the voices of the major pharmaceutical company executives stating that they wish to have no part in the development of individualized medicines because they would hamper their efforts to launch drugs destined to have blockbuster sales⁶⁸⁸ into the deepest oblivion. Whichever the way for the future of drug discovery and development, most pharmacologists and drug developers would agree that the transition from the serendipitous to the so-called rational or programmatic approach to the discovery of novel drugs has coincided with a greatly diminished output of new pharmaceuticals on the market. The discovery of most other chemicals in contemporary usage is, in fact, owed to relentless and serendipitous trial-and-error methodology rather than to well-planned assault on particular research targets⁶⁸⁹. The role of serendipity, which as a word (in 2000 voted the most favorite one in Great Britain) has its roots in the ancient Persian story about the three princes of Serendip, who were ‘always making discoveries, by accidents and sagacity, of things they were not in quest of’⁶⁹⁰, is nowadays still not fully acknowledged among the major funders of research proposals, even though at the recent celebration of the bicentennial of the US Patent Office it was concluded that the aphorism ‘necessity is the mother of invention’ is, in fact, wrong and the reverse should be considered as a more truthful statement, since only after inventions become accustomed in a society do they become necessities. As pointed out by the Nobel Laureate, Arthur Kornberg, ‘Discoveries are commonly serendipitous. The best plan over many decades has been no plan’. Moreover, he then went on to claim that ‘medical research is still more a game of pool than billiards; you score points regardless of which pocket the ball goes into’, quoting the example of Harold Varmus who received the Nobel Prize in 1989 together with Michael Bishop for their studies on breast cancer, despite the fact that ‘actually, Varmus’ studies yielded no insights into human breast cancer, but they did provide an important advance in understanding brain development. At the same time, a research program headed by Robert Weinberg at MIT, directed toward a rat brain tumor,

did make a major contribution to understanding human breast cancer. Of the several genes now known to be involved in human breast cancer, all but one were discovered by researchers working on something other than breast cancer⁶⁹¹. This brings to mind the brand new discovery of a drug normally prescribed to alleviate the symptoms of a type of skin cancer as extraordinarily effective in healing the brain struck by Alzheimer's disease⁶⁹². And that deviations from our expectations mark milestones during our research voyages, presenting turning points from which a path surely leads to the discovery of something great, can also be exemplified by the life story of Shinya Yamanaka, a 2012 Nobel Laureate, who was admitted to the Gladstone Institute of Cardiovascular Disease in San Francisco in the 1990s after he had unsuccessfully applied to a dozen of biomedical research centers all over the US. There, a stone's throw away from the lab bench on which I worked on creating a new generation of materials for bone regeneration for three years, he, a postdoctoral researcher then, like myself, went on to develop a drug for lowering blood cholesterol. On a side note, not only did the two of us have the life of postdoctoral scholars on the UCSF campuses in common, but we also shared a fascination with cholesterol, that phenomenal molecule that is often repelled by the popular press as some sort of necessarily evil, when in reality it is a fascinating pleiotropic unit with a number of extraordinary roles in the body, from that of a vitamin and sex hormone precursor to the nerve impulse propagation regulator in myelin sheaths to the membrane fluidity regulator to the second messenger, without any of which we would not be here today. I often bring to mind that the unusual property of the flowers *Ramonda serbica* to fully 'resurrect' themselves with a few drops of water after being dried and shriveled for months or even years sometimes is in part thanks to the very high concentration of cholesterol in their cell membranes⁶⁹³, which preserves their flexibility and allows the cell to shrink in size due to dehydration, but without affecting the integrity of the membrane and causing cytosol leakage. With this flower and cholesterol in it in mind, I then usually proceed to wonder how vile the world is, when the most those denounced as the vilest by it are, as a rule, those in whose hearts the keys to the resurrection of humanity lie hidden. This brings me over to the realization that even the world, which I have just denounced as vile, must have something blessed in itself and is the unescapable path to our own resurrection and redemption, the thought with which, as ever, I make a full circle, shatter the grounds of my own premises and find myself levitating high above any verbal argumentation, free from it all, immersed in the stars nested above my head and ready to jump into the pool of love that every human heart is. Be that as it may, soon after Shinya's discovery of the drug, he learned that it does not only lower blood cholesterol, but also causes liver cancer. But instead on giving up on science at that point, this seemingly unfortunate discovery inspired him to learn more about the nature of undifferentiated cells, including embryonic stem cells, and he eventually succeeded in using transcription factors to convert first skin fibroblasts and then red blood cells into pluripotent stem cells, which can differentiate into any type of cell in the body, thus changing the face of regenerative medicine for good. Now, asked for the most precious advice he would give to a young and aspiring scientist at a lecture of his I attended at the Golden Gate Club in Presidio⁶⁹⁴, his answer was that the greatest mentor, the guiding voice of Nature, herself, he had found in the unexpected results comprising his experimental data, including these that led him to the Nobel Prize in Medicine. To add up to his advice to never cease turning things up on their heads in search of the paths to discovery of something new and beneficial for humanity, surrounded by the flocks of sheepish mindsets who had all fallen prey to the trendy exploration of the ways to convert stem cells into regular, fully differentiated ones, Shinya went on to travel the opposite route, the one of converting regular, differentiated cells into stem cells and it is this path, drawn in direct opposition to the interest of the mainstream, that led him to findings that eventually earned him the Nobel Prize. It was quite a similar route, against the stream, complying with Chesterton's aforementioned norm that 'a dead thing can go with the stream, but only a living thing can go against

it'⁶⁹⁵, that I seminally followed when I began to advocate in early 2016 the simplification of the nanoparticle composition and structure at meetings whereat every attendee worked on making them ever more complex. This thesis sounded to its hearers as odd as the 'never nuts to the squirrels, always squirrels to the nuts' adage prophesied by the Czech liberal outlaw in Ernst Lubitsch's *Cluny Brown* in the effort to convince people in the value of putting things up on their heads and acting idiosyncratically, peculiarly, otherworldly, straight outside the box, lest their potential to elate and enlighten the world dissipate in the wind. Needless to add, I did not allow myself to be discouraged by the squared and frowny faces in the audience; rather, I proceeded to demonstrate the extraordinary practical gains by this simplification, specifically the capacity of calcium phosphate nanoparticles to be made viscous, antibacterial and osteogenic, substituting the expensive polymers, antibiotics and growth factors, respectively, in advanced bone graft formulations, the reverberations of which in the scientific community are yet to be heard, as of today. Regardless of whether these and similar peculiarities regarding the outcomes of scientific invention can be seen as an embarrassing failure for the research methodology that armadas of scientists populating academic hallways have unquestionably embraced or not, the point is that the room for the inflow of stellar surprise in all its topsy-turvy charms has to be always kept opened in our mind if we are to endow the world with some brilliant findings.

Hence, if the blueprints used for planning our scientific or other quests in life are drawn with perfect precision, not leaving any space for an inflow of accidental, random effects, the prospect of our voyages towards discovery and innovation will seem vain. But a mind that holds on to smart concepts and guidelines and is yet open to absorb sudden and unpredictable signs arising on our life and research paths is the one perfectly suited for making significant discoveries. If you disembark from a ship and step on to an island, which, you have heard, hides a treasure buried somewhere in it, and then follow a preconceived plan of motion that, you believe, will get you straight to its doorstep, while disregarding the feedback to your steps and thoughts that the forest, the sea, the sky and all else around you is giving you, chance is that this treasure will be discovered by someone else. Similarly, conditioning funding of researchers' projects by their constructing an algorithm in which the setup of every single experiment and every single hypothesis that will be probed by experimental means is to be given gives a false picture as to how the most genuine and prolific discovery process occurs. For example, for as long as the astrophysicists directed the satellite probes to the areas of Mars that looked from the Earth as if they may hide a clue about this planet's geological features, all attempts to discern the signs of its activity failed. Mount Olympus, amongst an array of other volcanoes, were, however, noticed when a probe hit a dust storm in the vicinity of Mars' surface and directed its optical signal to the only dark spots visible at that moment, all of which turned out to be giant volcanoes whose tops protruded the upper edge of the layer of dust covering the whole atmosphere. In other words, a room for the input of the moment has to be left in our research plans instead of the preprogrammed exactitude, lest the most valuable findings be predestined to remain out of our sight. Once more, I point out that it is the balance between perfection and imperfection that sets the conditions for all types of progress in life.

Thence, we come to the area of human knowing. There we see that ambiguity and perplexity are the states of mind required for the sprouting of novel ideas about the nature of reality. As the historian of science, Thomas Kuhn observed, 'an unanticipated novelty, a new discovery, can arise only in an equal extent as human anticipations about nature and our instruments have been demonstrated as fallacious'⁶⁹⁶. This directly implies that facing frustrating difficulties in our quests for knowledge is the sign that we move in the right, potentially prolific direction. We all know that not encounters with textbooks in which everything we read becomes immediately intelligible to us, but mysterious meetings with the products of natural or human creativity in which not everything becomes clear at the first glance, and in which almost everything has the nuance of an enigmatic, yet enormously important message that we are invited

to decipher, present sources for the true enrichment of our knowledge and being. Had it not been for the moments of intellectual struggle in the days of our education, we would never have been able to develop the cognitive abilities that endow us today.

In fact, there always needs to be something that disrupts the state of perfection in minds and worlds of ours. And we should not be desperate about that, but bear in mind that only through such circumstances can wisdom in our ideas and emotions arise. Just like the dialectical confrontations present the way to improve mutual understanding of the sides in the dialogue, the same principle of progressing only in face of problems and challenges seems to be standing as valid within every other ontological aspect of the Universe.

If we look more closely, we could easily discover an amazing thing. It is that whatever we perceive, think or do is always preconditioned by the existence of imperfections. First of all, as previously mentioned, our sensory organs are sensitive to differences only. Constant environmental stimuli do not produce any perceptions unless they become modulated by the internal activity of the sensory organ. Thus, we are not aware of anything that has been established as constancy in the world of our experience. Therefore, only what essentially surprises us and goes against the grain of our subconscious anticipations of the way our experience should evolve gets to produce a difference in us and make us aware thereof.

Erwin Schrödinger thus claimed the following: 'Consciousness is associated with such physiological goings-on as are still being transformed by mutual interaction with a changing environment. Moreover, we concluded that only those modifications become conscious which are still in the stage of being trained, until, in a much later time, they become a hereditarily fixed, well-trained and unconscious possession of the species. In brief: consciousness is a phenomenon in the zone of evolution. This world lights up to itself only where or only inasmuch as it develops, procreates new forms... If this is granted it follows that consciousness and discord with one's own self are inescapably linked up, even that they must, as it were, be proportional to each other. This sounds a paradox, but the wisest of all times... who by life and word have, more than others, formed and transformed that work of art which we call humanity, testify by speech and writing or even by their lives that more than others have they been torn by the pangs of inner discord. Let this be a consolation to him who also suffers from it. Without it nothing enduring has ever been begotten'⁶⁹⁷. With these words he clearly pointed out how everything perceptible in the world of our experience is the source of our learning and evolution. Matter is, thus, literally 'what matters' in our ascension along the ladder of spiritual learning and climb towards ever more wonderful worldviews and cognitive panoramas in the evolution of life and consciousness.

Thence, let us shift to the domain of our thoughtful reflections. Namely, whatever we think can be considered as either a way of learning how to maintain stability in the world of experience or an attempt to improve it. In the first case, it is apparent that the imminence of mistakes and falls preconditions us to become vigilant and lucid in our thoughts so as to use them for avoiding flaws in coordination of our movements. In the second case, it is obvious that a divergence of the way we imagine the existence of a better world from the way it really appears to us is the precondition for the development of thoughtful visions that will subsequently guide our actions in evolutionary ways.

Were we to enlarge the scope and the dimensionality of human abstractions, we would come to the same conclusion. It is that mistakes in terms of deviations from our expectations and desires from the earliest childhood to the current points of our lives have gradually ingrained wisdom and beauty in us, that is, in the way we see the world. In relation to that, Rebecca Solnit noted the following: 'The blue of distance comes with time, with the discovery of melancholy, of loss, the texture of longing, of the complexity of the terrain we traverse and with the years of travel. If sorrow and beauty are all tied up together, then perhaps maturity brings with it and aesthetic sense that partially redeems the losses time

brings and finds beauty in the faraway'⁶⁹⁸. Prior to saying this, she reminds us that 'blue is the light that got lost', as blue photons do not travel the full distance from the Sun to our eyes, but get scattered on the molecules of air on the way. Rarely reachable and always present in-between, somewhat like the rainbow, they give the key beauty to the way natural landscapes are colored. In the words she masterfully composed, she points to the dreamy beauty residing within ourselves and the feelings of being lost, inextricably linked to each other.

Finally, scientific and technological innovations that change the face of our planet are derived upon the continuous needs to solve various problems in life. This, in turn, means that even the most seemingly flawless solutions to ongoing worldly issues will always leave a trail of undesired side effects in their wake. The HIV virus began to spread from a small community in Congo to the rest of the globe in the 1920s as the result of the country's investment in healthcare, when boundless supplies of packages of syringes and needles began to arrive to the local clinics. Improperly used, they hid the clue to the slow spread of the virus beyond the borders of Congo, beyond Africa and into every corner of the world⁶⁹⁹. Likewise, whichever the solution we have in mind to problems perceived around us, we must be certain that they are partial at best and that new problems, setting grounds for the development of even newer technologies to solve them, will appear in their wake. Tesla and Edison discovered the electrical lighting and sent candles into history and with them the aesthetics associated with (a) the well-defined directions from which the light was falling onto objects in a closed space, (b) the sophisticated interplay between shadow and light, (c) the flickering shadows forming dancingly around objects lit by the candlelight, and (d) the higher degree of warmth of candlelit objects than those illuminated by the even electric lights; similarly, every technology that makes it to the mainstream avenues will make some things easier and more efficient, but only at the cost of retiring something beautiful to a permanent past and bringing about new dangers and challenges, despite clearing away the old ones. This, of course, is not to be a cause of despair, but of much rejoicing, given that the problems around us are the sources of everything beautiful and brilliant conceived by the human mind and that the same fate indisputably awaits the cans of worms we inadvertently open with every creative expression of ours. Had the world around us perfectly fit the way we imagine an ideal world, the need to think or do anything creative would simply vanish. And as we see, even the very perception of ours would gradually pass away in such a 'perfect' world. Hence, just like the constant thermodynamic dragging of our beings towards the abysses of nothingness keeps us continuously ascending on the ladder of evolution towards ever more miraculous states of our beings and the world, the same is with all other aspects of the world we live in. Everywhere we look, we see human willingness to stream towards light as incessantly reflected from its opposites in terms of passive, lazy shadows that tend to immerse the beautiful dynamic diversity of life into a lifeless ocean of infinitely monotonous and sterile physical uniformity. 'Someone asked me, since hope itself is a good thing, what fear is. 'Show me fear without hope', I said, 'or hope without fear, for these two are inseparable'⁷⁰⁰, Jalal ad-Din Rumi mused out loud in one of his discourses in an attempt to disseminate his belief in the inextricable entwinement of the rise of the most gorgeous qualities in life and the simultaneous thriving of their diametrical opposites. In view of this, we, the adorers of light, of virtue and of cosmic joy should learn to appreciate the importance of shadows, flaws and moments of sadness in our lives. For, the impeccable beauty of life would be clearly unimaginable without them.

All our strivings towards perfections can be thus said to sprout from the seeds of imperfection. This explains why each tiny perfection in the way we perceive the world, think about it or act has to leave enough room for imperfections to thrive within. As in the well-known Evangelical allegory (Matthew 13:23-30), wheat and tares ought to be left to grow together until the day of the harvest when the field of spirit reaches its ultimate fulfillment.

The dialectical nature of progress in life, endowing it with the symbolism of the battle between light and darkness or good and evil, can be correlated with the choice-based nature of human thinking. Namely, every form of choice resembles standing at a crossroad while being stretched towards different directions in our thoughts and emotions, each one of which we would often wish to take. As this is normally not possible, we can immediately see that a conflict is intrinsic to practically every choice we make. Being riveted at crossroads is so intrinsic to life that the image of the crucified Christ, one of the most powerful symbols of our civilization, neatly depicts it. Surprisingly, recent research on the structure of water has shown that under ambient conditions, when water becomes the bearer of the fascinating phenomenon called life, one of a kind in the Universe as we know it, it exists in an inherently ambiguous state⁷⁰¹, as if oscillating between the two stable states, but not being sure which way to go and thus remaining to rest on this indecisive middle ground for good, albeit waveringly and with stunning molecular liveliness, shifting hydrogen bonds between its neighbors and dancing fluidly nonstop. In other words, be it inanimate matter or sentient creatures, they all have the obligation to remain at a crossroads for as long as they wish the fire of creative being and thought to burn inside them. Although it may be our own impression that we belong to the most exciting historical crossroad at which the lively styles of the past encounter distantly felt future trends in cognizing and acting, a sense of that crossroad has been felt by profound human creatures ever since.

Be that as it may, choices hidden in every aspect of human thinking point to an even more fundamental quality: freedom. Had there been no freedom, bringing about choices would present a trivial and meaningless act. Moreover, acknowledging freedom in the way we perceive, think and act points once again to the co-creational thesis, in which experience is seen as originating during the interplay between the creativities of human mind and divine Nature. A legendary saying written in Qur'an (Al-Rad(13):11) is that God does not change what is in man until man starts changing what is in himself, clearly pointing to the freedom God has given to man. This does not, however, speak against Friedrich Hegel's dialectical explanation of ontogenesis of the world. In it, the universal mind (i.e., thesis) divides itself into a multitude of cognitive perspectives (i.e., antithesis), creating thus a fertile tension from which the evolution of the world in informational and spiritual terms results (i.e., syntheses that once again get divided into even richer theses and antitheses). Eventually, however, all these individual perspectives aim at growing in breadth until they realize that they are a part of that great One, and thereby reach the state of an ultimate synthesis. Human mind and God, the whole wide world included, thus become One.

Lao-tzu, however, pointed out how the path of sacred learning is a crooked road in which one alternately takes a peer into the blissful unity of all things and returns to seeing them as mutually isolated, because it is only in the latter case that the analytical faculties of mind can be pragmatically applied. The Way of Love merely verbalizes the loving music produced by alternately shifting from the state of difference between objects and beings of our experience and our self to the state of an empathic unity of all of these. The analytical traits of ours render us capable of discerning and diversifying the informational content of the planet, whereas the synthetic ones give a blessed meaning to everything we engage our analytical creativity into. No wonder then that the aforementioned roots of the words used to denote science and religion respectively signify the acts of differentiating and connecting. These two, science and religion, building the paths to analytically enrich the face of the planet and to synthetically realize the unity of all things, alive and inanimate alike, spreading forth as a spiral that heads forward and yet constantly finds the way back, are thus inextricably complementary to each other.

One of the consequences of depicting the whole existence in terms of the symbolism of the Way and of the well balanced alternate moments of approaching and distancing of certain nodes that thus create the music of life is that the moments of separation provide the way towards unison and *vice versa*,

as much as that a way backward presents the way forward and *vice versa*. The evolution of life has been based on problem-solving attempts, that is, on the entwining of problems and their solutions. Without any of the two, the evolution of humanity could not be imagined. Thus, what may seem like a path that takes us back is in the largest possible context always the way forward. But also, the paths that seem to be taking us way forward, more than it seems reasonable, should sooner or later possess a curve that would slightly take us back. Quite against the common reason, the alternate electric current invented by Nikola Tesla proved itself superior comparing to the potentials of the direct current. Likewise, the real way forward always comprises alternate moments of going back and forth.

However, the essence of the dialectical thesis is that we can always observe the nature of things from thoroughly opposite angles. What may appear as an ever existing pessimistic situation from the perspective of the battles between theses and antitheses, can be seen as an always expanding range of happiness from the angle of their progressive syntheses. Conversely, we now have grounds to peacefully accept that even the most gracious of acts will inevitably spread specks of darkness in their wake. When Beethoven transfused his cosmic optimism that transcended all the human boundaries into his symphonies, believing that ‘if the world really understood his music and took it to heart, there would be no more war’⁷⁰², he could not have known that they would be played to the ears of German Nazis to reinforce their sense of superiority over any other human race or ethnicity and encourage them to commit horrible atrocities out of these ‘noble and aerial’ feelings. Likewise, if he could have guessed that the evil landlady portrayed in Vittorio De Sica’s *Umberto D.* would sing an aria from an opera to her lieges while the poor old man she kicked out to the street sweats in the bed in the room next door in front of none other but his poster or that the patrons from Virginia Woolf’s *Jacob’s Room*, ecstatic after the performance of *Tristan and Isolde* by Richard Wagner, who considered Beethoven ‘a sublime and unique supernatural being, with whom none could compare’⁷⁰³, would be totally indifferent to the fate of the child thief caught and humiliated at a central square, he would toss and tumble in his grave more clamorously than any corpse before or after. Indeed, how disheartening it is for that relentless optimist among us to learn that a colossal musical piece such as the second movement of Bruckner’s *Symphony No.7* was played at the German national radio station to commemorate the news of Hitler’s death and thereupon recognize that the German classical music, inarguably more compositionally sophisticated than any music on the globe by the mid-20th Century, must have played a key role in feeding into the sense of supremacy of the Nazis and thus acted as a collateral cause of the unspeakable suffering that the Nazi regime imposed on humanity, in spite of all the beauties, compassion and humility of the spirit woven into it. To reiterate this point, Banksy notably painted a Nazi officer sitting serenely on a park bench and enjoying an impressionist landscape in his painting known as the *Banality of the Banality of Evil*, reasserting along the way that the vilest doers of the modern day are the conformist little clogs in the existing social machinery, performing their tasks quietly and peacefully, without ever questioning them, thus creating no turbulent flow around their beings, as troublemakers all the world over, from the Christ to Gandhi to Banksy, himself, have done. Quite in line with Andre Gregory’s expectation that the next big tyrant in the Western hemisphere would be an avid fan of the *Little Prince*⁷⁰⁴, this historic instance has demonstrated more strikingly than any before that there is no such thing as a perfectly beneficial creative act and that everything, including even the products of the most blissful and benevolent human creation, could be used for dual purposes: to exalt or to degrade the human spirit. To draw a line between the two is, however, impossible because the context, comprising the whole Universe in its entire history and future, defines the benevolence or the wickedness of our acts, which are, furthermore, such that they are practically always the concoctions of both. This means that even those denounced as vilest creatures that have ever lived have usually fallen prey to specific traps that social circumstances imposed on them, traps into which most of their fiercest critics would have fallen

too, whereas those celebrated as the purest souls on Earth also inadvertently but inescapably produce traces of evil in the wake of their immaculate deeds. Or, as Walter Benjamin pointed out once, ‘There is no document of civilization that is not simultaneously a document of barbarism’⁷⁰⁵, meaning that if we crave to embrace the light, there must a room in our heart for the fondness for the dark⁷⁰⁶.

The incessant confrontation between light and darkness can seem depressing in its inescapability, but can be also realized as the source of an unimagined past and future development of the human spirit, still cocooned in us due to fear and mental negativity, but patiently waiting to be transformed into a butterfly one bright day. And from the latter observational stance, every trace in Nature, no matter how disrupting and disharmonic it may appear, can be accepted as a crucial factor in bringing about ever more joy in the evolution of humanity. And when we find out that such an immense aesthetic potential lies dormant in each detail of the world, irrespective of its superficial appearance, we may become truly sacred persons. Thence, everything would seem loving and beautiful to us, and we could be reminded of many words of wisdom from the theological tradition of human knowledge, including the message of Father Zosima from Fyodor Dostoyevsky’s novel *The Brothers Karamazov*, saying that ‘if you turned out to love each thing, the secrets divine would you understand in them’. Novalis meant that ‘for a truly sacred man nothing is a sin’, whereby Swami Vivekananda held that ‘a sinner is only one that sees a sinner in another man’⁷⁰⁷. The Lord Krishna in the book of *Bhagavad-Gita* says that ‘all mankind follows my path in all respects’ (*Gita* 4:14), and finally, the apocryphal Biblical verses clearly tell us how ‘when the ungodly curseth Satan, he curseth his own soul... All the works of the Lord are good: and he will give every needful thing in due season. So that a man cannot say, this is worse than that: for in time they shall all be well approved. And therefore praise ye the Lord with the whole heart and mouth, and bless the name of the Lord’ (*Sirach* 21:27...39:33-35). Thus, we can conclude that there is not a single piece of reality that is not permeated with an immaculate beauty and meaning that turns out to be crucial in the light of the evolution of the world as a whole.

On the art of searching and not finding, always preluding and never concluding

‘The essence of philosophy is searching for the truth, and not possessing it. To deal with philosophy is to be on the way’
Karl Jaspers

The entire Philosophy of the Way points to a balance between our deepest wishes and visions as final causes on our paths on one side, and paths as the aims in themselves on the other. Neither are aims and visions of the discoveries nor sole paths that lead thereto more important than each other in the enfoldment of the majestic story of one's life. For, having a vision of the aim in front of our mind creates the way that would take us thereto, while a careful devotion to pursuing the right way in itself is necessary to reach the conceived aim. There could neither be a way without destination, nor a quest without solution, and *vice versa*. But still, being on an endless quest, never finalizing it by finding the ultimate solutions to questions that crucify us from the inside, while still yearning to reach them with our whole hearts, is what keeps our beings as well as the whole planet and humanity on the path of incessant progress and evolution.

Similarly, mutual agreements, conformities and sympathetic copying and reflecting each other in one part and producing surprising differences, oppositions and confrontations in the other comprise all creative communications. Sometimes the real way to dance in front of the others is, thereupon, not by purely following each other's moves, but by pulling off something surprising and thoroughly different. ‘I love you, you’re perfect, now change’, an exciting slogan of the hypermodern youth says.

Or in the words of the Benedictine scholar, Demetrius R. Dumm, 'The ultimate hospitality is an entertainment of divine mystery in human life'⁷⁰⁸. And we all know how an awakened feeling of joy often presents a perfect gift that a welcomed being can shine back to the source of this and any other hospitality. Keeping joy and bright mind close to our heart in face of the secrets and mysteries of life is a key that may decipher many enigmatic doors and encrypted messages that lie in front of us. True cosmopolitanism could be apprehended as designating exactly that: the incarnation of a personality not fearful in face of the unknown, but colored with joy and serene wonder in view of the diversities of the world.

We came from the starry depths of unknown and we will have returned to them. So our lives, in all their sunny orderliness, could be seen as standing between the two poles, both of which are plunged into a pure mystery of being. Thus, the art of questioning, wondering and getting lost in the fields of unknown has to be appreciated as one of the essential drives of our creativity. 'Not till we are lost, in other words, not till we have lost the world, do we begin to find ourselves, and realize where we are and the infinite extent of our relations'⁷⁰⁹, Henry David Thoreau noticed. Here I bring to mind Super Goof, a Disney comic book character spinoff from the hippie era, who had a strange habit of getting lost and flying off to a strange planet in the middle of every episode, but only to return with a heap full of insights that would help him solve the mysteries that befuddled him on Earth. Or, as the narrator behind the adventures of this quirky hero pointed out in one of the episodes, at the moment of Goof's sudden departure into an unknown direction, 'Influenced by the hypnotic red arrow, Super Goof detours like deflected lightning... The only thing that stops him from zooming off on a tangent forever into space is the Sun'⁷¹⁰. I have advocated this freeness to get lost in one's ways during scientific research ever since I became the director of a lab and as an example I have offered my 7-year old long NIH project that owes its success to the lab's deliberately getting lost along the way. Like the time Željko, Ivan, Mina, Marjan, Olgica and the rest of the gang took a backstreet detour following Slaviša's advice and climbed to the dark and desolate top of a mountain overlooking Kotor in the middle of the carnival night and, after Cena set wildlife on fire, we got back to the town and made it a more glorious night than it would have ever been, so did we begin with a tight focus on the medical goal of the project, *i.e.*, a more sophisticated way of treating osteomyelitis, but then literally fell in love with the means we used to reach that goal and, symbolically, discovered the destination in the road, thus beginning to explore the phenomenal potentials dormant in a single material, calcium phosphate. Then, just when we thought that we got ourselves lost completely and that we would never be back on the main road, we discovered the most attractive of these new potentials, the intrinsic antimicrobial activity of calcium phosphates, the relevance of which for osteomyelitis directed us back to the central avenue in a most glorious way. Yet, without this bold determination to get lost, we would have never arrived at this discovery and, thus, this unanticipated gift to the problematics of huge medical interest would not have been made. Symbolically, the very last paper in this project, which came right after the trilogy in which we reported the intrinsic antibacterial properties of calcium phosphates and made a full circle, allowing the ends to merge with the beginnings, contained the description of a study in which nanoparticles of calcium phosphate were made to traverse a series of media, leading me to conclude that 'history is the determinant of the future' and that 'by sending a nanoparticle to a circular journey through an array of media, its properties upon the return to the point of origin will not be the same as those that it had had when it left it in the first place'. Also, if anyone should ever decide to put the papers from this project into a chronological edition and mention in the prologue this circular path that was treaded solely thanks to forgetting the destination and falling in love with the path, so to say, along with embracing the courage to get lost, one should not forget to include the apocryphal coda, the epilogue in the form of the paper that resulted from the study on flowers I did with five-year old Theo and two-year old Evangelina under the open Californian skies

after I got excommunicated from academia because of the radical idealism that I disseminated in it, when my lab was confiscated and held as a hostage by the corporate powers to whom no knowledge, but \$\$\$ were all that mattered, and when I was out in the street, trembling every second at the idea of what future would bring and how I was going to feed the two angels by my side, the two perpetual reminders that without the freedom to get lost, no treasure in life could be stumbled upon. When Laurence Sterne wrote *The Life and Opinions of Tristram Shandy, Gentleman*, he made the narrator, Tristram Shandy, so prone to diversions that he started the tale about his life by not even coming to the mention of his own birth, wherefrom it all should have begun from, before the third out of nine volumes of the book published over the period of 8 years, but he could not know that with this book he would open a whole new language and style, serving as a virtual precursor for postmodernism in literature, which would effectively be born only in the mid-20th Century, with a long delay, just like Tristram Shandy in the narration of his own life. Likewise, we should never underestimate the new territories on the lands of human being and knowledge that we may open, often inadvertently, by wandering off the straight path and into sinister loopholes. Therefore, when students in my proximity are being accused of ‘thinking in tangents’, as if it is a sin in science, my response is usually a strident exclamation that this can be a great quality since science, intrinsically experimental, benefits from authentic, experimentative mindsets, always ready for an adventure, for a voyage into the unknown, for taking on the side roads and getting lost inside the forests of perplexing symbols, for jumping off the cliffs in hope that more blissful continents of thought would be found where their feet land. In contrast, science is brought to the edge of expiration in a world subdued to the demands to make it thoroughly planned, like planned economy, as it were, for which reason my research path has been to shun any research path as soon as it starts to be walked on and swiftly disappear in the bushes on its side in search of treasure. Successful people do have the skill to ignore the daily effects on which a typical brain would linger, discarding them instead as worthless minutia and focusing on specific goals they have set before themselves, but in my universe of thought, the universe that has never ever considered success as an ideal worth attaining, the holy mind goes with the flow of things, emerging now on this shore, now on another, without knowing where its destination a minute later will be, turning the given minutia into sources of magical attraction, into objects that it would stop by, look at from all angles, and caress gently with the rays of its attention. Therefore, like the girl who wrote back to Nigerian phishers⁷¹ and struck up a life-changing conversation with them, along with oneself, and the world too, so have I stunned friends and colleagues innumerable times by spending time on events and things at the sight of which they would just shrug their shoulders and continue treading the path. But in this living by the nomadic norm that advocates nothing but a pathless path, in this paying attention to the smallest of things, the holy character, as I would like to believe, gets mirrored, serving as a diametrical opposite to a character, usually successful and esteemed by the world, that goes straight, along a projected path, and never looks back, allowing no distractions to enter it, swearing that the goal is to find, never to lose or, god forbid, become goalless. And yet, what the symbolisms of the Way and of the eternal music of shifting perspectives point at is that life is a game of alternately getting lost and being found. The Biblical words, remember, cherish more the prodigal son that roamed, lost his way and was found in the end than the son who stayed faithful to the right way all the time (Luke 15:11-32).

The same balance between faithful determinateness and doubtful wondering is preserved within every creative mind. On one hand, knowledge can be edified only for as long as its foundations in terms of implicit presuppositions and basic ideas are stable enough and resistant to the incessant shaking of our experience. But on the other hand, randomness and entropy present the ‘food’ for formation of every novel order in the Universe, which means that drawing an inspiration from standing in the midst of uncertainties and puzzling perplexities is essential for sustaining our creativity. We need to be ready to

dwell into the mysteries of the world with a belief that we are blessed and powerful enough to be able to untangle the answers. But we should also keep in mind the irresolvable character of the famous Meno's question: 'How will you go about finding that thing the nature of which is unknown to you'? For, one of the ultimate mysteries of life is never knowing how the world seems from eyes of another, and yet being able to truly meet one's self only insofar as we manage to empathically blend with those same eyes of another. This music in which we wobble between dwelling in the depths of our being and spreading the wings of our being so as to merge with others and become one with the whole Universe conceals the key to the Way of Love.

What religion with the central place of faith in it teaches us is the divine art of searching and questioning. For, if we would know the right answer to everything, we would have stopped seeking and having faith in crucial links in the microcosm of our conceptual schemes that depict the mystery of life. Faith flourishes only in hearts in which uncertainties and ubiquitous questionings reside. And yet faith and care that faith brings everywhere with it are the fundamentals of all wisdom. They are the pillars upon which all the beautiful monuments of human knowledge stand. Nurturing the heart of eternal seeker presents the drive for the evolution of human knowledge and spirit, and the ultimate aim of each religion, science and art. Moreover, as I have always thought, uncertainties and insecurities that they harbor are the driving forces for human thought, as without them, no creation of new knowledge in our brains would ever be possible. In fact, it can even be argued that the deeper the insecurities seated in us are, the deeper our thinking will be, and this may be exactly where the root of the fundamental problem with humanity as outlined by Bertrand Russell, which is that the eagerness to express one's opinion is inversely proportional to the level of one's sensibility and intelligence, lies.

Hence, we should be sure that we would never be sure in knowing an exact and complete answer to any truly significant question in life. Being 'on the edge' in each aspect of our personality and development is, therefore, an unavoidable fate of our humanness, and not something that we should be pitiful about. Rather, it is something that we should cherish and convey to others through a correct systemic education and wholesome living.

For example, imagine if someone asked an omniscient prophet whether our efforts to save the world and fulfill our worldly missions would succeed. What could he tell us so as to foster us to indeed fulfill that mission? If he says, No, then we would give up on our hefts, and leave the scenes of our creativity to hopelessly face the abyss of the seemingly vain meanings of our lives. But if he says, Yes, the effect would be similar for we would also spontaneously abandon our benevolent aspirations that move the wheels of our progress and evolution, although this time filled with leisure and unproductive optimism. Without the mellow eagerness to succeed in our deeds, our creativity and the whole range of mental and emotional powers would be scattered in the wind. The right answer would, therefore, need to be of a fuzzy character, that is, somewhere between Yes and No. Moreover, for a vision to arise in one, one must perceive certain aspects of reality as bleak and obsolete lest there be no contrast between the vision and reality, but at the same time one must nurture shiny optimism lest no bright vision be bearable inside one; hence the fuzziness, the antagonism between pessimism and optimism tearing apart the visionary spirits all the world over and underlying the creative state of mind. All in all, only along the pathways of such an indeterminate knowledge do the doors for instigating the Christian qualities of faith, hope and love, comprising the meanings of our spiritually evolutionary missions in life, open in all their lash and charm.

To be open to learn and evolve is to be ready to accept mistakes

'Love ye therefore the stranger: for ye were strangers in the land of Egypt'

'Two step behind the rest
 One fingertip too long
 A hole
 A hole in the box they carry
 Pours sugar in the road
 Pour dimes in diamond Jim
 Two months to fill him in'
 Throwing Muses, *Two Step*

Some might say that man is young as much as his mind is prepared to learn. But I say that as long as man accepts mistakes that he makes, he is young and vigorous in his spirit. The signs of disgrace carried by the rigidity towards acknowledging mistakes in thinking and behavior can be overcome by one's gentle willingness to accept mistakes with a smile and a serene sky of one's heart and mind.

If we look deeper, we may realize that education is all about making mistakes and learning upon them. Henceforth, we should feel greatly privileged for having an opportunity to make mistakes. Jobs based on simple routines usually do not leave much space for exhibiting a freedom of choice, but also do not permit any mistakes to occur. The only way to climb up on the ladder of creativity is to face mistakes in our behavior and knowledge. Each mistake is like a crossbar on the ladder, overcoming of which takes us closer to the clouds of the sublimed forms of knowledge. Being allowed to make mistakes is, therefore, equal to being given a chance to evolve. And being able to recognize mistakes in our actions or thoughts and thence invoke a great desire to live so as to correct the erroneous actions of ours is the sign of a youthful spirit and mind. Encouraging one's willingness to face mistakes in the interaction with the world is equal to rejuvenating one's heart and mind.

Another important fact that lurks underneath this observation is that all obstacles on our ways should be received with knowing that only they may provide us with steps towards higher, evolved perspectives in understanding the enigmas of life on earth. Take the example of a boy that sits by a book filled with enigmatic symbols and messages. If the reader immediately understands everything he reads, he is essentially not able to learn, but to merely remind himself of already learned facts and instructions of behavior. But only when he becomes faced with puzzling obscurities, the doors for learning and evolving become open somewhere in his mind and the landscapes of the world. This observation could be neatly associated with the fact that only stress can lead to more complexly organized patterns of any natural system. Only the boy who relentlessly tries to find his way through the forest of mysterious symbols and messages will successfully travel on the journey on which his studies take him.

'A man who understands everything right away is perfectly predisposed to never truly understand anything', was a beautiful Alexander Pope's guideline mentioned earlier in the text. Being quick but slow, carefully observant, yet dreamy and floating in one's thoughts defines a path towards attaining the landscapes of the mind colored with the rainbows of majestic creativity and inspiring imagination stretched all across their transparent, infinitely candid skies.

People nowadays seem to increasingly understand and value the beauty of accepting modest attitudes of literally saving grace underneath the emanations of their being. That is, instead of justifying one's decisions and defending oneself in every possible situation, they adopt this natural approach to behavior in which beautiful and inspiring mistakes are not egotistically hidden, but highlighted and let fly freely across the sky of our being. It goes without saying that this attitude is underlain by knowing that the more we give of ourselves to the world, the more we would need to stumble and make flaws, and *vice versa*. For, 'he who thinks greatly must err greatly', as Martin Heidegger claimed in one of his poems⁷¹², whereas long before him it had been majestically asserted by the Christ that 'to whom little is

forgiven, the same loveth little' (Luke 7:47). In the chronology of the Christ's teaching, this unorthodox viewpoint on morality served as a logical prelude for the parable of the prodigal son, the son who 'took his journey into a far country, and there wasted his substance with riotous living' (Luke 15:13), but then 'when he had spent all... he would fain have filled his belly with the husks that the swine did eat' (Luke 15:16), and so 'he arose, and came to his father' (Luke 15:20). Even before he uttered a word of apology, the father 'had compassion, and ran, and fell on his neck, and kissed him' (Luke 15:20), and said the phrase that resonates eternally across the cosmic dome: 'This my son was dead, and is alive again; he was lost, and is found' (Luke 15:24). And when the prodigal son's brother complained to his father that in spite of him serving his father well all those years that his brother was away and never transgressing any of his commandments, his father never bestowed upon him such joys and gifts he was now conferring to his prodigal son, these grudges were shoved by the father to the side with a call for merriness (Luke 15:32), under the skies still freshly echoing the morale of the story of the shepherd's leaving his ninety-nine sheep in the wilderness to go and search for the one that got lost, then laying 'it on his shoulders, rejoicing... when he hath found it' (Luke 15:5) and inviting all 'his friends and neighbours' afterwards to a party, to 'rejoice with me; for I have found my sheep which was lost' (Luke 15:6), the story that concluded with the Christ's comment that 'likewise joy shall be in heaven over one sinner that repenteth, more than over ninety and nine just persons, which need no repentance' (Luke 15:7). This is all to say that those who alternately sin and repent are more pleasing to the gods than those who timidly walk the righteous path, without straying off it once. Saint John the Apostle struck the same semantic chord when he reprimanded the 'lukewarm', those who always comply with the rule and err not, who 'have neither learned to bless nor to curse from the heart'⁷¹³, and warned that they would be spitted out from the divine mouth on the Judgment Day (Revelation 3:16) and added three lines later that, in contrast, 'those whom I love I rebuke and discipline' (Revelation 3:19), insinuating that the worthiest of God's love are those who alternately fall from the right path and repent before stumbling again and getting up and so on. Balancing certainty in uncertainty and learning to walk in a wobbly, spiral way, where each step forward would be followed by a misstep and a slide backward, therefore, seems to be a ubiquitous aesthetic challenge for the current generation.

The Slavic word for an inherent fallacy, *mana*, has its origins in exactly the same Hebrew word that designates food that fell from Heaven to sustain Israelites in the desert. This linguistic correlation may be no accident once we recollect that *mane* are indeed heavenly blessings in about the same extent as immaculately harmonious qualities that we tend to attain are. Almost by definition, ethical behavior could be exerted only in problematic situations, so that perplexities, doubts and problems should be regarded as inherent steps of the evolution of human spirit.

The evolution of human knowledge and technologies based on this continuous process of recognition and tackling of problems is, however, made challenging owing to a rarely recognized fact. Namely, the professionals dealing with the application of specific knowledge or technologies are most aware of the problems associated with them and yet it is these very same, practically minded individuals that are most resistant to innovation. In contrast, basic scientists and 'disruptive' engineers are most prone to come up with creative solutions to these problems, yet they are not often aware of them down to their finest details. In the realm of medical devices, for example, which is the subject I have taught at the university level for a while now, a general misconception is that the perception and delineation of medical problems is the first step in the birth of an innovative concept pertaining to the design of a new medical device or the upgrade of an existing one. However, the truth is different and most medical devices have been created by scientists unaware of the problems that they could solve and only later on searching where and how they could be applied in the medical domain. One reason is the insufficient communication between medical practitioners and basic scientists, but a more pertinent reason is the

systematic resistance of these practitioners to the introduction of innovation to their practice. Medical professionals, for the most part, prefer to stick to the methods that they spent years to be trained on, explaining this fundamental gap between their mindsets and mindset of the natural-born innovators.

The more complex a human profession is, in fact, the more emblematic it is of the endless process of stumbling, falling and rising, typical for each progressive pattern in life. Namely, routine jobs that begin and end in predetermined and expected ways are rarely regarded as precious within the human societies, whereas professional dealing with research, arts, innovation, development and education is usually considered as truly valuable. Of course, while the former professions allow one to fall asleep each night with a sense of serenity invoked by the thought that there was something obvious and palpable done on practically each working day, being devoted to research and arts is bound to make one often go to bed in the night wondering whether one is on the right track and if all that had been done so far had been just a giant waste of time. And yet, by being engaged in these areas of human creativity, one learns to constantly face alternate moments of reaching great heights in spirit and thoughtful clarity and sinking into the depths of obscurity, ignorance and desperation, before finding the way up once again, back to the white clouds on the transparent backdrop of the sky of one's mind, wherefrom one could slide again, gracefully, like a heavenly teardrop, to the Earth's warm embrace.

If one sets off to a research institution of a mediocre quality, there is a high chance that he would face scientists' claiming a neat progression of their aims in parallel with the desired or expected ones. But if one enters a high-class research institution, one may realize that there are entire projects resulting in failure due to setting forth targets practically impossible to attain. Francis Collins, the director of the National Institutes of Health, thus told us about his failures in cloning comparatively long DNA sequences during his first postdoctoral appointment and the encouraging words of his advisor: 'If you work on experiments that work all of the time, you probably do not work on anything really exciting'⁷¹⁴. Such failures are, however, never seen as futile and worthless by a clever mind, since not a single exploration of an unknown land that manages to result in a map, albeit without hidden treasures denoted on it, has been wasted. It will always open the space of opportunities for the future researchers, at least so as to show them where and how not to look for the pot of gold. Therefore, report everything – such is my advice to the young scientists and to my more seasoned peers, for one can ever tell when a piece of so-called negative data will trigger an avalanche of creative ideas in the mind of a fellow researcher or prevent him from embarking on voyages not worth embarking on. Besides, being familiar with errors one may make in one's profession is crucial for one's becoming proficient in the given art in the real sense of the word, for which reason Niels Bohr used to say that 'skilled is the one who knows what the common errors in one's profession are and knows how to avoid them'. Biotech and pharmaceutical companies that are more efficient and quicker to discard ideas and projects that would eventually fail are, for example, those that fare better on today's market, while my reflecting on the thought process going on in my head in the quest for the ways to phrase ideas constituting this and other books of mine has led me to conclude that similarly rapid abandonments of phrasings that sound off is the absolute key to arrivals at wordings that have the desired flow, rhythm and melody in them. Bobby Fischer, further, is said to have memorized strictly the losing moves from the chess games from the literature and based his play on avoiding them⁷¹⁵; likewise, failed projects and forlorn hypotheses may be much more meaningful to a mind on its way toward becoming scientifically superior than their successful counterparts. However, that abandoned ideas and approaches conceal innumerable dormant paths forward is being paradigmatically illustrated by the case of Johannes Kepler using the results of astronomical observations and calculations by Tycho Brahe as the starting point for his theory of elliptical planetary orbits, even though most astronomers mistrusted the accuracy of Brahe's results and considered them as merely trivially deviating from the perfect circularity. In view of that, I often wonder

how many theoretical and empirical results and insights discarded as meaningless would have had a chance to become great signs on the path of scientific progress had they only been given more attention to and made available to the public eye via opening doors to their being published freely.

In the field of economy, likewise, it is known that a harmoniously developing organization needs to employ an optimal dose of riskiness in its workings. Avoiding it thoroughly would bring the company down to a sterile resting state, whereas exceeding the optimal level of riskiness would mean that the work value and effectiveness would be engaged in a constant cycle of soaring and slumping. Balancing safety with riskiness makes us climb up the ladder of life, in each one its aspects, following a straight line, although still keeping in mind that each progressive stream is always composed of tiny sinusoidal patterns whereby we go ‘two steps forward and one step backwards’, and then over and over again. However, each one of these falls and stepping backwards serves the purpose of illuminating the way forward.

As a matter of fact, the whole postmodernist approach, as seen, for example, through the rose-tinted glasses of Andy Warhol’s pop-art philosophy, can be tied to appreciatively embracing minor and negligible artworks that would, otherwise, present decadent pieces of art that most intellectual and sensitive minds ought to be ashamed to show the appreciation of. Yet, notice how in the heart of these modest and unpretentious ways of expression lie innocent dreams in the possibility that, in a perfect world of ours, even the seemingly empties and the most prosaic of books, songs, apparels and manners must carry some wondrous hidden meanings inside them.

Sadly, however, the world we live in is such that its outliers are heartlessly erased rather than heartily embraced. One analogy of Bohr’s aforementioned principle in the world of arts is that of today’s writers and musicians becoming successful not by incorporating tons of great stuff in their works, but by knowing all the unfashionable stuff that would turn the editors and music company directors down and refraining from using it. Decades of perpetuating this principle have led to a state of affairs where vacuous contents invoking a few tritely trendy topics or sentiments have a higher chance of succeeding than the contents truly filling for the soul but interspersed with a few untrendy remarks. And yet, like this book, the works that boldly include all those untrendy elements and refuse to tread the path of commercial interest by estranging them are those before which I’d take my hat off any day. Besides, I know that the attitude of great people is such that they never defend or justify the reasons behind their actions, regardless of how badly the mediocre masses crave to see them pilloried on apologetic crosses. They let their implicit graciousness be expressed through their humane imperfections.

Even the old teaching of Christianity and the philosophy of Lao-Tzu knew very well about the importance of humbling and deigning oneself. By dignifying ourselves and maintaining that the pure perfection has been reached, all the potential for improvement would become extinct and any progress of ours would become inconceivable. Or, as St. Paul the Apostle said, ‘My grace is sufficient for thee: for my strength is made perfect in weakness. Most gladly therefore will I rather glory in my infirmities, that the power of Christ may rest upon me’ (Corinthians II 12:9). From these ruminations emerged *yurodivs*, a.k.a. ‘holy fools’, as the emanations of the supreme sanctity in the eyes of numerous Orthodox Christian theologians. Their ‘outer appearances’, they said, ‘reveal total opposites of one’s truest feelings: the grotesque derision of the world disguises an unreserved love for it, the physical nudity disguises the spiritual beauty, insanity disguises the Christ’s mind, vagrancy disguises the quest for the heavenly home’⁷¹⁶.

In this yurodivian spirit, a punk rock artist from Ann Arbor mentioned in a song called Turn Blue that ‘there was a guy who would take the things that could be nice and make them so ugly, and then he would throw lights on them’⁷¹⁷. In this way, undesired and repulsive features of life are not thrown under the carpet, but taken to light in which their essential beautifulness is observed. The image of Tom

Verlaine on the cover of Television's Marquee Moon, who I boasted I would like to appear like when I turn 27 in my late teenage years, photographed in such a way so as to highlight the bulbous Adam's apple in his throat, pimples on his face, bulged veins on his hands, slimy hair and skinniness of a drug addict, yet making a gesture as if handing an invisible flower to the viewer, has thus served as an invaluable guidance as to how to live up to this genuine pop art maxim formulated by Iggy Pop and spotlight the imperfections instead of photoshopping them blatantly. The Mexican road movie, *Y tu mamá también*, for example, starts off showing characters that appear in the eyes of the snooty and scholarly audience as arrogant dorks and infantile teasers, and then, as the movie proceeds, these views are turned upside down by suddenly invoking sympathy for them, without ever changing the essence of their personality, so that by the end of it, as one is left gazing at the dimmed screen and reflecting on the movie with the notes of Frank Zappa's Watermelon in Easter Hay heard in the distance, one feels enthralled about the fact that lights have been thrown on things found despicable at first sight and something beautiful has been found residing in them, a task whose accomplishment is, as we see, always worth applauding. For, the attitude of coating ugly and vulgar ideas and expressions with beautiful contexts presents one of the most delicate features of the philosophy of postmodernism. In light of the latter, Paddy McAloon of Prefab Sprout observed that 'the wonderful thing about pop music is that one can use the most banal phrases and still give them dignity, which they otherwise would never achieve'. A Russian avant-garde poet, Alexander Vvedensky, the darling of the punk street performers known by the name of Pussy Riot, correspondingly extended his adoration of not things clear and readily understandable, but those that are obscure and mysterious - for in them do the doors to enlightening insights and saving the world rest - to the so-called 'bad rhythm' principle that dictated the following: 'It happens that two rhythms occur to you, a good one and a bad one, and I will pick the bad one and it will be the right choice'⁷¹⁸. For, although flowers and us are similar in that we share the natural tendency to face the light, it is those rare creatures that bravely face darkness and bring lifesaving lanterns thereto, having been attracted not to flawless fields of reality where all things proceed smoothly, but to those pervaded with faults, abysses and potential failings that are given the main role on the stage of life by the gods that oversee the cosmic amphitheater that the Earth is, as the ancient Greeks would have had it.

To elicit the role of mistakes in the evolution of human knowledge, we can also be reminded how it is mainly the facility of erasing, and not writing, that has stood behind the great leap forward that word processing software provided in comparison with its predecessor, the typographic machine. The art of copying-and-pasting coupled with an efficient access to enormously large databases via Internet is what currently makes the written works of common people seem abundant with knowledge and almost superior in their breadth and exactness in comparison with the works done by members of earlier generations. In this case, it is not only instigating people to become curious enough to immerse themselves into a vast amount of available information and begin enjoyably surfing on them that has revolutionized the written word. Giving people the chance to freely make mistakes and not be afraid that they would not be able to go back and correct them has produced an equal effect on the modern written word. In the end, it has always been the willingness to go back and revise the concepts once confidently made that comprised the essence of human treading the path of wisdom.

The greatest Y

'In a many dark hour, I've been thinking about this,
that Jesus Christ was betrayed by a kiss;
but I cannot think for you, you'll have to decide,
whether Judas Iscariot had God on its side'

Bob Dylan, *With God on Our Side*

‘And a certain ruler asked him, saying, Good Master, what shall I do to inherit eternal life? And Jesus said unto him, Why callest thou me good? None is good, save one, that is, God’
Luke 18:18-19

One of the most striking inscriptions on a monument could be found on the grey stony memorial marking the sixteen victims of the NATO bombing of the headquarters of the Serbian national television in downtown Belgrade. It says a single three-letter word, followed by a question mark, a sign that has always evoked emotions of eternal sadness inside of me with its bowed shape over an elusive singularity, lone and puny, with not even a trace of blame or clichéd tributary words etched on it: Why?

Many are questions beginning with a Why that we could ask ourselves and endlessly wonder in contemplative attempts to untangle the answers. But the following one may indeed be the greatest. Namely, why is it that the nature of human beings is such that it comprehends the importance of adopting virtuous qualities only in face of the terrible events that pervade the world, and *vice versa*: that in perfectly harmonious surroundings, it seems to inevitably produce the sprouts of discontent that go on to ignorantly undermine the harmony surrounding them?

It seems to be deeply ingrained in human nature to demonstrate kindness and collegiality when the circumstances around us are on the edge of peril and devastation, and to sow the seeds of dissatisfaction when life as a whole reverberates with golden harmony. As in many narratives about explorers seeking after hidden treasures, for as long as the treasure is out of sight, the characters are connected with benevolent intentions. But once the moment of discovery is up in the air, a sprout of greediness starts growing inside the adventurers, and the conflict spontaneously ignites. In that sense, perhaps we should cherish the events that dunk us into the deepest wells of depression, for they open the door to the rise of trust, love and companionship in us and, thus, to our glimpsing the face of God, the face that lies dormant in every proximal star of the soul. If Orson Welles acting as Harry Lime in the *Third Man* spoke truth when he observed that ‘in Italy, for 30 years under the Borgias, they had warfare, terror, murder, bloodshed, but they produced Michelangelo, Leonardo da Vinci, and the Renaissance, whereas in Switzerland they had brotherly love, they had 500 years of democracy and peace, and what did that produce? The cuckoo clock’, and if we remember that the humanistic art of Paul Klee, Wassily Kandinsky and other members of the Bauhaus school of art in Germany flourished side by side with its complete opposite incarnated in the form of the reactionary totalitarianism and tyranny of the German Nazi regime as well as that, as far as the contemporary pop music is concerned, the new musical genres, affecting the values of the entire globe, have, as a rule, sprung from the gritty social sceneries⁷¹⁹, from blues and jazz having emerged from the saddened and suffering hearts of the black slaves and their descendants in New Orleans in the late 19th Century to the sound of reggae and dub having surfaced on the jagged streets of Jamaica’s Kingston to punk having arisen from the bleak economic perspectives and the anger of the youth prevalent in the days of Thatcherism to the techno music having had its birthplace in the decaying city of Detroit to hip hop having been brought to life in the neighborhoods of New York city that resembled a warzone more than a harmonious urban landscape to the sunshiny Madchester music scene having arisen from the alienating, warehouse- and fabric-filled streets of perpetually gray-skied Manchester, difficult times are to be appreciated as far greater grounds for the growth of our beings into something divine than those soaring us into states of heavenly lightness and complete pleasure for the senses.

This explains why Nature continually provides us with problematic situations. Because only problems comprise the fertile soil upon which we have the opportunity to grow friendly, cooperative and peaceful intentions that make us spiritually evolve. Experiments on bacteria have shown that conditions

of abundance instigate self-interested, competitive behavior, while those of scarcity lead to cooperative and even self-sacrificial acts for the benefit of the whole spore⁷²⁰, and the impression is that it may be in the nature of all living species to naturally drift into selfishness and egotism whenever wealth and affluence multiply and to be sustained in altruistic and healthy spiritual states only when deficiencies of one kind or another are present to certain extent. Beside causing wars, resource shortages have ever since presented excellent motives for linking human societies in networks of cooperation, and we have all heard of stories that tell us how the most valuable friendships get to be formed during harsh times dominated with wars, famine and other tragic events. Throughout the course of my academic career, I have also repeatedly observed that departments where faculty members have lots of individual funding tend to promote isolationist atmosphere, whereas the shortage of funding brings faculty closer to each other and has a positive effect on intramural collaboration. Hence, just like penguins congregate into large groups in cold weather so as to keep each other warm and minimize the detrimental effects of the inclement iciness, so does it happen in every other domain of life. In fact, the reigning evolutionary theories hold that the explosion of animal life in terms of its population and diversity as well as the coming to being of the first complex animal coincided with the receding of one of the coldest and the most challenging periods for survival in the history of the Earth, a.k.a. the Snowball Earth, when the planet was almost entirely covered by an ice sheet and when the temperatures around the equator equaled those in modern-day Antarctica. The theory further states that the inevitable decimation of the population of any given species due to these harsh environmental conditions increased the average relatedness between any two individuals and, thus, the level of altruism among the species' members⁷²¹. The post-glaciation population boom caused enough evolutionary pressure to exceed the reproductive cost of forming the first complex animal, demonstrating that stress due to adversities is more often a friend than a foe of the evolution of higher forms of life. If we were to broaden the latter insight, we would reach the conclusion that social and existential insecurities in general stand behind the formation of the most stable links of comradeship and communion. Predation in the living world, for example, has regularly led to the formation of coherent social groups as ways of protecting individual animals against the predatory attacks⁷²². Likewise, the lacks of confidence, just like the aforementioned deficiencies in resources, bring people together, closer to another human being, a key station, if not the ultimate destination, on their paths toward spiritual fulfillment. Even though people have the habit of criticizing insecurities and perceiving them as bases for the exhibition of malevolent acts, I wish the world could evolve in the direction of intensified, not diminished, insecurities because one such world would also be more emotional, more sensitive and more communal in nature. In contrast, a world increasingly deprived of insecurities I imagine as moving toward becoming similar to Godard's Alphaville, that is, a culture pervaded by zombies and robots instead of lively human beings, a culture that is intrinsically emotionless, desensitized and psychopathic. In relation to this, a recent research has shown that couples who have experienced a frightening situation during their first date, be it a roller coaster ride or a physical assault, have tended to form a more intimate relationship afterwards⁷²³, subtly reminding us that the extent of fear and the extent of emotional bonding are neatly balanced in life.

The ancient need to occasionally perform sacrifices might be a reflection of primitive instinctual sensing that good and bad events are inevitably balanced in the evolution of human race and that 'none yet e'er drank a honey'd draught unmixed with cup of bitter gall, and cup of gall for honey equally doth call, that so, the mixture one may easier drink'⁷²⁴, as exclaimed by Abbott Stephen in Njegoš's fantastic fusion of the three dominant literary forms of his time, an epic, a poem and a play, a.k.a. the Mountain Wreath. Njegoš's was a rare Renaissance breath in old Montenegro, albeit late and perhaps sparked by the same eagerness to create with ominous pendulums 'breathing down their necks'⁷²⁵ as that which had driven the early Renaissance masters of the 14th Century to counteract the intrusion of the so-called

barbarians to a world that they deemed founded on classical values; the more the classical empires around Florence, including Byzantium and Serbia, were falling under the inflow of Ottomans, crusaders and oligarchic tribes, the greater their drive to express the classical values were. Njegoš, of course, must have been aware that detrimental circumstances in life can be a fuel for the fire of creativity wherefrom some of the greatest artistic achievements are being born when he put the aforementioned line on honey and gall into the mouth of the seer in his most popular work to date. This is also why I try to ignite a flame of sadness and draw a careworn shadow deep inside my soul whenever I find myself immersed in a locus of perfect contention, in a moment in time when everything seems perfect, when dark clouds to be cast over a sunshiny reality are nowhere to be glimpsed. ‘To save our lives you’ve got to envision and to save all our lives you’ve got to envision the fiery crash’⁷²⁶, is the verse with which Andrew Bird opened one of his best records, *Armchair Apocrypha*, summing up these feelings and calling to my mind my mother’s face as I was walking out the door, twisted with worry, knowing that it would spin frightening thoughts, having me caught in tsunami waves, tornados, earthquakes, monsters’ mouths, crossfires and car crashes, until the wee hours of the morning when I would get back home, the torch of the very same thought process that I now carry with me everywhere I go. After all, not quiet and peaceful moments or cherishing parties, but nightmarish dreams, bumpy airplane rides, Jonah’s fallings inside the bellies of the whales and other frightening, life-threatening events are those that most effectively reset our brains from sinful thoughts, giving sudden rise to repentant vows to dedicate our life to beautiful and inspiring aims and become a good person that welcomes all life into the home of one’s heart. In fact, generations of thinkers, including, most notably, philosophers from the Enlightenment era⁷²⁷, have recognized the tight connection between faith and religious thought in general on one side and a sense of terror and imminent peril on the other, claiming at times that one without the other could not have existed, historically and presently alike. For better or worse, St. Francis of Assisi must have been aware of this powerful efficacy of fear in provoking human souls to accept the flows of divinity through them when in June 1226 he dictated the three controversial lines of his final testament, calling therein for the imprisonment of monks ‘who are not reciting the Office according to the Rule and want to change it in some way’⁷²⁸. In fact, one of the critical strategies that the Church has used to convert people to Christianity, especially in the Dark Ages, was the dissemination of fear that failing to follow its principles would result in tremendous suffering. It is even hypothesized that catastrophic events, including those of natural causes, such as the volcano eruption that blackened large parts of Europe around 540 AD and during which Christianity explosively spread through the today’s territories of Great Britain and Ireland, have had drastic effects on promoting religiousness among people throughout the history. This certainly brings the message from the ancient school of divinity to mind: ‘Behold, the fear of the Lord, that is wisdom; and to depart from evil is understanding’ (Job 28:28). The Christ claimed that he was going to die as a sacrifice for the whole of humanity, presumably meaning that if we would come to bear in mind the sacrifice he made and the agony he passed through on his way to resurrection, we could avoid falling into the chasm of ignorance wherein in the midst of an immersion into a state of welfare and placidity we would get to produce the opposite side of the human nature, namely not an urge to preserve the ongoing peace, but an urge to initiate the sparks of some devastating wars. But by keeping one eye of ours on darkness and void, symbolized by the Christ’s agony, the other eye would be utterly beautified by the perceived features of the world. For example, Ingemar, the boy from Reidar Jönsson’s *My Life as a Dog*, constantly contrasts his perceptions of reality against those experienced by Laika, the dog sent into outer space, the infinite darkness enveloping the Earth, to do none but expire; that is how he overcomes the death of his mother and other staggering miseries encountered in real life and manages to still see beauty in it. In that sense, beside our traditional obsession with the living matters, we should in equal part be devotees of ‘deathly’ matters and maybe

even see all things around us as already dead in order to boost our astonishment with the things alive and present right here, right now. Or, as Kanji Watanabe's Mephistophelean guide through the night in Akira Kurosawa's *Ikiru* pointed out, 'We only realize how beautiful life is when we face death'. This has allowed the works of art evocative entirely of pain, suffering, wretchedness and death, such as Shostakovich's Symphony No. 14, whose concluding message is that 'death weeps in us in the midst of life', to serve as sources of realization that 'life is truly beautiful', as the Russian composer himself noted⁷²⁹, and of inspiration to live life freely and beautifully. Best summers are from here on lived by keeping 'one eye on the winter'⁷³⁰, as Shona Laing would have instructed us, while life lived at its fullest and most grandiose always holds the other side of its coin, namely death, in view. Not only should we, therefore, live our days so as to take care of the 'seventh generation onward', but we should live them as if they were our last ones. This is where comes the story of a sage who had dwelled in an enlightened state of mind, always carrying a blissful smile everywhere he would go. When he was asked by one of his disciples how in the world he was able to maintain such positivity in spite of the omnipresent miseries and reasons to do nothing but eternally grieve, the sage picked up a glassy cup that sat on the table in front of him and said the following: 'Someone gave me this glass, and I really like this glass. It holds my water admirably and it glistens in the sunlight. One day the wind may blow it off the shelf, or my elbow may knock it from the table. I know this glass is already broken, so I enjoy it incredibly'⁷³¹. Hence, with our mind being partially focused on nothingness, the other part of it becomes naturally filled with exuberant fireworks of imagination and emotions, from which utterly creative ways of being are free to spontaneously arise in all their splendor and charm.

In the conceptual framework of the systems theory, 'nothing' is frequently postulated as a precondition for the existence of anything. This premise rings in accord with the divine voice from Njegoš's *Ray of the Microcosm*, who claimed to 'have infused space with as much light as darkness'⁷³². For, the existence and recognition of light requires a contrast against its lightless antipode. If you have ever explored the mechanism of the formation of holograms, you may know that the more precisely the referential signal delivers the information of 'nothingness', the better the resolution of the overall hologram would be. And such a direct proportionality between the stability brought about by a referential signal and the quality of contrast and the amount of informational content applies to many, if not all, measurements we can conceive of. For, eventually, there are no absolute measurements, and each of them relies on the use of a standard source of information in relation to which the appropriate value and meaning are assigned to the analyzed systems. Thus, the more stable and shrewd the referential eye focused on nothing is, the clearer and richer the picture of the world arising in the complementary eye and the resulting awareness of the qualities and virtues in this world, as opposed to the trifles and vulgarities, will be.

Thus, I love to emphasize that whenever I find myself immersed in a common communication, I never surrender myself thoroughly to it. Rather, as the surrealist painter, Max Ernst pointed out upon his attempt to explicate the view he had held on the best way of world-viewing, 'I believe the best thing to do is to have one eye closed and to look inside, and this is the inner eye; with the other eye, you have it fixed on reality, what is going on around you in the world'⁷³³. Therefore, as Max Ernst and the broader skies of the Way of Love inclosing us would have it, I have one of my imaginary eyes vividly follow the semantic contours it co-creates in real space, while my other eye focuses inwards and plunges into the silence of being, creating the impression of deep, but sane loneliness and utmost intimacy with myself even in the most gregarious of social settings. Instead of adversely interfering with and diminishing the role of its complementary, wide-awake eye focused on external impressions, this referential, inner eye fosters its antagonist's sensory sensitivity and effectiveness in discerning the information reaching it from the outer world. This is so because the difference between (a) the variety and intensity of the

perceptually derived impressions and (b) the levelness of the referential sound and space of nothingness inside us defines the magnitude of wonderfulness of the world as it unfolds before our eyes. Essentially, that is what the Way of Love has taught us too: to be immersed in careful exploration of the finest details of the world and yet to dwell deeply inside our own heart and mind wherefrom the utmost sources of our creativity shine forth. It is only in preserving this partial silence of our being by continuously dwelling in it that we have the chance to awake the placid and blissful consciousness, just like the one depicted with a nimbus of radiant light around the heads of angels and saints.

Think, then, of the One Ring around which the entire legend of the Lord of the Rings revolves. Neither had it given its wearers the colossal power of omniscience nor superhuman strengths, but allowed them to, simply, become invisible, implicitly telling us that making things disappear in the blink of an eye can sometimes have a more intense effect than having those very same things stick around for centuries. Remember this when beloved souls depart from this planet and you wonder in tears why it must have been so; for, by being lifted up into the sky, their presence on Earth and an effect on enlightening your paths might become million times brighter than if they remained in your proximity for many years to come. Drawing this parallel with the plot of the Lord of the Rings has always made me wonder how great the powers gained by relinquishing our thoughts would be, be it by resisting to explicate their most precious offspring externally or by performing an instant erasure thereof whenever they pop up on the screen of our minds. This, I know, would make the spirit of Swami Sivananda, known for his believing that one has to ‘unmind the mind’⁷³⁴ before one can transform into a channel for the transmission of divine energies between Heaven and Earth, smile silently, like the Moon, above our heads.

Undergoing various ups and downs in life, one year hanging out among clouds with winners and riches and another year sliding into gutters with beggars and sannyasins has taught me that for as long as we cling onto material possessions, for as long as we are burdened by the myriads of belongings and stifled by the loads of attachments, we can never grow into a Christ-like creature capable of making magic and moving mountains with the sugary shrugs of our shoulders, and only when we give away everything we have held onto can we become a soul that shines and enlightens the dimmed souls in our proximity. Similarly, only when we vacate the atria of our mind of all the unnecessary thoughts could we hope to make it into an apparatus that transmits the rays of sheer heavenliness from some divine heights and drops them onto the wretched face of the world. The whole concept of fasting, intrinsic to the Orthodox Christian tradition, thus becomes meaningful not only as a way of purifying the body, but of maximizing the amount of useful impressions that we can absorb as well. In the end, we have all probably experienced a situation in which too much of a good thing eventually makes us feel dull and drained. Should we spend too much time immersed in the informational variety of beautiful paintings or musical pieces, our eyes and ears would become saturated with an enormous amount of impressions, and after some time we would not be able to distinguish and absorb their aesthetic features anymore. Occasional resting of our ears and eyes from many consecutive hours spent in analyses of artistic pieces is thus essential in sharpening our abilities to sense beauty and find a spontaneous emotional enjoyment in the works of art.

But the same effect of the gradual numbing of our aesthetical senses takes place in the ones who are from the very start disinterested in getting acquainted with the works of art and in tracing the streaks of beauty in the worlds in and around them. So, a fine balance between cognitive variety and meditative nothingness has to be precisely maintained in order for us to be able to continuously nurture our spiritual wellbeing. As the blind spot effect has already suggested, moving away from certain beings and places is sometimes the best way of knowing them better. Similarly, an immaculate happiness that makes our exalted spirits soar in joy cannot be conceived of nor attained without a corresponding dose of

intellectual and emotional emptiness, disburdening in nature. Thus, no matter how wasted the moments of spiritual boredom may seem to us and how badly we try our best to avoid or overcome them, their purpose for our inner growth should be carefully kept in mind in view of the points discussed here.

After all, whatever the way in which we interpret our experience, a point of reference has to be conceived of in our minds. Accordingly and roughly speaking, we have a choice of whether we want to look at the world from the reference point of a majestic abundance of things and impressions, or we would rather indulge into a pure nothingness and observe life thereupon. This choice has a parallel in the popular saying that a semi-filled glass of water can be seen either as half-empty from the perspective of expected abundance of things or as half-full from the point of view of anticipated nothingness. Whereas the former attitude predisposes us to form well-crafted critiques about the states of the world and outline the future paths of prosperity, it also inseminates in us the seeds of envy, desperation and everything else that proves the statement that ‘in much wisdom there is much grief’ (Ecclesiastes 1:18). The latter attitude, however, predisposes us to become humble, thankful and see a divine source of wonder in every detail of our experience. For, when we compare our experience with nothing, everything becomes a source of infinite wonder. Even the minutest speckles in the substrate of reality thus appear to us as a true miracle, and a speechless amazement and awe will entail every moment of our lives. Alongside being the key to physical vitality too⁷³⁵, this feeling of thankfulness underlying every aspect of our being and thought presents an impeccable foundation upon which the edifices of an angelic purity may be erected. It strews us with a glowing halo of love, the greatest protective shield and weapon that we can think of in this grievous world of ours. Feeling great should be, therefore, always complemented with feeling grateful, especially given that, etymologically, gratefulness may be the only emotion that has ‘great’ in it, albeit such that it does not make us not even a faintest bit haughty and arrogant. Rather, it presents grounds for sensing and acting suffused with great balance, prudence and care.

If we were to contemplate long enough over the symbolism of this great Y, we might be prompted to realize and then loudly proclaim that living the question is the best answer to the question itself, specifically the divergence of unities into pairs and then multiples of branches that this symbol is emblematic of. The dialectical nature of the planetary development, in which only confrontations between theses and antitheses, light and darkness, order and chaos produce the paths to the syntheses of novel, enriched organizational states stands as the reason behind. In fact, the Greek word for separation – *krisis* – can be seen as lying at the root of the word ‘cross’, whereas the Chinese ideogram in which the signs for crisis and opportunity are inextricably entwined tells us of an everlasting and omnipresent encounter of these two aspects of life within every form of progress, individual or collective, that we can conceive of.

This inherent dialectical nature of human being is maybe best reflected in the biorhythmic shifts between perfectly harmonious moods and imbalanced and agitated states of mind and body. ‘*Homo sum: humani nil a me alienum puto*’, wrote down the Latin poet, Terence, reminding us that appreciating the value of every state of mind and emotion that typifies humanity is the sign of one's greatness in spirit. It To one such enlightened mindset, the vilest emotions, such as greed or wrath, appear just as human as the bliss-bearing ones, such as love and grace, and it perceives beauty in all of them equally, having compassion with those who suffer under the burden of the former and happiness for those who fly on the wings of the latter. Even more so, ‘whatever you do, whatever you say, know it's alright’⁷³⁶, they may whistle underneath their breath, knowing that through releasing one's being to the waves of these alternating emotions, one gets to open the door to the enlightenment of one's senses and be carried to the most exotic existential lands. And perpetual shifts between these states is something that is not solely under our own control, as evidenced by sudden and inexplicable mind-opening experiences through which we seem to sense an enlightening connectedness of things at a higher plane compared to the one

on which our senses and our perception ordinarily dwell. But to a mind that inhibits these natural swings of emotions, from the subterranean to the sublime and back, the protrusions into such otherworldly mental states wherein everything seems connected and erupts with a holiest bliss may be permanently closed. The Serbian novelist, Borislav Pekić, identified these unpredictably occurring, translucent states of mind as mystical stations on our life path. As long as we ride on a fast train, the image that we see through the windowpane seems blurred, and only when we reach the station, we get to recognize the external landscape in fine detail. The same could happen with our rides on the rail of life when in each one of these ‘stationary’, truly meditative moments we seem to be able to penetrate directly to the all-encompassing substrate of the Universe. I believe that each one of us has the potential to experience those moments, at which it seems as if the time suddenly stood still and one is left alone, absorbed in the everlasting cosmic silence. These rare instances resemble the filmed lifespan of George Bailey, the main character of the Frank Capra’s movie classic from 1946, ‘It’s a Wonderful Life’. Namely, the brief projection of his former life develops with an almost continuous pace until a significant moment arrives, followed by sudden freezing of the image on the screen. Human memory may work on the same principle, that is, by capturing a series of still images related to certain events from the past rather than a continuous stream of action. This may also explain the reasons behind the great success with which comic strip artists are able to lively depict events using only a limited number of framed drawings. With the passage of time, of course, these memorized series of images become ever scarcer, all until only one or a few are left to describe certain events or epitomize very long periods of time, as we introspectively try to dig through the microcosmic space of our mental sphere.

And when we deliriously discover Zuzu’s petals in the hidden pockets of our mind and humbly release the sighs of thankfulness for the perfection and divinity intrinsic to our world of imperfections and mistakes, the way that it is, we may know that we are on the right way. Thus, we can recognize that all human qualities are born out of an interplay between darkness and light, disharmony and harmony. Knowing that every difficulty in life is but a stepping stone for the continuation of the never-ending evolution of life, we could go ahead and twist and turn our existence and our epistemologies until they comply with Nietzsche’s dialectical imperative: ‘When, however, ye have an enemy, then return him not good for evil: for that would abash him. But prove that he hath done something good to you’. Henceforth, John Dewey supplied the following definition of aesthetics: ‘Only when an organism shares in the ordered relations of its environment does it secure the stability essential to living. And when the participation comes after a phase of disruption and conflict, it bears within itself the germs of a consummation akin to the aesthetics’⁷³⁷. Alternately sharing and breaking connections, getting close to others and retreating back to our own being thus signifies an eternal dance during which the music of the qualities of life evolves. Like a trampoline jumper who leaps upwards to reach out to the heavenly hearts and distance oneself from the secure epistemic grounds on which one has stood, though only to fall back to their safety net and then bounce back high into the air and drop down and so over and over again, so does a being living in harmony with the Way of Love tirelessly venture out into the unknown, towards others and away from the self, though only to return to the center of one’s consciousness with an ever greater insight, gain more speed circling around it and then become catapulted into some other faraway cosmic distances, and so on and on, as the music of life continues to develop into ever more magnificent harmonies and fill the darkest of the world’s corners and the narrowest of its alleyways.

The first time I walked through San Francisco’s Buena Vista Park brought a moment of sudden and strange inspiration. Trying to find out the reason, I noticed that unlike most other parks, in which all the signs of dead plants and stems are immediately cleared up, I happened to be surrounded by a wonderful mixture of life and death, like the travelers through Jacob van Ruisdael’s Large Forest that hangs in today’s Kunsthistorische Museum in Vienna, passing through a landscape where ‘freshness and

vitality coexist with dryness and damp decay; next to leafy boughs, bare trunks, next to light, shadow⁷³⁸. As trees in lush and their dead branches lay together, it also brought to mind the comment made by loquacious Uncle Monty in *Withnail and I*, as he and his obnoxious guests from Camden Town roamed around the English countryside: ‘There can be no true beauty without decay’. A stroll through this scenery aroused me to think about the dialectical nature of the evolution of life, according to which the risings of the most peaceful and of the most frightening always proceed in parallel. ‘There’s more poetry in a single tree that’s survived many years and seasons than in the façade of a palace; a palace must be in ruins to evoke any interest’⁷³⁹, Diderot commented upon seeing one of Hubert Robert’s paintings wherein, as ever, demolished cathedrals and chateaus occupied a central place. And, indeed, all around me on that day stood a monumental proof that ruining and efflorescing cannot be but coupled together.

First of all, should there be no remnants of the dead trees, no food for the living ones would be there either. And there is something of an everlasting significance in this observation, which makes it applicable to numerous other circumstances. For example, we all know how being in company with books that describe historic events and thoughts establishes pillars of wisdom in us, just like encounters with the signs of evanescence of life do. Even then, we should recall that the brief history of humanity remembers two kinds of people: murderers and the ones who stood against, as the mural on San Francisco’s Haight St. tells us, pointing to one more perspective at the all-encompassing dialectical nature of progress in the world. Along this path of progress we see the moments of desperate sadness and bright wisdom alike, reflecting from each other as the theses and antitheses in dialectical patterns of reasoning do. It was with having the latter in mind that Alfred North Whitehead commented that ‘in formal logic, a contradiction is the signal of a defeat: but in the evolution of real knowledge it marks the first step in progress towards a victory’⁷⁴⁰. Thus, the tendency of our civilization (mostly evident in the so-called developed societies) to deprive children of any encounters with seemingly horrifying dead and decaying patterns of being might be fallacious, as we then simultaneously deprive them of the chances to develop an inner compass that looks after the signs of wisdom in the world around at an early age.

Essentially, with a little bit of imagination we could realize that these elementary polarities of life resemble railroad tracks for the passage of evolutionary trains. Along them, however, trains can pass only so long as the two rails hold each other at a precise distance. Neither too close nor too distant they must be. Mirrored in the tears of repentance that brighten our eyes and spirit, the leaps between the two are the ones that present the links that tighten these railroad tracks, making the passage of the train of planetary progress possible. The ability to immerse oneself into a state of repentant devotion of the Divine is vital in enabling the wide swings between imbalanced extremes, as explained in the section on the middle ways and the art of balancing imbalances and *vice versa*. And the wider these oscillations across the line of balance occur, the larger the potential for the propulsion of both ourselves and others - to whom our creativity is oriented - towards the evolved states of body and mind.

Jesus allegedly loved human beings more than any living creature on Earth did, and yet he normally spoke to them and of them with a kind of severity, resentment and disgust. Once he entered a synagogue overturning the tables and scattering the coins of money changers and sellers who, by his very words, turned a house of prayer into a den of robbers (Matthew 21:12-13). Even when he spoke to his most faithful followers, his stance bore resemblance to a cumulonimbus from which lightning flashes emanate and hit the surrounding souls so as to crack them open and allow for the nectar of love to be poured straight into their hearts. His attitude neatly reflects a fundamental dichotomy between light and darkness that seems to be the only one that could give rise to a profound enlightenment, a firmly rooted bird-flight, so paradoxical and yet so typical of humanity and life. Spinoza observed that ‘even as light displays both itself and darkness, so is truth a standard both of itself and of falsity’⁷⁴¹, showing us how

every Yes comprises an implicit No, how every judgment of what is good and beautiful implicitly points out what is bad and ugly, as well as how each key unlocks a door or decodes a closed passage of being or thought, but it also ‘confirms a prison’, as T. S. Eliot noticed in the Waste Land. This inescapable nature of reality where every affirmation conceals an implicit negation and where every path to freedom is also a prison cell of a kind has found its reflection in the popular verse of a Hawaiian traditional song: ‘If in the word is life, in the word is death’⁷⁴². Buddhist philosophers have certainly known about this dichotomy which dictates that every attempt to foster or emphasize only one of the poles in question results in an inescapable emergence and accentuation of its polar opposite. Hence, they have proposed an eternal silence and glorified the nihilistic attitudes of not-being, not-knowing and not-acting.

Sometimes I maintain that the right way of performing physical exercises leads to the loss of feeling of the body. This is when we become as light as a feather or akin to a bird in its carefree flight. The correct way of thinking, in a likewise manner, leads to a loss of thoughts. Instead of uncontrollably spinning endless streams of thoughts as if running through an unsolvable labyrinth of mental streams, like the devil from John Milton’s Paradise Lost, the thoughts in our mind may thus become as light as a summer breeze under a bright sunny sky. The right way of talking leads to the termination of all talks and awakening of the divine, pleasant and mild silence of understanding. And so on. But still a massive question remains. If our body and mind become such, perfectly harmonious, could there be then the light of our being to feed the world? Could there be a shining light without the fire? Would we then become somewhat like the already mentioned ‘bright type who could never describe night swimming’? Wouldn’t we then turn into a crystal, the simultaneous epitome of perfection in the materials science world and of infinite coldness and monotony? For, my deepest conviction has been that erroneous elements of my lifestyle, behavioral traits that called for raising toweringly high weeping walls and repenting before them in prayer day and night, have provided an essential spur for my creative insights that have been transfused into ethically and aesthetically sublime thoughts that adorn this and other books of mine. Standing in an autumn alley, faithless, crooked and beady-eyed, with the rains of the world sliding down my forehead, I may thus distantly evoke the thought of Tennessee Williams that I found written on the wall of a restaurant called Credo in downtown San Francisco: ‘I believe that writing is a purification of that which is sick in the person’. In order to write well, therefore, one has no other choice but to live an inherently dishonest, hypocritical life, preaching by the pen about the beauty of the life on a starry train, while never hopping on it and merely watching it whizz along with a whistle from the dark corners of reality. Was it for this reason that the Christ in his street sermons implied that every scribe is by definition a godless hypocrite (Matthew 23), I wonder? Conversely, another eye of mine would rest its gaze on the memory of the moment when the protagonist of a Spike Lee joint, the Broadway musical Passing Strange, having found himself in a niche wherein everything had begun to pulsate with sheer perfection, lays down his lute and asks his muse how in the world he could come up with a song in a paradisiacal place like that, highlighting the mental, emotional and physical torments as the causes behind the cracking of our body and soul, the release of the underlying sunshine of the eternal spirit through these cracks and its spillage onto canvases, tablets and notebooks. And so, as I stand in those dim and sloughy desolation rows, watching the world go by like a merry-go-round, I worry not, for I have known that such, like a rainbow, formable only where sunlight and rains collide with one another, is the spirit of all the minds that bear otherworldly beauties in this life. Aren’t all creative spirits around us then similar to ‘the spark seized by darkness’⁷⁴³, as the Montenegrin poet, Petar Petrović Njegoš put it in his elegiac homage to the battle between godliness and demonism that rages within souls that stream towards saintliness and eternal salvation? Could there be then any creativity without fundamental erroneousness of our beings? Hasn’t committing a mistake first, deliberately or involuntarily, and then recognizing it and formulating a code that would enable both myself and others

to transcend it in future and achieve more elevated and angelic levels of being been the route for deriving every single thought impressed on the pages of this book? Isn't then a clash between darkness and light the one from which the rays of creativity emanate? Needless to say, such and similar questions and questions on these questions by means of which we, dizzyingly and perplexedly, advance forward in a spiral shape, like a pirouetting ballerina, making two steps forward and one step backwards, rather than marching to the beat of dogmatic determinateness by being in favor of one poles and coldly stomping over their complements, is a sign that we follow not the way of the mammon, but the way of the stars.

The world at the level of its invisible essence can be seen as an incessant battle between intentions and emotions that radiate from the depths of the hearts and minds of sentient creatures. In that sense, particularly interesting for the philosophers are those that are pure and benevolent inside but somehow manage to produce fallacious deeds in the world around them as well as the Mephistophelian ones that stem from evil grounds but nonetheless initiate the resurrection of goodness all around them. At the social scale, think, for example, of a crude capitalist setting wherein everyone works for one's own benefit only and grudgingly, driven by greed and vanity, sees everyone else as an enemy, yet his actions on a broader scale contribute to the creation of a relatively peaceful and prosperous living environment. Then think of a social setting similar or identical to my native one, wherein the spirit of comradeship abounds and all is done with the benefit for another in mind, yet the social system as a whole continuously degrades and becomes tragically backward compared to that of its capitalist counterparts wherein every soul is alienated from its neighbor. At the personal level, one could think of a hypothetic circumstance in which an open display of maliciousness serves as an instructive negative example, preventing the future fall from grace of a keen observer. In contrast, one could also imagine an exhibition of an utmost benevolence in a setting that already has it in excess and is completely bored by it, yielding an incentive for actions that break this stale state of lackluster and lukewarm goodwill in the air with a little bit of devilishness. In that sense, we could never be sure if we contribute to goodness on the global scale with our benevolent deeds just as much as we should think twice before we judge another for the display of maliciousness, for it might turn out to have led to the rise of something holy and angelical in the world around it. This, the wise men may say, is not so bad because it lets all things self-conceited and sanctimonious in us cede place to things humble and meek, as the reason to judge vanishes and the reason to love reinstates itself. And whatever the solution to this paramount ontological problem is, if any, as for the acts leading to hell on a road paved by good intentions, the saint in us is free to believe that the qualities of our aspirations, not the visible features of our actions, are those that define the true qualities of our deeds, so that, even though the outcomes of our actions may appear all failed and fruitless, somewhere deep inside of them they might still hide the seeds of beautiful aspirations from which they have arisen, unceasingly inspiring the world at its invisible essence despite their seeming unsuccessfulness. In the case of the acts that arise from that Mephistophelean 'power which forever wills evil and forever works good'⁷⁴⁴, the dialectical nature of the evolution of humanity and the Universe may explain how sometimes even malicious intentions may spur the origins of heavenly goodness. For, the whole world may be seen as an endlessly evolutionary game of mirroring the opposing aspects of life.

The great dialectical nature of the evolution of life, knowledge and all other epistemological and ontological patterns is reflected in this magnificent Y. And, perhaps most importantly, this inherent dialectics of it all tells us that, in accordance with the ancient verse from the Bible, 'He that pricketh the eye will make tears to fall: and he that pricketh the heart maketh it to shew her knowledge' (Sirach 22:19), all the undesirable events and states of being eventually turn out to be sparks that produce good and benevolent deeds and that, at the end of the day, they are to be loved as much as those that are good

both on the inside and on the outside, that is, both at the point of their origin and at the horizon beyond which their effects on the world cannot be discerned anymore.

To illustrate how bad events in our lives can present immaculate and precious guiding signs we can be reminded of a story in which a sage decided to punish a young kid for no reason whatsoever. The child firmly kept the remembrance of this event throughout his entire life, and one day, lo, he became an emperor of that same country in which the sage happened to be living. One of the first things he decided to do as a king was to invite the sage and ask him why he had punished him for nothing at all. But the sage replied, 'See, when I did that, I had already known that you were to become a king. And the injustice I did to you has been ever since with you so as to remind you how terrible and unfair it was so as never to be repeated again during your reign'. For, as we are also reminded by the strong and courageous man from a Sheldon Silverstein's poem and a Johnny Cash's song symbolically recorded in San Quentin Prison⁷⁴⁵, who thanked his father for deliberately giving him the name Sue to encourage him to counteract its soft and flaky connotations with every second of his life and become resilient and powerful in stature and spirit thereby, favorable traits in our world are often created by cleverly pollinating their very opposites, in spite of the shock that such a risky approach tends to spark in the shortsighted ones who judge about the human acts based on their surface only.

These stories teach us that it is impossible to demarcate obstacles, problems and injustices posed on our ways from sacred touches and guidelines that spur our spiritual and humane development. Whether we are being carefully chiseled into an extraordinary piece of art or ground into pieces by hysterical and nihilistic hands is impossible to tell from the perspective of a rock until the work is finished. One thing is certain though: as Orpheus notices to Heurtebise under the attack of false poets in Jean Cocteau's classic, spiritual and physical pain arising from the sense of being condemned and punished follows both of these processing routes. For, as the folk wisdom puts it, 'if you want to see the rainbow, you better put up with the rain', and all that while letting the sunshine of joy and optimism steadily pass through the teary veil of sadness created by the rain, as I, myself, add up to this traditional saying.

Hence, if we want to see rainbow in the landscapes of our mind, only a bright Sun of hope, faith and love emerging behind the tears of repentant devotion could give rise thereto. And only an oyster that entraps an irritating particle of dust can form a precious pearl within itself. That is, only when faced with problems, obstacles and perplexities do our minds get the chance to progress into dazzling emanations of the divine spirit.

A story from the Old Testament tells us how when the first Israelites arrived to the Promised Land, they did not immediately rejoice nor got exalted and loudly proclaimed that it was the place that would bring the nation of Israel a long-lasting happiness and fulfillment as a society that it had sought (Numbers 13:33). Rather, it is said that these pioneers saw giants living on this new land, became scared down to their bones and turned back, ready to run away and return to their previous abode. There is no doubt that similar impressions of insecurity and fear would arise in our minds as we step onto the promised lands of some of the most significant and enriching situations in life. But if we want to overcome our deepest fears, we ought to know that the only way for doing so is facing the experiential patterns that have caused them. It is because the intensity of our fears is often directly proportional to the significance of the achievements that these fears conceal.

In that sense, we should be aware that even though 13 is the number many people routinely avoid, including the superstitious San Francisco urban planners who renamed 13th Avenue into Funston Avenue and the builders of many notable Chicago skyscrapers wherein the 13th floors went completely missing, it is the numerical epitome of both liveliness and decay, as Lao-Tzu observed (Tao-Te-Ching 50). It brings to mind the image of the Christ surrounded by the apostles and the number of lines on the

Emerald Table, aside from innumerable other symbolisms it may invoke. As I received an NIH award that enabled my transition to professorship at a North American University by funding my research on alternative approaches to treat osteomyelitis, I curiously looked back at the fact that bone infection left a permanent trace on my yellow tooth No. 13 and wondered how bravely plunging not only into waters of past sufferings, but also into smallness symbolized by teeth and stellar signs hidden behind gates superstitiously avoided by many, symbolized herein by the number 13, may be an ultimate key to success in life. For, narrow gates and abysses, from which mediocre minds heedlessly run away, are those that lead to life and conceal the glow of truth, as the Christ (Matthew 7:13-14) and Democritus would have had it, respectively. For this reason, the tendency to superstitiously read the features of external reality should cede its place to an awareness that the guiding lights that lead us to the promised lands of our dreams lie solely in our hearts. Without the reference to our deepest aspirations and visions, it is impossible to demarcate the meaning of the signs that appear in front of us in the course of our lives. And this is exactly what the great story of life teaches us ceaselessly: bright wishes and ideas produce corresponding effects in the world of our experience. By preserving beautiful intentions and aspirations within our minds and hearts even the darkest and hopeless situations will start shining or sympathetically blinking with the way out. Even our dreams during sleep do not point to any prefixed paths of destiny in a superstitious manner, but present reflections of our deepest aspirations, intentions, desires and fears. What swirls at the bottom of our heart is, in accordance with the co-creational thesis, reflected verily everywhere in the subject's world of experience.

The entire human wisdom can thus be seen as arising in glorious columns from the melting pot of passionate problem-solving attitudes rooted in the subconscious underworlds of the human mind. One of the problems that occupy our creative attention certainly belongs to hardships and agonies immanent in this world. These afflicting events invite our hearts and minds to step on the path of a thorough devotion of every minute thought of ours to find the way to instill an ameliorating harmony into them. The extent to which we are ready to selflessly burn with the desire to send all our angels to the desperate and lost ones, to pray with all our hearts for their blessings and make the attempts to bring down the stars from the sky for the beings we appreciate, signifies the extent to which the road for the inner evolution of our being is open. And if we believe that we can reach the stars from the sky and place them on the palm of the hands of the creatures we love, then whatever we do on top of this faith will spontaneously bless the world with an invisible bliss and purity. Faith, hope and love posed as the bridge between the outer raging coasts of disharmony and troublesomeness and the inner visions of sunny seashores of peace and harmony make the world truly evolve in its spinning course during which sunrises and sunsets, mirthful beginnings and sore endings, are always perfectly balanced.

Thus we come to the beautiful glances of the Holy Mothers painted upon monastery murals, with one eye shining with an unfettering and profound joy, and the other eye shedding tears of a deep and profound sadness of compassion. This blend of grievance and joy, of meekness and ecstasy, of graceful humbleness and a shining glamour, may present our, purely Christian ideal, along the way. And that way takes the divine in us down, handing the hands of its grace to the troubled waters of humanity, and ascends the humanly fragile in us up, towards the placid clouds of a sublime eternity.

The metaphor of two wolves

‘Where there is much Light, there is deep Shade’
Johann Wolfgang von Goethe

Some things in life do not seem to be able to exist in their halves. For example, you cannot have half-a-star or half-a-man. Chuang-Tzu once mentioned that ‘if there had not been you, there would not

be me either', perhaps wishing to tell us that feeding Thou is the only way I could be profoundly fed too. In concert with the co-creational thesis and the Philosophy of the Way, Martin Buber would complement this saying with an explicit reminder that the meeting of two souls is the precondition for any theology, philosophy or physical existence to emerge. Such may also be the situation with love and misery that we witness in this world. Could there be grace without gravity? Maybe gravity and hardships are necessary to give rise to the wonders of an ascending grace. But I may also ask a more optimistic question: could there be gravity without grace? Equally No, as these earthly and heavenly forces are giving rise to the powers of life wherever they meet each other.

There is an old Indian story about two wolves, a good and a bad one, hidden in the depths of the human soul. When a wise Indian told his son about their incessant battle in each one of us, the son asked him who was going to win. 'The one whom you feed', gently replied the old Indian. I have heard this story many times, but I have always felt as if there was something missing in it. Therefore, I thought and thought about it. And then, one day, it came to me. I realized that this battle could never be ended because these two wolves essentially need each other for their own growth and survival. As ever in the battles of life, triumph is a false notion, as every triumph is also a loss, whereas, on a more optimistic note, every loss is a triumph of a kind, too.

First, imagine that one of them is an absolutely good wolf, while the other one is an utterly bad one. If I give my food constantly to the good wolf, would the bad one be starved to death? No, because the good wolf is perfectly good, and he would always share his portion with the hungry wolf, irrespective of how evil he is. Eventually and hopefully, his decision would not turn out to be a self-destructive one. For, by preserving the bad wolf, the good one has a chance to exercise his fighting and surviving skills and thus learn to become stronger and more powerful. So, the bad wolf would be always preserved, no matter how much we get to feed the good one. But what would happen if we erroneously decided to feed the bad wolf with our malign intentions and acts? It seems that the absolutely bad wolf would not hesitate to destroy the good one if all the food would be given to him solely. Though even then, I believe that the seat of the human soul is reserved for the sprout of goodness that could never be erased.

No matter how somber the clouds that cover the canvas of our mind become, there is always a hope that somewhere deep beneath, the Sun of one's divine soul shines. Its rays simply do not seem to be able to penetrate through the clouds of hatred, despair and gloominess of one's thoughts. But the eyes of enlightened ones can always recognize these sprouts of heavenliness concealed in every single worldly being.

Therefore, when we know that the forces of darkness and light mingle inside every soul in sight, we can always selectively discern one or the other and inspect them with care. However, as we choose solely the divine features of a human being to rejoice in, we ought to remember that their existence is possible only insofar as their Mephistophelean antipodes reign inside that very same being. Many are, therefore, extraordinary people, myself included, who have been criticized for their difficult traits, when in reality they ought to be thanked for harboring these traits because without them, there would be none of their exceptional talents and skills either. Or, as Tennessee Williams put it in an interview to Playboy from 1973, 'If I got rid of my demons, I'd lose my angels'⁷⁴⁶.

It is for this reason that intensification of enlightening forces in us seems to always proceed in parallel with the empowerment of their opposites. Quite likely, this is the message that Ildikó Enyedi wished to convey to the viewers of her film titled 'My 20th Century', whose plot revolves around twin sisters separated early in the childhood, one of whom would go on to become a social activist and a revolutionary and the other one of whom would turn into a frivolous and materialistic cheater and a crook. The 20th century and modern times in general have indeed been such that they have elicited the

most and the least humanistic from people, more than any prior period in human history, leaving us, the philosophers, with the question of whether we would ever be able to bring about one, ideally the divine, without the other, the demonic, or one such task would be equally impossible to perform as the alchemical transmutation of lead into gold or the assembly of a machine for *perpetuum mobile*. Most likely, as the final shot of this film alludes to, sending the camera on a ride in a canoe across a thin sunlit strip of a waterway trail, in-between two shadowy coasts, the most harmonious is the middle road whereon the antipodal forces in us are kept in balance. This is how the eye of the camera in this film reaches the bliss of the open sea and this is how we, perhaps, may reach the state of oneness with all that there is: by finding beauty and utility in both the good and the bad wolf.

The story about the two wolves, the white and the black, which, as my Mom used to say, would alternately show their faces on the surface of my complex being packed with all kinds of controversies and crucifying opposites, resembles another Indian story, the one told by Lucy Morgan to her father, Eugene, in Booth Tarkington's *Magnificent Ambersons*. It is a story about Vendonah, allegedly the vilest Indian chief that has ever existed and who had a habit of wearing iron shoes and stepping on people's faces with them. One day, his tribesmen contrived a plot to put Vendonah on a boat, then seize the paddles and slide him down the river. They did so and their chief, indeed, never came back. Then the tribe gathered and went on a search for a person to replace their former leader. Yet, they never could find it and the feeling was left in the air that Vendonah was exactly the leader that they, the way they were, were meant to have. As both of these Indian stories instruct us, anytime we come across a thing, an event or a way of being that irritates us, we should fight the urge to eradicate it. Because something beautiful in the living order thriving only insofar as these repugnancies exist is then bound to disappear too. We, ourselves, would then end up sitting befuddled beside withering sunflowers with lowly hanging heads, wondering how in the world we could have forgotten to let the wheat and the weeds grow side by side until the day of the harvest (Matthew 13:23-30).

Communicational and evolutionary ambiguities springing from the co-creational thesis

'If I could tell you what it meant, there
would be no point in dancing it'

Isadora Duncan

There is a whole range of communicational and evolutionary ambiguities that spring from the co-creational thesis. First of all, as each detail in the world of our experience, from the perceived objects to abstract thoughts to all other conceivable physical features, can be realized as the product of the co-creative dialogue between the subject and his environment, every communication in the world of ours inevitably comprises the elements of expression and interpretation. Without either of the two, not a single communication could be imagined.

As a result, each expression of ours is never the same in minds of the others as is our own impression thereof. Whatever we say, others partly adopt in an 'objective' way, but partly subjectively construe; which is, of course, the background of many communicational misunderstandings. For example, if we kindly step aside on the street to make a way for another person, that other might either acknowledge that as a gracious act or interpret that as a gesture of repugnancy. This is, of course, often dependent on the cultural background of the given circumstances, as, for example, opening space without grazing another person is seen as a sign of kindness in North America, whereas mildly leaning onto another person on a train or brushing against him/her when walking by may be recognized as a sign of sympathy and graciousness in southern Europe. Furthermore, moving away from a person we sit next to and into an emptier part of the train car is seen as a polite act in the North American culture, whereas

it may be considered utterly rude in most of Europe and many other parts of the world. An American visitor to a Buddhist monastery, accustomed to the informal etiquette in the West prescribing that a newly arriving person in a public space sits as far as possible from others occupying it, was greatly surprised when she realized that a Vietnamese nun sat down right beside her in an otherwise empty cafeteria⁷⁴⁷. To this nun such a habit of hers would seem not creepy and inconsiderate, as it would to a stereotypical westerner, but quite the other way around: as the only genial way to live. On the other hand, chance is that if she had witnessed the western custom of sitting as apart from others as possible, she would see it as a sign of the cold and desensitizing, spiritually deadening way of life that the modern life heedlessly rushes itself in. Then, being all smiles is considered as grounds of a normal communication in North America, whereas I witnessed on my own skin how poverty and devastation could yield a society in which smiles are seen as abnormality, as informal indications of being ‘under influence’, or as signs of sheer scornfulness. Thus, if one were to approach a post office clerk, for example, in America with a frowned, fully focused face, the clerk would most probably be upset and frightened and if one were to approach her with a subtle smile on one’s face, the clerk would take it as a polite gesture, but this would be interpreted quite the other way around in my home country, where the frown would be taken as a gesture of graveness, loyalty and trust, whereas upturning the corners of the mouth would be taken not as a sign of smiley sympathy, but as a sneer sending the message of derision, mockery and suspicion. Moreover, repeatedly saying ‘thank you’ is considered as polite in the former part of the world, while exclaiming it too many times can be seen as clichéd, insincere, phony and thus inherently unkind in my native country. Clinking glasses during a toast and failing to look the other person in the eye is considered a gesture as inhospitable and unsociable as it can get in my home country, whereas making eye contact as the glasses tinkle is thought of as a bit creepy and over the limit of appropriate social propinquity in the UK. A Mancunian transplant in Rio de Janeiro was further surprised to learn that by arriving on time to a house party he made an embarrassing *faux pas* and almost offended the host, not knowing that being punctual on this occasion and adhering to the so-called ‘English time’ is often considered straightforwardly rude in Brazil, where allowing the host more time to prepare for the party, in case she was running late for one reason or another, is perceived as a gesture of politeness⁷⁴⁸. Entering a public swimming pool without taking a shower first would be denounced as a caveman act in most places in Europe, even though it is customary in the United States, despite the history of massive polio transmissions at especially swimming pools in this country. This is not even to mention how eating from a plate placed on the table is regarded as akin to ‘the way dogs eat’ in China, while eating from a plate held in front of our chests is seen as crude and unseemly in the Western world, or how calling a food chewy attributes it with a highest quality possible in the former cultural milieu, whereas the same epithet is an informal synonym for insipidity in the latter, let alone how spitting on the ground or, even worse, into a kitchen pot is seen as disgusting by the Westerners, whereas the habit of spitting or blowing nose into a handkerchief that is to be put back into one’s pocket afterwards is seen as equally repugnant and unhygienic by the Orientals⁷⁴⁹. Further, the finger sign formed by overlapping the thumb and the index finger is used as a symbol of the heart in South Korea, whereas the same gesture in Europe and America signifies the craving for money, thus causing vast misunderstandings when it gets to be expressed from within one culture and interpreted from the prism of another. In North America, then, the drivers stopped by the traffic police are not to get out of the car under any circumstances, lest they be momentarily treated as criminal suspects, whereas in Serbia it is customary for the drivers to promptly get out of the car and greet the highway patrol. Should they stay in the car after being pulled over, they would be perceived as if hiding something or being possibly too drunk to walk out, thus raising suspicion and prompting the cops to do a thorough search of their identity, blood alcohol levels and the car content. Likewise, although this is mostly culturally independent, if we maintain the practice

of referring to our self as a part of exerting any opinion, such as through stating ‘I think...’, ‘It is my opinion that...’, ‘In my world...’, people will have the freedom to consider that either as a fair and self-responsible practice or as a pretentious and egotistic manner of exposing oneself. Like the judge who accused a sorority sister in the court of selfish inclinations because of ‘mentioning ‘I’ fifteen times in four paragraphs’⁷⁵⁰, some would find such a habit of incessantly referring to ‘I’ repugnant and decadent, whereas others would find it inherently constructivist and utterly moral in a world drowning the unique self in an impersonal, objectivist universe of ideals and values. Those who would hear the screams of selfishness in the Rorschach test of Šarlo Akrobata’s *Niko kao ja*, a punk song whose only lyric is ‘no one, no one like me, and no one like me, no one ever like me, and no one and ever like me’, would undoubtedly be those disparaging such self-referential statements as inherently egocentric, whereas those sensing in this song the youthful, energetic wonder over the uniqueness of every living creature that has ever adorned the Earth with its presence and a rope to hold on to during an introspective dive to the seabed of one’s mind, the bouncing from which and onto the surface of one’s being with the treasure in one’s hands would deliver the most inspirational actions to the surrounding social scene conceivable, would fall into the category of those who are pleased with this practice. On the other hand, when knowledge is expressed in an utterly impersonal verbal style, without mentioning the subject once, as in typical technical writings, some would praise the style as enabling the ideas to be easily absorbed as personal because they have no other people’s personalities attached to them, while others would find it difficult to personally connect to them because of a bleak, dehumanized way in which they were expressed. In fact, if you decide to oust all judgments from your expressions, some may say that you would be *en route* to enlightenment, while I may bring to mind *Chronicle of a Summer*, one of the western world’s first reality movies, and particularly its ending where two of its makers, Jean Rouch and Michel Brault conclude that they wanted to make a film about love, but all they made was a film about indifference, a point that should resonate stridently in the heads of contemporary indulgers in reality cinema. Then, if I tell you that ‘life is but a dream’, merely so as to ignite sparkles of starry wonder in you and possibly enlighten your daily experiences, you can interpret that as a sign of my intrinsic religiousness, as implied by a higher reality that waking up from a dream leads to, or as a sign of my carelessness and nihilistic neglect of the importance and value of our moral decisions, which the state of dreaminess and abandoned reference to reality in our daily acting may imply. And so on.

These ambiguous situations reflect the same subjective/objective polarity existent within the roots of all other experiential phenomena and explained by the notion of co-creation. Therefore, the social communication presents only a special case of the general subject-environment interaction that the co-creational thesis takes into account. In it, the role of the environment belongs to the surrounding creatures. Inevitably, all the ideas forged in our minds are created together with others. Whether we browse through old philosophical books, get in touch with palpable products of human creativity, walk down the street immersed in our thoughts or exchange opinions with others by linguistic means or body gestures, the landscapes of our mind are being co-modified under the influence of others. In this co-creation of our thoughts and ideas, innumerable beings, if not possibly all the creatures that have ever lived on this planet, are involved.

For this reason, whenever we lay down our thoughts in the verbal form so as to communicate them to others, we should be aware that only a half of the creative process has been performed and that the other half, always changing and always volatile and unpredictable, will need to be carried out by the interpreter of these thoughts before their creation – that is, co-creation, to be more specific – can be considered complete. This explains why the writer, Donna Tartt said that ‘readers really participate in the writing of a book; as a writer I’m giving the reader signs to help create the story with me, but the reader is bringing his or her own memories, intelligence, preconceptions, prejudices, likes, dislikes, so

the characters in your copy of the book are going to look and sound different than in mine⁷⁵¹. Concordantly, one millennium earlier the Japanese poet, Saigyō observed the following: ‘Although I do write poetry, I do not consider it to be written poetry’. This makes full sense considering that the reader has yet to introduce a dose of subjectivity in the meanings formed in his mind based on the writings he has encountered, one may add. This is exactly why Hans-Georg Gadamer imagined every form of communication as a process of meeting and overlapping of a pair of hermeneutic horizons⁷⁵², the scope of one of which is defined by the breadth of expressions and the boundaries of the other of which are outlined by the broadness of the interpretational grasp. Both expressive and interpretative beings instill something of their cognitive essence into the eventually derived meanings and ideas that will, so to say, float in the space between them.

As much as it makes no sense to say that we can have a perfectly faithful, objective insight into ideas and meanings conceived by others, it is nonsensical to say that beauty is totally and solely in the eye of beholder. For, the world is neither a solipsistic nor an objectivistic dwelling place. We are instead on the way. And only through such ways of communication, the potential for emergence of the divine qualities of knowledge and life can persist.

Although this may not seem so at the very first sight, communicational obscurities arising from the inevitably imperfect transmission of meanings from one cognitive entity to another are directly in favor of the evolution of human knowledge and life. All languages, for instance, originate from misunderstandings in communication⁷⁵³. To exemplify this, we could imagine two people engaged in a common action without the use of language. For as long as everything functions fine, there is no need to say anything. But when one notices that there is a probability for the actions performed together to turn out wrong, the need to say something shows up as imminent. For example, if you and I get to carry a heavy object together, I would not need to say anything for as long as I see that we are succeeding in our projected path. But when I notice that you are approaching an obstacle not seen by you, I might decide to open my mouth and articulate a verbal sign or two. And indeed, if we were to look at our animalistic predecessors, we would come to realize that the earliest forms of communication used to be exactly utterances as signs of warning. Thereupon, we could deduce that misunderstandings, potential or actual, are the driving forces of every communication. Here comes the story about young Albert Einstein, who allegedly did not speak until he was five, at which point, one evening, at dinner, he mumbled, ‘The soup is too hot’, and when he was asked why he had not spoken until then, he said, ‘Because up to now everything was in order’⁷⁵⁴; later, this anecdote got converted to a funny story about a young Montenegrin, a member of the nation, like myself, traditionally derided in Yugoslav storytelling as work-shy, to say the least. ‘You look forward to the brilliant mistakes. Most changes in music, most exciting things that happen in music, occur through a miscommunication between people’⁷⁵⁵, Tom waits concordantly noticed, having joined for a second or two a ride on this majestic train of thought that says that misunderstandings are prerequisites for the evolution of anything in life. As a matter of fact, even babies, in my experience, babble most and learn how to use language best not in the situations in which their level of satisfaction is high, but in the moments when they are dissatisfied, misunderstood and reaching out for things that lie far from their grasp. In fact, around nine to eleven months of age, babies are known to enter a milestone in their cognitive development when they try hard to express themselves, but are unable to do so. This causes avalanches of frustration that befuddle most parents and gradually result in an insight that learning a human language presents more of a necessity than a deliberate choice in their little lives. Needless to notice, had they been capable of communicating their needs and desires perfectly well without ever learning a single conventional word, their linguistic development would have been brought to a halt. This also explains why twins usually begin to speak with each other much later than with other members of the family; namely, they understand each other too well to need the use of

language to facilitate this understanding and prevent the misapprehension of meaning, demonstrating along the way the role of language as a means, not the ends, i.e., as a Wittgenstein's ladder⁷⁵⁶ that is to be discarded once the stellar sphere of the deepest possible, nonverbal and purely spiritual communication is attained.

These musings bring to mind the memory of two-year old Theo, a preverbal toddler with the vocabulary of no more than ten words at the time, trying to utter the name of an object only when he was missing it badly and it was not in his visual field. In contrast, when the object he sought was in his sight, he would grasp it or merely point at it, without saying a word, showing us that no language would have ever come to being had it not been for unsatisfied cravings of ours. In other words, with this relentless pointing at objects with his crooked little index finger, he implicitly pointed at the idea that through misunderstandings with the reality we learn to use language. Were we to extend this insight, we would come to conclusion that dissatisfaction, frustration and perpetual disagreements with reality are the mothers of new knowledge. If we were able to read other people's minds and know everything, the doors for our inner progress would remain shut down. Neither a prophetic clairvoyance nor 'perfect' creative powers marked with the abilities to produce effects on our world in the exact correspondence with our ideals are, therefore, something to be wished for. It is the mixture of knowledge and ignorance that gives rise to exciting sources of novel ideas and ways of communication. And, along the way, it is these repeated instances of misunderstanding, along with the unbearable frustration that they give rise to, that present the gateways to a greater knowledge and the higher stages of being in the story of our lives.

New ideas and creative concepts, correspondingly, be it in sciences, arts or any other disciplines, originate best not from minds that articulate their experiences very well, but from those who have come at unsurpassable roadblocks in communication. This is because finding no sympathetic and understanding soul in sight and thus resisting to express one's ideas and feelings to another facilitates the transmutation of this incredibly potent internal energy into a different channel, which may be more creative than that of a common communication between two earthlings. This, of course, is yet another iteration of the fact that an obstacle in the domain of elementary experience presents a stepping stone toward an illuminative expression in a more abstract domain. This is, for example, why I have come to conclusion that one, albeit not the only, reason why my compatriots in Serbia have been less inventive in science, technology or art as compared to the northern and western European cultures is because a large amount of this potent mental energy is being squandered on a daily communication with one's friends and neighbors, when a quieter mindset, whose communication with the world feels suppressed because of various internal inhibitions, is more conducive to the metamorphosis of this yearning to express oneself to another, more abstract domain. This, once more, is a mere reformulation of the idea that a problem in one sphere of experience presents an open door to a solution in another, logically higher sphere of it.

Hence, it should not surprise that the greatest scientific discoveries have been arrived at by the discoverers' walking along the edges between abysses of failure and exciting cliffs of evolutionary novelties. However, after spending a large portion of my life in scientific research arena, I have realized that most inhabitants of it do not enjoy subjecting themselves to these risks that lead to notable feats, but instead prefer staying in safe shelters abundant with results that merely confirm the validity of preceding theories and the actuality of dominant worldviews, being blind to the fact that such mental inclinations present giant roadblocks on the path of the progress of science and technologies.

I will illustrate this with an example. It may be a simple scientific research in which one investigates the effects of certain variables on a set of physical properties of a system. Roughly speaking, two major outcomes can be conceived. In the first case one would arrive at an expected

correlation, whereas in another case the results would deviate from one's hypothetic anticipations, which normally fall along the line of paradigms used to explain experimental phenomena in the given field.

Now, most people would yell hurray in their hearts and glisten with joy should they get to the point when their results agree with the expected, commonsense trends. The great scientist, however, in a situation like this, may seem not only cheerless, but almost aggravated. For, he knows that the huger the paradox in the observed experiment, the greater the discovery that lurks underneath. Only petty people, whose aim is to preserve their positions in academia, wish for their results to follow the line of mere ordinariness. Our stellar scientist is brave enough to face the paradox, knowing that 'the abyss hides the truth', as in a Schiller's poem. To come to the treasure in a fairytale one must cross wild seas, gloomy forests, dangerous trails and frightening mounts. And the same situation awaits us in life. In order to get to the most precious treasures in life, we have to be prepared to step into the 'heart of darkness', and from there on seek the path that leads to the diamond-strewn realms of light.

Thus, the real scientist does not get upset when he notices that the results of his work do not fit standard explanations. He knows that a drift away from our expectations is where the best and most insightful research adventures begin. After all, everything we perceive can be comprehended as a deviation from our subconscious anticipations, which is the basic law of perception with repercussions in every single existential domain. In arts, it is the basis of Merleau-Ponty's idea that 'the role of the artist is to make images that disrupt our relation to the world in order to enlarge and transform our ordinary perception'⁷⁵⁷. In science, it brings about the awareness that not the experiments that confirm our hypotheses, but those that counter our expectations comprise the truest steps forward in the progression of scientific knowledge. And as ever, in need of guidance, a materials scientist turns to materials he handles and gazes deep into them, letting the painted paint the painter, the written write the writer and the child instruct the father. If wise enough, he may know that sometimes the best and sometimes the only way to find what is being searched for is to let the searched find the searcher, which brings to mind the final thought I aired at the end of one of my UCLA lectures in the context of the story about Bor mine in eastern Serbia, where the long-sought gold was never found, but the beginning of the golden age coincided with the discovery of copper, not gold in its pits, seconds before I, an outlaw with a warrant for excommunication carried around the country by various academic headhunters at the time, bowed and thanked the organizers for 'giving me another opportunity to spoil the young minds of Athens, pardon, Los Angeles': 'The point, therefore, is to keep on searching. Because you may not find what you are searching for, but you may find what is searching for you. And that, in life, proves over and over again as far more important. And beautiful, too'. In other words, the search, whatever it is, must continue, even when we know that it takes us in the directions where we would never be able to find what we seek, which is every so often, as many may notice, because what we seek is not what we need. And so the scientist keeps on digging and searching, proceeding tirelessly with his diligent inspection of the finest forms impressed in the objects of his research, allowing himself to be ceaselessly surprised by what he comes across and letting the explored, as it were, guide the explorer. There, he may notice that 'it is the fluctuations and disorderly states of the heterogeneities and interfaces that often determine the system's properties and functionality'⁷⁵⁸, an insight that assures him that only by embracing imperfections, plunging into creative chaos and rejoicing in the departures from the expected and/or desired can he and his science continue to grow.

Yet, by holding these paradoxical results in his hands, the scientist never knows whether an experimental error, an uncontrollable factor subject to change or an inherent uncertainty gave rise to these hardly explainable correlations or they present a sign that invites for a novel explanatory model that will either fundamentally supplement the actual knowledge or turn it upside down and shake it from its roots. Filled with intellectual courage, he steps forward to face this clash between the abysses of

potential failure and entrance into the light of semantic sacredness, the light that will guide him to draw new pages in the history of the evolution of human knowledge. Yet, to stay immersed in this light may not be enough; needed is, he knows, a return to the intellectual darkness that surrounds him with a state of mind that carries a torch of progressive thought lit by this inspirational blaze. With this in his mind, he follows the route back, and over and over again, with a whole lot of carefulness and patience, repeats the experimental pathways already taken. And this looking back makes it clear why scientific quests that enrich the co-creational dialogue between human mind and Nature are known as re-search. For, in the end, looking back so as to correct mistakes made on the way, alongside sacrificing one's own flights to stars for the sake of joining hearts with those anchored to the ground, has always constituted the essence of learning and of the evolution of the human mind. 'Who returns was sent by Tao' (Tao-Te-Ching 40), as Lao-Tzu proclaimed in one of the most beautiful lines of his magnificent book, the line which takes us back and sets us straight on the doorstep of the heavenliest of all feelings: Love.

Love emerging as the savior from the dialectic battle of life

'And he said, Go forth, and stand upon the mount before the Lord. And, behold, the Lord passed by, and a great and strong wind rent the mountains, and brake in pieces the rocks before the Lord; but the Lord was not in the wind: and after the wind an earthquake; but the Lord was not in the earthquake: And after the earthquake a fire; but the Lord was not in the fire: and after the fire a still small voice. And it was so, when Elijah heard it...'

Kings III 19:11-13

'No man hath seen God at any time. If we love one another, God dwelleth in us, and his love is perfected in us'

John I 4:12

Compassion and love are the keys to mastering the art of living in spite of the inherently dialectical nature of being and becoming, which dictates that the most blissful qualities of life will always be found mingled with their ill-natured opposites. In view of this dialectic nature of all things around us, love could be seen as the ultimate purpose of being, the point of origin and the terminal outpost of the evolutionary tale, the cause and the destination of every event in life, regardless of its ostensible minuteness and unimportance. For, if wicked things promote wickedness as much as they promote goodness and if the same could be said for things gracious and benevolent, arrived at is the awareness of the freedom to love everything with the same intensity, regardless of whether it is crooked or straight. And when we learn the art of loving it all and, through years of practice, install it deep within the soil of our spirit, so that its roots end up extending all the way from the surface of our being to the depths of our soul, we may know that a seed of stardust has been transformed into an angel, a star, and that the Mission, verily, has been accomplished.

This is when we will have come to know that Love is that infinitely potent divine force arising like a starry spark that illuminates it all wherever the opposites in life touch. It is the sun-drenched column greater than life, standing at the foundations of our views of the world in the perfectly balanced states when we feel as if our soul is all in bliss, shining like a sun and echoing that 'still small voice' (Kings I 19:12) that has 'won over the world' (John 16:33) all across the hills and meadows of the Earth.

When these battles of opposites and incessant quests for middle ways firmly teach us the art of love and compassion, and we start to refer to the place at the bottom of our hearts and reasoning as the source of our profound and twinning actions in life, our whole life becomes like a divine game. Once we

awake such an intensive and yet gentle and mild feeling that gets to carry us throughout the life, we come to understand that we are here, at the stage of life, to essentially learn how it is to be human. By living through all the stages of human life and passing through many of the typically human cognitive circumstances, we build a spiritually richer and wiser personality. Then, all the fears become transformed into a majestic peacefulness and cognitive grace.

This is why Jesus used to say that he was about to die for the whole world. Not in order for the future generations to develop an attitude of spiritual leisure and laziness and give up any yearnings to enlighten their inner worlds, but because his compassion and empathy reached so far as to become One with all beings. Sadly, many interpreted his message in the former way, which simply warns us that there is no expression that could not be interpreted in diametrically opposite ways. This view brings us back to ambiguities and polarities inherent in the evolution of human spirit and of the fine richness of cognitive boundaries. For, incompatibilities, perplexities and enigmas are the ones that sustain the miraculous spinning of the evolutionary wheel of Love.

Pure mind and heart as the guiding lights of our being

The psychosomatic roots of human wellness

‘Your mind is like a wireless machine. A saint with peace, poise, harmony and spiritual waves sends out into the world thoughts of harmony and peace. They travel with lightning speed in all directions and enter the minds of persons and produce in them also similar thoughts of harmony and peace. Whereas a worldly man whose mind is full of jealousy, revenge and hatred sends out discordant thoughts which enter the minds of thousands and stir in them similar thoughts of hatred and discord’

Swami Sivananda, *Thought-Power*

Sound health has its roots in sound thoughts, intentions and aspirations. Even though, as the Book of Job teaches us, we must acknowledge that the pathways of human destiny are always permeated with uncertainties (which essentially drive the wheel of the progress of human science and knowledge, as entropy and disorder are, simply saying, a food or building blocks for forming order), I believe that all the illnesses that humans are nowadays subject to have their deepest causes at the most fundamental epistemological levels, which are those from which the core values and aspirations that our observations and interactions with the world are based on originate.

It is known nowadays that the previously mentioned feedback network of the sensory-motor system is inextricably impregnated with psychological stimuli. Not only does each emotion or attitude, therefore, tend to invoke one from a limited set of body language postures tied to them, but consciously creating nonverbal behavioral cues that naturally arise from a certain emotion is likely to produce that very same emotion in us⁷⁵⁹. For example, adoption of a confident posture has a tendency to boost confidence, while smiling and letting its signals roll down to the emotional well of our being tends to increase the level of our happiness. Psychogenic and motor interactions thus extend both ways, so that mind can be said to have been given the task of controlling the body, while the body simultaneously controls the mind. Consequently, as of recently, psycho-neurophysiology has been regarded as a medical field of its own. As an example of this complex bio-cybernetic network, the effects of aging could be

mentioned. Namely, as humans age, they tend to become increasingly mentally constrained by means of self-imposed psychological burdens and pressures. These stressful psychosomatic factors gradually produce physiological reflections in terms of numerous local obstructions of the flow of bioenergy and a partially blocked bioenergetic activity pattern of the organism as a whole. The latter furthermore affect self-confidence and other psychosomatic factors of one's wellbeing, indicating that psychological and physiological attributes are intertwined within an endless circular cause-and-effect chain. In fact, on the other side of the human lifespan, whenever we, as a parent striking the magic chord of the Way of Love, wishing to instigate independence in an infant, while also shed stardust of love all over him, invest all our heart in his learning how to crawl or walk but also let him cry his heart out during numerous failed attempts to do so, knowing that only if we place him on the long and frustrating learning curve can we expect from him to develop properly and not be a lazy and pampered brat one day, we stand on this gray zone where psychology and physiology meet, the zone from which the impetuses for the most crucial aspects of his progress in life will come to originate. From the earliest to the final days of our lives, thus, mind and body are interlinked within a single network of relationship that our physically and spiritually inseparable beings are. Mental spirit, emotions and bodily movements, therefore, we are free to say, present emanations of a single biological sphere of existence, in which it is impossible to discern which comes first: chicken or egg, i.e., mind or body.

Every malign thought produces immediate but subtle toxic effects on the body. Just like the leather-processing factories in Bangladesh dump millions of gallons of chemically contaminated waters into the Buriganga river every day, so do thoughts stemming from vanity, the desire to impress the world for the benefit of the ego, dispose of enormous amounts of polluted waters into the bloodstream of their bearers in this world wherein similarities across all scales, from the largest to the minutest, are more than apparent. A continuous impression of such ill vibrations onto the substrate of one's mind and body can lead to the development of temporary or lasting unhealthy conditions, each of which in turn provides a fertile ground for even more of the disharmonious thoughts and feelings. The more they are imposed on the biological system, the deeper the trough in the energy landscape in which one's mind, like a flipper ball of a kind, is found and the lesser the probability of its escape into more cognitively luscious and salubrious regions of it. Such iterative reinforcements of adverse emotions and thoughts can apparently lead to disintegration of the system in question as a whole over time. But the same effect can be said to occur with all the harmonious intentions and emotions that we let arise in ourselves, and all the balanced movements and actions that we bring about in our daily behavior. Thus, irrespective of the qualities exhibited, the states of mind and body are tightly connected, forming a closed feedback cycle, which is apparently subject to an explosive behavior through an amplification of the iterated impulses, and that either in the direction of pathological self-destruction or unimaginably enlightening experiences. These circles are, however, at the same time open to environmental influences that can sometimes initiate crucial changes in terms of either damping or spurring the uncontrollably intensive or sleepy spinning of these circles.

In each case, body/mind interaction can be envisaged as a feedback cycle in which it is truly impossible to find out the prime cause of the final states of the body and mind. Try, for example, to mentally practice any yoga exercise. You might notice how pure visualizations can produce mild effects quite akin to those achieved by the real performance of these exercises. They may induce tranquil states of mind that are sometimes said to be attainable by means of the real exercise only. Equally, a flow of bioenergy to the body areas targeted by the given thought exercise can be initiated⁷⁶⁰. Magnetic resonance images of the human brain have consequently shown that its very same areas activated during a physical activity, say, hitting backhand in a game of tennis, occasionally light up when the subjects in rest are told to only imagine them performing it⁷⁶¹. It is not certain to what extent this reflection of the

mental imagery at the lower systemic levels of our physiological makeup belongs to the broader class of effects where modeling a system at a supposedly detached, abstract plane affects the system itself and redirects its evolution, but if there is a connection there, then we could refer in this context (a) to the well-known macroeconomic effect where mere speculation about a fiscal measure occasionally produces its effects without the real intervention, (b) to how the widespread reference to statistics in American basketball, overwhelmingly emphasizing individual accomplishments, has enforced the play to become ever more individualistic and less team-oriented over decades, (c) to social analysts' accusing Nicholas Ray's *Rebel without a Cause*, an attempted portrayal of teenage angst, for causing an avalanche of delinquency among the youngsters in the 1960s and Ingmar Bergman's portrayal of a marriage undergoing divorce in *Scenes from a Marriage* for the rise of divorce rates in Europe in the 1970s, and (d) to any critical depiction of a social state of affairs that gets absorbed into the semantic substrate of the given society and that changes it, either delicately or dramatically.

Whatever the case, there are a number of involuntary physical responses that could be triggered mentally. The impetus to empty bowels can thus be delivered through mere visualization of this physiological action, while some immunological responses, such as sudden narrowing of pulmonary alveoli, could be similarly provoked by nothing other but anxiously thinking of them. Erotic fantasies present another clear example of psychosomatic effects reflected in pulsation, circulation, saliva flow and other physical symptoms of sexual arousal. Increased levels of hormonal secretion may be induced in this way, just as by many other types of thoughts⁷⁶², and it is worth remembering that steroid hormones present a rarity in the hormonal realm in the sense that they are the only ones that due to their lipophilic character do not need to react with receptors positioned at the cell membrane in order to cross it and enter the cell, but have instead the ability to travel straight through the cell membrane and then, using specific intracellular receptors as vehicles on their journey to the cell nucleus, go on to directly interfere with the pathways of gene expression. All of this, of course, goes back to Pavlov's experiments with a dog and a bell for which he got the Nobel Prize in 1904 and today we know that cardiac contraction, smooth muscle relaxation, blood pressure, renal function, colitis, vaginal and penile erection and countless other involuntary physiological responses could be triggered by hormones, neurotransmitters, autacoids⁷⁶³ and, all in all, hundreds of different molecules releasable via mere visual imagination and the fire of emotions burning inside, but not necessarily involving external stimuli. And so, if the emotions of happiness, tranquility or anger arising in our minds induce secretion of hormones that profoundly affect our physiologies at the organ, tissue, cell signaling and subcellular scales, then there are no limits as to the extent to which our mind and heart can beautify and bring bliss to the body and soul solely from the inside out. This is one of the reasons why neurology, endocrinology and immunology, once considered as three independent areas of biomedical inquiry, are nowadays increasingly investigated as parts of a single psychosomatic network. And it also explains why we feel as if a part of our being becomes a bird whenever we perseveringly watch the flight of seagulls over the seashore. For, the way we see the world and ourselves determines what we and the world are to become. Our beings shape our thoughts, but our thoughts in return shape our beings.

These assertions were confirmed by the recent discovery of the so-called mirror neurons⁷⁶⁴. Namely, a simple experiment showed at first that the same neurons triggered in a monkey's brain when a peanut is brought close to his mouth become activated by having him simply watch other people eating. Therefore, when we watch someone performing an action, such as kicking a ball or climbing a tree, under ordinary circumstances we automatically simulate the action in our own brain. Empathy, amiability and sociability, some may notice at this point, are embedded in the foundations of our consciousness, having a crucial role to guide us towards brilliantly executed individuality. What is more, human neurons seem unprecedented in the biological realm in their capability to reflect emotions,

intentions and other facial features and body postures of the observed fellow beings. All these findings are in support of the idea that has been conveyed to us by the traditional teachings of numerous Oriental theologies: it is that a simple sense of satisfaction and happiness can spontaneously drive the whole world to more enlightened and peaceful states.

On the other hand, learning how to imitate others through empathy provides us with the ability to facilely maintain the state of balanced postures and movements. Exercises with caricaturing imbalanced postures other people adopt, in fact, trigger the action of inner balancing mechanisms that come to show us where we were wrong in our attitude and how we could spontaneously correct it. Learning to adopt the aforementioned Green and Red Light reflexes may, thus, make obvious to our mind and body what exactly went wrong in our everyday postures. Consequently, sometimes when I feel that stress has crept into my moves, I tell myself ‘okay, now act with as much stressfulness and timidity as you can’, and miraculously, soon after, these inner tensions tend to disappear. Besides, by adopting other people’s postures or at least empathically reflecting them, we learn enormously about how it feels to be them, which eventually enkindles the flame of love within us. With that flame, a new level of imitating others in spontaneous, sincere and compassionate ways opens up. On it we childishly reflect the moves and gestures of others and serve as mirrors to themselves. Plus, such an empathic mimicry becomes a perfect way of preaching to others. Unlike the ordinary preaching from the distance in which a lack of empathy and compassion is implicit, by being in oneness with fellow beings we become a true voice of the divine and herald of the ‘good news’ that Gospels stand for.

Therefore, next time you want to relax your entire body, make sure that as you lie down you do not spin the movies of yourself scoring goals on a soccer field in your head, ala Archie Gemmill against Holland in 1978⁷⁶⁵ or Zvonko Živković against Queens Park Rangers in 1985, let alone solving some mind-boggling problems from the ‘real world’. On the other hand, we could still remember how wonderful it is to fall asleep while imagining the sprouting of a flower, as Goethe allegedly used to do, or rotating crystal structures and nucleating crystalline particles, as I occasionally use to do. Emptying pockets in a descending lift, like Thom Yorke⁷⁶⁶, if not flying in a balloon, over Lugmore and Liffey⁷⁶⁷, or carrying out charitable deeds that bring benefit to little pieces of humanity⁷⁶⁸, like Mother Teresa, are other soothing things I may imagine before bedtime. The German philosopher also held that ‘if we take man as he is, we make him worse, but if we take man as he should be, we make him capable of becoming what he can be’, the thought which Viktor Frankl considered ‘the most apt maxim and motto for any psychotherapeutic activity’⁷⁶⁹, and a reminder that when we visualize others as angels, as souls in search of divine meanings in life, for the roads to salvation and for the fuel to propel the spaceships of their spirit to stars, they are truly, magically, sent in the direction of becoming so and finding the treasures that await them at these fabulous destinations.

Inspirational, gentle and loving thoughts are thus continuously reflected in the bodies that they home and are homed by. Though their influence may be extending even farther. Because good thoughts seem to be not only improving the world in obvious, palpable ways (as motivational sparks that initiate constructive action), but they also radiate and create the atmosphere of synchronicity and peace, subtly inducing inspirational sparks that generate qualitatively similar thoughts in the surrounding beings. And trusting that thoughts and emotions indeed have wings is such a great thing to exercise our faith in.

Walt Whitman once observed that even though one may not be able to understand his verses, they would still go on and provide good health to the reader. Along a similar note, Kristin Hersh compared her band, Throwing Muses, to spinach, adding that ‘we are ragged and bitter and nobody really likes us very much, but I swear to God, we’re good for you’⁷⁷⁰. And it may indeed be the ultimate postmodern message that only the artist can deep in his heart know how good his work has been. Or, as put into words by Socrates, ‘what is good, Phaedrus, and what is not, need we ask anyone

these things'⁷⁷¹. Wassily Kandinsky is likely to have stood on a similar semantic vista when he noted that 'a work of art is born of the artist in a mysterious and secret way - it has the power to create a spiritual atmosphere and from this internal standpoint alone can one judge whether it is a good work of art or a bad'⁷⁷², which was merely another way of stating that no one but the artist, oneself, could be the judge of the quality of one's work. None of the audience members, readers or listeners, despite their patient observations, can ever have a perfect insight into all the impalpable and delicate messages mysteriously interwoven within the artist's masterworks. For, fine emotions, intentions and aspirations weaved into the crafted notes or movements of the paintbrush are the things that may matter more than the apparent meanings transmitted by the artistic work. In the end, *how* has always mattered at least as much as *what*. Or as Sirach once put it, 'The heart of fools is in their mouth, but the mouth of the wise is in their heart' (Sirach 21:26). When we start understanding that deepest emotions, wishes and aspirations are fundamental realizations that also count in assessing and improving the wellness of ourselves and the world around, maybe biomedical sciences will revitalize themselves, illuminating new dimensions of the tools of creativity that humans have had a chance to utilize ever since the dawn of humanity.

In an ancient Hindu approach to attaining and preserving healthy states of the body and mind, the essential bioenergy channels in the body are described as concentrated around seven chakras, positioned along the spine. Psychosomatic influences may be, furthermore, acknowledged as deep causes behind the harmonious flows of bioenergy and 'spins' of these chakras. For example, the cultivation of good and inspiring thoughts is supposed to lead to a healthy flow of energy through the brain. Developing a sense to understand and enjoy music, poetry and literature is reflected in the beautifully resonating voice and hearing abilities. People with a refined sense for music and poetry often possess a pronounced energy center in their throat, which is where the emotions of devotion that sublime music gives rise to tend to concentrate. Needless to add, frequent looking at stars under surges of cosmic wonder proves to be beneficial for maintaining springy necks. Then, inciting the waves of love inside one's heart is the source of healthy cardiovascular functioning. Being deeply satisfied, vivacious and maintaining an image of the smiling Sun in one's plexus is reflected in a good appetite and a healthy stomach. Being a dedicated and diligent worker, not focused on immediate gains, but on the welfare of others may be beneficial for the healthy functioning of urinary tract and a towering sexual potency. Maintaining the sense of intimacy with the Earth and the ability to naturally become empathic with the Earthly objects and beings can prove to be good for the healthy functioning of our intestinal tract. And so on.

Many people would enjoy the depiction of daily exercises with the metaphor of having to discontinue a ride on a highway every once in a while to pour some gasoline into the car. By hesitating to do so, the car, itself the metaphor of our body, would get stuck somewhere along the way and seriously delay our journey. Although, more or less, I do agree with this metaphor, I still like to point out the following. 'What would happen if we were in possession of a solar car', thus I ask. Indeed, if we cultivate sunshiny thoughts, emotions and aspirations, we might be unlike most other people. That is, we may not need to engage in sweaty workouts to preserve our health because the Sun shining in our mental spheres would disperse just enough of the healing energy across our body. The periods of sunny weather and rainy cloudiness will surely switch, but with a backup battery system we could also store some of this healing energy of inspirational emotions and thoughts. And then, in the midst of the hard times we would retrieve them as bright visions to illuminate our insides and give us once more the power to live and love, overflowing us all the while with a majestic and sound health. For, in the end, obsession over the type of food to eat and the type of exercise to engage in for the sake of maintaining physical health and intellectual vigor places us far, far away from the road to spiritual fulfillment and sacramental wisdom, the road that becomes stepped on the moment when we become a servant of Love and a free

emitter of loving emotions and thoughts arising in us, selfless, goodhearted and always oriented towards the salvation of another, not oneself.

When it comes to considering the conditions for the healthy functioning of the human body, we can construe another view of the ancient systemic balance between the small and the great that become prolifically intersected in the human mind and heart. In many Oriental medical schools, typically stemming from rich philosophical backgrounds to which they descend for keys and inspiration all the time, mention the encounter of a pair of fundamental forces at the physical level, one spreading bottom-up and the other extending in the top-down direction. It is the art of uniting the two that presents the solution to maintaining perfect health. Our biological spontaneity and instinct on one side and the power of reason and sanity on the other might be an arbitrary choice for a pair of reflections of these two forces.

At the same time, as it is implied by the Way of Love, every healthy physical system is akin to a shining star wherein two antagonistic forces are precisely balanced in intensity and direction: an inwardly oriented one trying to compact the star and collapse it into a singularity and an outwardly oriented one trying to set it apart and dissipate all across the Universe. Whenever this balance becomes undermined, conditions for the rise of illness are being set. Should we allow the meditative pole of the Way of Love to overbear its expressive complement, the folding of our mind into an introspective cocoon and separation from the rest of the world is bound to result. On the other hand, should we allow the expressive pole to outweigh its meditative counterpart on the delicate weight balance that human mind is, we would be predestined to burn out and scatter our spirit all through the air, with nothing anymore to keep it internally integrated. If we were allowed to refer to the Yogic medical dichotomy based on which all diseases could be categorized as either positive or negative⁷⁷³, we would say now that the former imbalances lead to the rise of negative illnesses, whereas the latter ones cause the so-called positive ones to occur. And if we were to represent this dichotomy between positive and negative illnesses using punk vocabulary, we would also note that the former neatly relate to the ‘fuck you’ sound of the Sex Pistols, while the latter relate to ‘I’m fucked’ sentiment of Joy Division. Now, the most common negative illness in the modern age is, of course, cancer and, given that each and every disease has its predominant roots - and thus cures too - in our psyche, it is this extreme individualization of our species caused by favoring self-withdrawn separation from the rest of the world over empathic connectedness with all things around us and carried on the wings of the ominous eagle of westernization that now covers each segment of the globe that is to be blamed as the number one factor for the reigning epidemics in malign diseases. Moreover, one could add that the insistence on concealing aggressive feelings enkindled by the drops of caprice and malice produced like a venomous sap from within the stem of our physical being is also to be blamed for cancer being a major disease of the modern age. In that sense, I have claimed that the world in which passive-aggressive behavior is encouraged is the one inevitably pushed to be crushed by cancer. And I am certainly not the only one believing in this. For, from 200 AD, when Galen of Pergamon observed that melancholic women are more prone to cancer than those of sanguine temperament⁷⁷⁴, to this very day when claims are occasionally being made that holding grudges and looking back in anger or guilt is the real cause of malignant neoplasms within the human bodies⁷⁷⁵, concordant hearts could be found to share this belief of mine that allowing malicious thoughts to eat oneself from the inside, as if with the claws of a mean crab, is the primary, spiritual cause of illness manifested physically as cancer. In the terminal form, the negative illnesses progress slower than the rapidly progressing positive ones, which was recognized earlier to coincide with the greater empathy of persons prone to them and their subconscious wishes to make their passing easier for the fellow souls whom they have loved so much. This is something naturally arising from their sense of guilt that eats them from the inside and stems from their greater sensibility and lesser selfishness than of

those who happen to disappear in the blink of an eye. Now, unlike the negative diseases whereby the physical manifestation of one's spirit implodes, the so-called positive diseases are those wherein expressions of emotions are not hindered, but rather allowed to explosively emerge on the surface and they number mainly chronic inflammations, be they caused by infections or autoimmune disorders, and, to some degree, cardiovascular diseases. Because people in the past did not hesitate to express their anger, fury and all other emotions in more direct, animalistic manners and also lived more physically active lives than today, it makes sense that these commonly called positive diseases were more common in the past. To that end, we could hypothesize that not only do positive emotions and thoughts matter in ensuring immaculate health, but the most blissful thoughts and feelings might also lead to disease under specific conditions if they are being produced out of balance with the Way of Love, that is, if they are either collected inside and not shared with the surrounding life or radiated outwards without maintaining any inner anchorage for our introspection and meditation.

Now recall that the biological functionality in a vital organism depends on two inherent skills: functional efficiency on a small scale and an efficient communication between various entities at larger scales. In that sense, the Way of Love with its emphasizing the need to be true to oneself and true to others to an equal extent may be taken as a more general principle that manifests itself as the basic factor in maintaining physical and psychological wellness as well. Consider now the following two examples of disproportionate physiological appearances and functionalities. First of all, aging typically leads to a diminished capacity of liver to efficiently store and deliver glycogenic sources of energy to cells in the body. As a consequence, fat cells, which normally act as backup sources of energy, now become equally important storage media, starting to swell and leading to their more pronounced visual appearance on the body. Another example considers an efficient communication between bones, tendons and muscles in a healthy body. When their communication is well preserved, lean proportions naturally follow. But with aging, bones typically get weaker and tendons less flexible. As a result, muscles grow in size, and it is well documented that when not used to a full capacity on a daily basis, muscle tissues tend to transform into fatty, triglyceride reserves. By being a holistic system, human body undergoes the same basic principle, which says that what is good for one of its parts is good for all other parts, and *vice versa*.

Lungs and the whole cardiovascular system of a diver on breath who can stay immersed in water for long times possess intercellular interactions not permeated with competitive desires to absorb as much nutrients and oxygen as possible, but pervaded with modesty and the tendencies to always leave enough for others. Observed under some special microscope, the cells in this diver's body would be seen luffing in bliss: their inherently healthy tendency for cooperative communication appears to have overcome the egotistic competitive relations that dominate the majority of human-human encounters nowadays. Asked where he saw God, the Persian Sufi, Shaikh Kharaqāni, whom Farid al-Din Attar called 'the king of the kings of Sufi masters', said, 'Wherever I did not see my own self', and the cells in the body of our diver who can stay submerged under water for many ticks of the sweaty stopwatch in the boatman's hands, like Jean-Marc Barr in the Big Blue, act in compliance with this very principle that equates enlightenment with reaching out to another and losing oneself thereby and that dictates not selfish accumulation of goods, but selfless giving all that is in excess to the neighbors. Their working could be seen as a reflection of the autopoietic nature of biological systems (i.e., cells and tissues in the body, organisms in the ecosystem), according to which all the components of a biological whole communicate with the purpose of mutually building one another. Psychological tests have, in fact, indicated that cultivating friendly and trustful attitudes in the ordinary social communication, which keep us smiling without any particular reason, helps in strengthening our immune systems⁷⁷⁶. At the same time, the healthy, uncompromised communication between stem cells in a single niche has been proven as necessary to prevent mutagenesis and the possible evolution of tumorigenic genotypes⁷⁷⁷.

These findings confirm that promoting cooperative interactions in a single domain of human personality gets naturally reflected both horizontally, in all the adjacent domains, and vertically, at finer and greater ontological levels, that is, all the way down to the world of atoms and perhaps all the way up to the all-seeing eyes of Gaia and beyond. Being a loving person that welcomes all the beings of the world in the home of his heart, thus, presents the right way to become a strong and heroic person, and attain superior states of mind and body, as well as make the cells composing one and gods overseeing one smile in unity. This explains why the theosophy of meeting, as proposed by Martin Buber, should present a vital aspect of every wholesome lifestyle.

The creative efficiency on a small scale and the efficient communication on larger scales can be, therefore, regarded as a pair of entwined preconditions required for the healthy, sustainable and progressive functioning of natural systems. This is why the two modern slogans – ‘small is beautiful’ and ‘all is connected’ – present two neat guidelines that help us maintain healthy attitudes within many aspects of our existence. The fluctuation theorem from the field of statistical thermodynamics, for example, clearly delineates the benefits of being small by stating that the probability of negentropic events, those in which the physical order of the system becomes larger over time, increases in inverse proportion with the size of the system⁷⁷⁸. For example, Brownian motion within very short timespans regularly yields movement that contravenes the second law of thermodynamics by temporally decreasing the entropy on small spatial scales, demonstrating how sufficiently small systems can indeed spontaneously disobey the infamous arrow of time and basically run a heat engine backwards, from the cooler to the warmer end, an effect similar to that exhibited by kinesin, a motor protein molecule that transports cellular cargo along microtubules inside eukaryotic cells by harvesting purely entropic sources of energy, i.e., by converting the thermal fluctuations around it into directed forward motion⁷⁷⁹. Undying fluctuations present even in the solidest of all equilibria and even at absolute zero are, of course, responsible for this effect that crowns smallness as utterly desirable. The same form of constant, all-pervading and infinitesimal movement in open, dissipative and far-from-equilibrium physical systems allows them to self-organize into complex patterns typified by emergent properties, irreducible to properties of the systems existent at the lower levels of order, holding a key for an entrance to the pantheon of the philosophy of holism through the gate of natural sciences and its starlit avenues. Besides, it has never ceased to fascinate me how by proposing the division of reality to discreet units, a.k.a. quanta, which was to seemingly ruin every ideal of interconnectedness of all things, this very reality led us by the hand to realize the existence of holistic ties that pervade the entire Universe and connect everything with everything else, as if confirming the necessity of preservation of the balance between unification and diversification, alongside a myriad of other diametrical opposites, in all aspects of the natural world. In other words, if we relentlessly differ, separate and secede, sooner or later we would be swamped by the need to add, conjoin and unite, and *vice versa*, for life could evolve only on the grounds of the balance between the two. Quantum and holistic excellences, thus, merged into one, as synonyms for the art of being small and the art of being One, respectively, are bound to become languages and ideals of the modern man. A source of endless excitement it is to think where the development of these two lines of progress in parallel would lead the creative performance and consciousness of humanity in the coming eras.

One of the greatest enjoyments in life lies in listening tranquilly to the sound of the splashing waves and watching the dancing light rays and ripples of water mingling playfully on the surface of the sea. As many other enchanting landscapes in life, this archetypical one also carries millions of potential metaphorical meanings hidden within. For, whenever we find something strangely, without any obvious reason, capturing the attention of our whole being, we may know that it invites us to reveal the metaphorical meanings of the messages it conveys. To return to the sea, we may notice how small waves

crashing over the coast composed of tiny pebbles resemble the genuine interplay between firmly presupposed knowledge and amorphous regions of unformed and randomly swirling ideas. It is the touch of these wavy, imaginative and dreamy regions of human mind and the ones that correspond to firm and well-established patterns of knowledge that carries the sparks of novel ideas and conceptions. These liquid-to-solid interfaces were actually proposed as the sources of the first self-catalytic cycles that were to serve as the precursors of the origins of life, as opposed to the blasting, violent and abrupt beginnings thereof in the standard, Alexander Oparin's theory. Further on, each swimming object floats in its well-composed form through the unformed, non-crystalline epistemological sea. And each thought in the sea of human mind is like any of these swimming objects. Inevitably it produces ripples that are set to endlessly travel from coast to coast, interacting with other thoughts and producing larger waves or decreasing their magnitude until they become almost invisible. The entire mind of the world could be represented by this metaphor, similarly to many other systems. Each thought awakened in our mind, therefore, carries its either beneficial or detrimental waves throughout the whole body of ours, producing the effects in accordance with its nature.

In that sense, the power of mantra can be considered as having an incredible effect on our mental and emotional wellbeing, including our physical health. For, each thought that arises in our minds, similar to the ripples of water that form around an agitation on the surface of the sea, forms waves that traverse all over throughout one's body, and yet, as if being emitted through an antenna, finds its way towards others, expanding limitlessly. Should we learn to follow the roots of our casual thoughts and partly control them (I emphasize 'partly' hereby, since the element of spontaneity and intuitive/instinctive impulses ought not to be hindered at any cost), we might certainly be able to get rid of many illnesses that have been eating out humanity straight from its core ever since the dawn of our civilization.

Over time we may train our mind to sense the spiritual vibe in a room full of people and unexplainably tell whether the emotional aridity, a tempest of passions or the sharp spikes of bitterness bounce back and forth between its walls. It is then that we may realize that people may live in materially the most scenic sceneries and yet be of spirits resembling Sahara desert more than the Garden of Eden, and *vice versa*: people thriving in the most modest of living conditions may have spirits that walk through Paradise on day-to-day basis, so that in the end, when all things are taken into account, the richness and poverty could be seen as neatly balanced on the Earth as a whole. What's more, it is then that we become convinced that the first step in bringing our spirit closer to stars lies in the systematic cleansing of the microcosm of our mind of all the destructive and negative feelings and thoughts. The gentle power of prayer then starts to flow like a gracious waterfall across our mental and emotional landscapes, purifying our heart and mind from their core. By focusing our attention around the core of bright wishes and benevolent final causes imagined for both others and ourselves, we may overflow our beings with the waves of a healing harmony. In essence, when the light of love shines in our heart, it enlightens every atom of our bodies, delivering balance and harmony to it.

The progress along the plane of human welfare and happiness is essentially conducted not by superficial intentions, but by the deepest intellectual and emotional purity and earnest aspirations that radiate from our spirit. The deepest patterns of our heart and mind are the key foundations of our somatic wellness. In that sense, recall how intentional corrugation of one's forehead is not the right way to improve thought processes any more than straining our belly muscles is not the perfect way to improve our intestinal discharge. Likewise, our textual thoughts would hardly be able to influence the bottom of our mind and heart unless they are followed by a sincere absorption of their meanings. Similar to this, mere saying 'I will, I will' to yourself is only a coarse way, and generally only the first step towards attaining the state of absolute decisiveness of your being. Thereupon, when one is perfectly

determined, that is, when one's heart shines with supreme willfulness, then one's heart is filled with such a resoluteness that renders the external appearance of oneself perfectly mild and calm.

In the end, we should know that it is the three essential Christian qualities that from their deep sources within our beings become projected with their subtle, but shiny features on our visible gestures, thoughts and the entire appearance: faith, hope and love. We should never lose our faith in the priceless value and virtue of being good to others. We should never stop thinking that the goodness radiated from the heart of our intentions becomes reflected from the mirror of Nature and returned to feed us. Also, notice how the genuine hope cultivated in people's hearts makes their glances bright and calm. In contrast, when we go to sleep with worrying whirlpools spinning in our hearts, we wake up older, with corrugated eyebrows, disturbing thoughts and anxious, turbulent glances. But eventually, even when we firmly root our thoughts and actions in the calmness of divine hope and faith, we may recall the Evangelistic words of St. Paul the Apostle: 'And though I have the gift of prophecy, and understand all mysteries, and all knowledge; and though I have all faith, so that I could remove mountains, and have not charity, I am nothing' (Corinthians I 13:2).

Still, I maintain that it is incredibly hard, if not thoroughly impossible, to find the ways to control these deepest patterns of faith, hope and love that flow within our beings. There would be no permanent recipe for keeping them wholesome and pure. It is an incessant quest through which we never maintain, but always seek anew and build from ashes the towers, the meadows, the marshmallows and clouds of some genuinely Christian landscapes of a heart blessing all things alive and inanimate with every downy beat of it and of a mind blissed out amidst the magic and beauty of an infinitude of things surrounding it.

Hermes Trismegistus inscribed a few thousands of years ago on his Emerald Table what many nowadays consider the starting point in the line of progress of theological and philosophical thought: what is above equals what is below, and *vice versa*⁷⁸⁰. The beautiful and healing character of the Sun of aspirations that shines above the clouds of our thoughts is thus reflected in the harmony of the world of tiny cellular and atomic interactions below. Therefore, if someone repeats the popular phrase that 'what we eat, we are', please go tell him that the biological roots of our existence present only one pole of the fire of life, let alone that the dance of the loving interactions within our beings can turn poison into cure. The pole above is the one that belongs to our invisible, inner qualities that outline our being in about the same extent as our biological nature does. Thereupon, it is what we think that we are. *Cogito ergo sum*.

On the importance of keeping one's mind clean

'Now it came to pass, as they went, that he entered into a certain village: and a certain woman named Martha received him into her house. And she had a sister called Mary, which also sat at Jesus' feet, and heard his word. But Martha was cumbered about much serving, and came to him, and said, Lord, dost thou not care that my sister hath left me to serve alone? Bid her therefore that she help me. And Jesus answered and said unto her, Martha, Martha, thou art careful and troubled about many things: But one thing is needful: and Mary hath chosen that good part, which shall not be taken away from her'

John 10:38-42

'The spirit of forgiveness is the spirit of the Way'

Lao-Tzu, *Tao-Te-Ching* 51

The overall message of Christianity, the way Jesus had taught it, is not tied to unquestioning obedience of certain predetermined rules of behavior and blind pursuance of given doctrines, as some followers of the original teaching of the Christ, who have however wandered off the originally rebellious Christian path, may have lured us into thinking. Instead, the core message of Christianity may be said to relate to the importance of using the Biblical stories as metaphors that point to the merits of maintaining divine thoughts and aspirations as the keys to the spiritual health. Teaching of the Christ is, in that sense, not the one of passive and blind following of the instructions given to us by others, but learning to read the divine inscriptions written at the bottom of our hearts. And when we do learn that, each moment of our lives ceases to be a mere struggle for survival, and transforms into a wonderful and divine fairytale.

The teaching of Jesus could have been neatly concluded with the way Nietzsche's Zarathustra ended one of his monologues: 'Very well, this is my way, but where is yours?'⁷⁸¹ And when we make certain that it is the purity of human thoughts and intentions that govern the true goodness and quality of human behavior, actions and deeds, many attributes that we attach to the people of the world would be deepened and, occasionally, turned upside down.

For example, if we see a priest denying a young lady dressed in a bikini the entrance to a church, we can wonder who, in fact, is more probable to carry sleazy thoughts and desires underneath the blanket of an immediate appearance: the priest or the lady. The same question, I am sure, has been asked by many witnesses of parents who were imprisoned and who had their kids taken into custody because of photographing them naked, in the bathtub⁷⁸²: who, in fact, here has dirty thoughts - the parents or the lawmakers and their law enforcement puppetry. People pointing their fingers at three-year old Theo running naked around Orange County pools and demanding that he be dressed and his genitals covered are, consequently, those who are closer in their thoughts to deviant sexual fantasies than I as the parent, who lets him run like that, let alone the naked runner himself. The aforementioned lady in the bikini might have in all her purity and tender devotion to the holiness of the Lord's dwelling place forgotten what she had on herself, let alone had any sexual intentions at all, and would, paradoxically, present a prototype of the Christian refugee in this case. Such a prejudicial attitude of refusal exhibited by the mind of a Christian priest presents an example of the irony typical for the whole human civilization throughout which the most sacred and blissful ideas have regularly proportionally produced tragic consequences and reasons for sadness. We could just be reminded of the examples of Christianity, communism and the contemporary trends of cultural and economic globalization. An example similar to this one may depict a woman reprimanding her boyfriend or a husband for talking to other women or *vice versa*, the habit that, sadly, still exists even in the most developed parts of the world. This situation, once more, implicitly highlights the existence of primitive, sexually aggressive appetites not necessarily in the mind of the accused one as much as in the mind of the accuser.

However, the regressive judgmental attitude given in the latter examples could become perfectly understandable as soon as we recognize the root messages of the original Jesus' teaching as related to the ideal of cultivating a purity of mind and emotions instead of an inert obedience of the norms set by others. 'This people draweth nigh unto me with their mouth, and honoureth me with *their* lips; but their heart is far from me' (Matthew 15:8), thus said Jesus in an instance of revulsion against this tendency of followers to follow him shallowly, via spoken word only, when a constant battle for the blissful thoughts and emotions to prevail over those that sense evil all around them is needed to be waged inside their minds and hearts, alongside an even greater battle, which is to incarnate these magnificent mental vibrations into stellar ways of being. This is why Christianity in its most authentic form and especially compared to its ritualistic and/or discriminatory predecessors in the Western world still stands as a major religious revolution and a never-ending adventure in which each one of us has to find one's own way. And as one of the very core principles of Christianity teaches us, this way inevitably traces itself right

through the hearts of others. Thus, once again we arrive at the very essence of the Way of Love, mentioned earlier in the text.

To get back to the subject of voyeurism, we could easily blame both sides engaged in its sinful interactions: the peeping tom and the subject who is showing off one's pleasant appearance. For, only for as long as the watched ones wish deep in their hearts and minds to be admired for their external, youthful physical features will the attraction for the watching ones to persist in their voyeuristic deeds sustain. Any quality in Nature arises from an interaction, the form of which is defined by the properties of a pair of creative sides, as the co-creational thesis has taught us. Related to this, the sin of voyeurism, maybe just like about any sin or quality in Nature, is the responsibility of both sides. If all of us aimed towards reaching and watching some higher truths in man, then such filthy interactions would cede their place to enlightened ones, spontaneously promoting the emergence of higher levels of consciousness.

A particular Zen story beautifully illustrates this point of view. In it, two Zen monks were walking next to a river when they suddenly noticed a young lady attempting to cross it without any prospects of succeeding. One of the Zen priests suggested neglecting her, but the other one decided that they should help her. Eventually, the two of them carried the lady to the other bank of the river. They waved goodbye, and continued their walk. However, the priest who at first refused helping the lady seemed to be very uneasy about something. After a long silence, he finally uttered, 'We should not have helped that woman; we broke the rules that taught us not to touch women'. However, the helping Zen monk wisely replied, 'After we had carried her, I let her freely go her way; but I see that you are still carrying her'.

In another version of the story⁷⁸³, the lassie is substituted with an old, grumpy lady, whom one of the two priests carries over a puddle, which she was afraid to jump over because she thought that water would splash onto her expensive skirt. Instead of being thankful for the helping hand given to her by a monk, she rewarded him with rude and offensive comments. When a priest who watched the whole scene from afar asked the helping monk during their walk hours later how come he could help her when she was not thankful for the help she had received, the helping priest responded similarly: 'After I had carried her, I let her freely go her way; but I see that you are still carrying her'. The point is that whether we have alleged sins that we have committed in mind, as in the first version of the story, or charities, as in the second version, we should swiftly erase them from the canvas of our mind using the eraser sponge carried by the angelic hands of forgiveness and humbleness, respectively.

An important question is, however, whether the cultivation of perfectly bright and enlightened thoughts would make us become too meek and lose that inner emotional charge that sustains our creativity. Maybe our minds would become deprived of that wonderful wonder that flows within our hearts had we kept our thoughts under constantly bright skies. To sustain fertility of the land one needs to balance the moments of cloudy rain and sunny weather; likewise, the moments of desperate sadness and ecstatic happiness should ideally be balanced over time. In the end, the secret of sustaining a radiant personality and never ceasing to exhibit divine creativity may lie in the constant battle between the dark clouds of pessimistic thoughts that anticipate the worst-case scenarios in front of our minds and the sunshine of the optimistic ones that every now and again penetrate with their shiny rays of joy and happiness through the gloomy and depressing visions, bringing their graceful optimism to the surface of our mind, for innumerable little flowers of ideas and worldviews to leap up and happily rejoice.

Nevertheless, we should always keep in mind that whatever we hold in our hands or in sight and whatever we pay our creative attention to, in addition to apparent and measurable features that we enrich them with, we instill some of our invisible spirit into them as well. And that spirit is, I believe, able to mysteriously guide sensitive minds along their ways, as it may present the essence of the secret communication between distant people, sometimes involving inanimate objects and 'signs of the times'

we observe in our vicinity. As the constructivist theories point out that our very perception is also a creative act, the most elementary in our experience, we should also keep in mind that during each perceptive moment, the deepest emotions, thoughts and intentions, building the overall spirit of our being, may penetrate every detail of the surrounding world. The essence of the art of Karma Yoga, expounded in the book of Bhagavad-Gita, is composed of exactly that - devotedly doing whatever we are supposed to do in this life with a clean mind, knowing that *what* we do matters as much as *how* we do it. In fact, the latter matters so much that sometimes, even though we may deal with minor matters and minute things, should we perform our tasks with a bright heart and mind, their role in enlightening the world will come to be truly immense and incommensurable.

Thus, no matter how creative we are in terms of enriching the world externally, unless we perform our acts on top of a cloud of bright aspirations, prayers and wishes that all we do will bring light onto others, our deeds will be incomplete. In addition to all the charities we give, do not forget to give love as well, for should you forget to do that, your acts would not be fully benevolent. Hence the Christ's praise of Mary of Bethany for her helping out her hardworking sister, Martha, by sitting still and watching the world with a whole lot of love (John 10:38-42) and four-year old Theo's answer to his mom, Victoria's request to come to the kitchen and help with cooking, dishwashing and other chores, drawing smiles from angels and seraphs watching over the Earth: 'I will help mama by playing next to her with my birdie'. For, as Mother Teresa said once, 'At the moment of death we will not be judged according to the number of good deeds we have done or by the diplomas we have received in our lifetime; we will be judged according to the love we have put into our work'⁷⁸⁴. And if have approached others in life with that mystical message picked by the wireless train operator and then mumbled by the passenger lady with the prayer beads in Kenji Miyazawa's *Night on the Galactic Railroad*, saying *Dio, pli apud vin* in Esperanto, translating to 'Nearer, my God, to Thee' in English and reflecting our wish to wash everything and everyone in our sight and beyond with the light of godly love, which we incessantly send out of our heart, all until nothing in it remains and we become poor and deprived of this love in the effort to make others rich with it, then the trains we travel on, like the words in this sentence, will truly stream, as they do in this novel, toward Heaven.

What a thought to exercise our spirituality on, indeed, it is that watching people with love, if not holding them fondly pressed between the angelic folds of our loving memory, creates a protective veil of energy around them and bestows secret blessings on them that guide them toward bliss through the dark forest of life. This love, of course, can be neither measured nor seen, yet it presents the most powerful, the most motivational gift that we could confer to others. It has been said many times that whenever we have a chance to help someone, we should make sure that we do not simply hand a fish to a hungry man, making him dependent on us in the future, but teach him the art of fishing. However, it is rarely noticed that the mysterious energy of love ought to present the foundations upon which any practical advices regarding the art of fishing are to be laid. To that end, enriching people from their insides, breathing faith and love into them and making them independently creative is what truly ameliorates the troubles of humanity.

This, of course, is not to say that ultimately we could give up on doing anything that palpably improves the state of the world so as to be solely dedicated to generating and transmitting these blissful mental and emotional energies. No, the point raised herein means that we should always cultivate the balance between enriching the inner, spiritual and the outer, informational aspects of human experience. This balance between tending the insides and tending the outsides stands in accord with the co-creational thesis. The latter is, as we have seen, all about the balance between the effects of the inner, constructivist creativity and the outer, environmental incentives in forming our perceptions, emotions and thoughts. The Way of Love, thereafter, speaks about the necessity of bringing forth our actions

through simultaneously looking after the world inside us and aspiring to enrich the worldviews of the surrounding creatures. It is also in agreement with the idea of nurturing benevolent aspirations as much as edifying the visible order of the Universe with every act of ours.

Our visions as final causes

‘The greater the progress, the greater the extent to which we realize our own shortcomings. The fulfillment lies not in attainment, but in striving. The highest striving means the greatest triumph’

Mahatma Gandhi

If we were to get belted to the seat of a time machine and teleport ourselves to ancient Greece to have a chat with the local philosophers, we would be amazed to realize that causes of effects perceptible in their present time existed not only in their past, but in their future too. Specifically, Aristotle differed between the efficient cause and the final cause, the former of which was, say, analogous to the act of striking a match to light a fire, while the latter of which was comparable to, say, the vision of warming an earthly soul up with the lit fire. In his head as in the heads of his plebeian contemporaries, in fact, these two causes, one lying in the past and one lying in the future, were equally real. Whatever happened in the dozens of centuries that stand between us and Aristotle happened, but we find ourselves today immersed in times where final causes appear wholly unimaginable, confounding and ridiculous to a common ruminator over the causal effects in Nature. The extent to which we linearized our logic, passivized our cognitive systems and turned them into trivial automata by alienating ourselves from the realness of final causes is best illustrated by the sense of foreignness that the idea that bright visions could guide the chain of effects of our actions straight to their doorstep evokes in us. Yet, extending before us as of now is the dream of beautiful living commencing in present upon the rediscovered actuality and relevance of final causes in life.

Highlighting the role of our visions in directing the pathways of our destiny presents an amazing field to exercise our faith in. ‘Just think of happy things, and your heart will fly on wings, forever’, Peter Pan told Wendy when she asked him how she should fly, meaning that the skyward flights of our spirit begin from a bright vision born inside it rather than from any word, technique or material acquired along the way. If the Serbian tennis superstar, frequently cited as the best athlete in the world, Novak Đoković could ascribe his success on the tennis court to the power of visualization⁷⁸⁵, then only sky is the limit in our attempts to heal and sanctify the worldly spirits by merely seeing them as whole, shiny and beautiful. Not incidentally at all, as a major influence Đoković often cites the Serbian Elder Thaddeus of Vitovnica and the adage he has been known for, *kakve su ti misli, takav ti je život*, meaning ‘your life is the way your thoughts are’. The idea that the sanctification of our spirits starts from the cleansing of our thoughts, of course, dates back to the first few lines of the Dhammapada, the most widely known collection of Gautama Buddha’s sayings: ‘All that we are is the result of what we have thought: it is founded on our thoughts, it is made up of our thoughts. If a man speaks or acts with an evil thought, pain follows him, as the wheel follows the foot of the ox that draws the carriage. If a man speaks or acts with a pure thought, happiness follows him, like a shadow that never leaves him’⁷⁸⁶. Of course, a purer than the purest thoughts always has its purpose in delivering bliss into the hearts of others, not oneself; in such a scenario, the hearts of both the bearer of these blissful thoughts and the person whom they have as a target ought to feel blessed by being washed by their subtle, solely spiritual waves. And indeed, if we observe life and our effects on it with great subtlety, we are bound to realize that all of our deepest desires and visions appear to be continuously reflected onto the state of our world. Which is why a

wonderful practice for boosting the divine spiritedness of our being consists in visualization of worldly creatures and objects bathing in a divine, healing light. For, in the end, as we have come to see over and over again throughout the course of this book, convincing oneself that one is healthy is by no means a way to boost one's healthiness in this reality that constantly teaches us that exaltation of Thou is the only path to the enlightenment of I and in which, therefore, convincing oneself that the world is healthy is the only way to become truly healthy inside. To visualize the brilliance of another, thus, stands for a million times more effective approach to enkindling brilliance inside oneself than zealously working one's way, mentally and physically, to sanctification of oneself only.

The power of imagination and the ability to see others as heading towards heavenly lights and fulfillment of their earthly missions paves the way for the real events to take place accordingly. To that end, each one of us is akin to a lighthouse that constantly emits rays of light of our deepest intentions that imperceptibly illuminate roads that will thence be more likely set off on by the surrounding souls. This is why, for instance, if many people believe in successes of your endeavors, your ways would be illuminated with many guiding lights. Which is not to say that a single person's vision, provided that it is impeccably pure and focused like a laser of love, cannot eclipse a million shallow visions and redraw the paths of destiny posed before the subject of her luminous thoughts. Towards the end of the fable-like horror movie, *The Curse of the Cat People*, there is a scene wherein our little heroine stands on the stairs of a haunted house and frighteningly faces the eerie look of a slayer woman underneath her. Frightened to the bone, she chooses to envision in her lethal enemy the muse of her daydreams, a Serbian fairy whom she had played with in her fancy. It is thus that she miraculously transforms the hostile hands ready to strangle her into hands of peace and lovingness. Likewise, I have always believed that by seeing sheer saintliness in others we magically open the ways towards their becoming truly sainted and holy in the eyes of the Universe. Needless to say, visualization of divine beauties glistening all over other people's spirits opens lifesaving paths not only before the envisioned subjects, but before the bearers of these visions too. The latter, of course, is not even the remotest purpose of such visualizations in the heads of truly blissful souls. For, even though Nature has set the enlightenment of oneself to be a direct consequence of genuine strivings to enlighten another, laying of the paths to prosperity and happiness before other people's feet is to a saintly, truly stellar soul, who craves for no benefits for oneself, the ultimate aim of spiritual endeavors.

However, as of today, we seem to underestimate the power of visualizations. But if brain imaging studies have shown, for example, that visualizing a walk through one's hometown with eyes closed activates the very same centers in the brain that fire when one gazes at the photographs or movies of one's hometown with eyes wide open⁷⁸⁷, nothing should prevent us from having faith in the power of our visualizations to impress their footprints onto minds and spirits of people with whom we cohabit this reality. If we visualize the laying of the ways of salvation before the fellow humans that we keep in our thoughts, who guarantees that we do not really fuse the imaginary with the real by doing so? A sign that this may be true on this karmic plane of reality whereon things given turn out to very well correspond to the things received comes from one's own sense of blessedness entailing this sending of blessing thoughts in another person's direction. Despite that, a short practice of acting in couple with visualizing others as permeated with celestial lights and the cosmic joy of salvation would render our very acts touched by a fairy's wand and surrounded by but a blissful twinkle of sheer divinity. And as ever, our acts would secretly lead to fulfillment of our visions, that is, to bringing welfare to the fellow beings and washing them with a delightful sense of salvation.

Drawing beautiful visions as final causes on the canvas of our mind can, in fact, ease up our tensions in ordinary communication, promoting a direction to thought and increasing the efficiency of our daily meetings with the fellow humans. It can be used as a sort of a mantra that focuses our mind

away from the inert, idle and scattered flow of attention, and keeps it still and attentive. Though keeping it tightly focused, it also provides a way to avoid too rigid, constraining and tiring pays of attention. It also provides a fine standard in relation to which we could much easier judge about the usefulness of our communicational engagements and daily appointments with others.

Therefore, one of the first steps toward enlightenment is knowing that the core of our thoughts, emotions and aspirations becomes invariably embedded in the products of our actions in the world. Play chords on a musical instrument with a heart filled with devotion and the emerging sound waves will mysteriously shine with otherworldly grace concealed within. It is likewise with all the creative acts and events in the world. With every breath we take we weave something of our unique self into the essence of the world. No moment filled with thoughts of devotion, peace and love can be conceived of as being trifled away. This is why I, inspired by the famed communication between Johnny and the security guard in the dark of Mike Leigh's *Naked*, coined a witty apothegm saying that 'future is the present, present is the past, past is the future', the first because every future act will happen in a present time, one way or the other, the second because any sensation of the present is always a blink of the eye shifted to the past, and the third because the way we envision the past in our thoughts paves the way for future, given that our visions are the final causes, the destinations toward which the boats of our beings stream.

Sometimes we also enjoy keeping wonderful landscapes imbued with graceful sunsets at the foundations of our heart. These can serve as handy guiding lights to our own acting in the world. They remind us that we ought to live every second of our lives as if we were a graceful mother who, instead of cold-bloodedly and roughly urging her child to walk beside her, gently brings it into divine light of being with every subtle movement.

By being mere nodes in a giant interconnected neural network of social consciousness, all our thoughts travel from their points of origin to the most distant ends of this structure and back, remaining to traverse it like ripples on a lake for an entire infinity. Knowing this naturally instills an enormous sense of responsibility in us, the bearers of thoughts, regardless of how trivial or miniscule they may be. On a positive note, by being aware of their all-encompassing effects, hope emerges that even a hermit sitting in a cave can readjust the spin of the evolutionary wheel of the whole biosphere merely by producing the right thought at the right time. On a less positive note, this interconnectedness of our cognitions implies the truthfulness of the verse Oasis put in their Christmas song that celebrated the omnipotent nature of human beings, to whom everything becomes possible if only their brains were tuned to the right rhythm and melody: 'It always seems to me you only see what people want you to see'⁷⁸⁸. Very often, thus, the malicious vibe pervading this social consciousness pops the balloons of precious thoughts, just as the bunch of barbarous boys popped the magical red balloon befriended by Albert Lamorisse's blue-eyed son in the movie that won the Academy Award for the best screenplay in 1956 despite having no line of dialogue in it: *Le Ballon rouge*. To that end, acts so powerful that they inspire for life and instill streams of magical energy that could start the chain reaction of enlightenment of the entire social sphere may be impossible to perform without the receptiveness and the positive expectations pervading the social psyche encompassing the performer. It is for this reason that the Christ in the course of his second coming, as envisaged by Carl Theodor Dreyer in *Ordet*, requested that everybody in the room subconsciously allows him to perform a miracle. For, a social setting disbelieving the performer's ability to enlighten it provides countless invisible obstacles before the performer's wish and plan to produce a luminous act, alongside sucking the energy needed to perform such an act with every gaze interchanged between the two. To transcend these energy barriers is not an impossible task by any means; however, the higher they are, the more it takes a supernaturally spiritual creature, similar to the Christ, to succeed.

Perpetually conforming to the ancient Biblical apothegm, 'Deep calleth unto deep' (Psalms 42:7), a.k.a. *abyssus abyssum invocate*, human attention presents an utterly powerful suggestive force. Maybe you have already had a chance to notice how easily the focus of attention of one being can become transferred to another. A being that is focused inwardly tends usually to attract other people's attention to herself. By instilling waves of consciousness into her movements, she spontaneously invites other people to pay attention thereto, which is where the doors to the art of delightful and captivating acting become open. Now, one's attention to other beings and details in the world tends to be equally contagious. By being focused on a particular perceptual element, we create a magnetic allure around it as well, so that the rays of human attention tend to spontaneously bend toward it. This effect is a direct consequence of the truism derived by Juliette as she gazed at the galactic cup of coffee in Godard's 2 or 3 Things I Know about Her: 'An object is what serves as a link between subjects'. Prolonged focus, of course, pushes its objects deep into the subconscious centers of our psyches, where they exert a constant pull on our and the surrounding spirits' minds; be it fear of the mushroom cloud, irksomeness plaguing the dwellers of urban areas or the abstract allure, albeit illusory, of the coolness and necessity of living in San Francisco or New York, all of them can present powerful strange attractors, energy minima which the balls of our thoughts tend to spontaneously roll into, with little chance of escaping. Like a grain of salt dissolving in a glass of water and distributing its content everywhere, so do these thoughts tend to become naturally collectivized and shared by millions through invisible, deeply spiritual channels to which our physical senses are all but sensitive. In fact, a study I always wished to perform was to attempt to show that even watching the videos of people coughing and sneezing increases the chances of developing the symptoms of cold compared to the control population, a finding that, if arrived at, would shake and overturn the foundations of epidemiology by demonstrating the psychosomatic effects on the spread of infectious diseases, the agents of which are known to be present in organisms that would eventually get sick as well as in those that never will, the effects now known to be the cause of the psychological phenomenon of mass hysteria. With this contagiousness of the rays of human attention in mind, supermodels are taught to walk, breathe and think with the ideal of 'making love to the camera', if not 'melting' it, as Woody Allen directed Sharon Stone to do to the train window she kissed in Stardust Memories, and, as many may confirm, they truly end up leaving such impressions on people watching them. To look behind the camera, into the soul of its holder and far, far beyond the frames of the photo that is being made is thus a wonderful way of creating one such impression of curiosity and wonder that shatter all the boundaries and limitations imposed before oneself. For this reason, the acting instructors have paid special attention to teaching the necessity of controlling the visual focus in order to convey a specific message to the viewer⁷⁸⁹. They have known that whereas wavy gazes dissipate the attention of viewers in a myriad of directions, holding on to a specific point of concentration helps the actors to redirect the viewers' attention to the objects focused on and maintain it tightly anchored thereto, preventing its uncontrollable swaying and drifting away on any of the innumerable streams of impressions that enter their perceptual field at any given moment. Of course, gazes directed at each of these focal points by a skillful stage performer are such that even the firmest looks, such as those of Molly Rankin of Alvways at the imaginary Montreal fair in the video for Dreams Tonight, radiate with a dose of softness. In the teaching system of Viola Spolin, the inventor of an incredible number of various theater games⁷⁹⁰, each of these points of concentration was imagined as a ball, similar to the one that Tai-Chi masters envision to be holding as they glide through space, making our communicational alternation between instances of impression and expression essentially a game in which the ball of our perceptual focus is being joyously tossed from one to the other side. And the power of wizardly bouncing this ball back and forth and letting it fly all across the surrounding space can often be enough

to enthrall the watchers and leave them gaping in view of the unfolding of unexplainable magic of divine being around them.

Then, as we continually swim in the sea whose waves arise from the impalpable foundations of the visible patterns of human understanding and behavior, simply being in the presence of spiritually enlightened beings presents a healing experience by itself. The same effect, however, explains why spending time in the presence of people who cultivate desensitized and ill-natured invisible sources of impression and expression could be similarly contagious, though in the direction of providing unbeneficial effects on our welfare. Unfortunately, by uncontrollably drifting through the mental streams of the collective consciousness and unwillingly falling into the energy troughs defined by the suggestive thoughts of surrounding sentient beings, most of the human minds, deep inside of themselves, go through the same agony as that befallen upon the protagonists of Luis Buñuel's *Exterminating Angel*, sitting in the same room for days just because no one dares to leave it, trying to break free from the invisible thread that sews them into submission, but helplessly, like an insect glued to a spider web, remaining its captives. All this time, however, it has taken a witty flip of a coin to convert a problem into a solution, which in this case would be the use of this suggestive mental force not as a trap for our psyches, but as a tool to enlighten the world, if only we should start spinning only thoughts blissful and beautiful; the whole world's attention would then mysteriously enter the spheres of their strange attractors and become spontaneously bespangled and purified. Also, when the spider dies, the web unravels, as the saying from the aforementioned movie goes, telling us in this context that liberating ourselves from thoughts *per se* and entering the mental bliss of the blue skies is another way to escape the sin of submissiveness that empathy, a central column on which the lantern of fulfilled living rests, entails.

What this means is that not only the power of our attention and its effect on defining the resulting experiential appearances should be kept in mind, but the same effects exerted by others on the world of experience that we partly share with each other should be carefully considered too. If each one of us is imagined as having a Hindu tree of wishes planted inside of one's heart, knowing that our experiences are partly shared amongst ourselves implies that aside from our own visions, emotions and thoughts, other people's wishes, which may be beautiful and prayerful or destructive and vulgar, will be reflected in the evolution of our world too. In fact, most of us are not even aware of the extent to which our destiny might be directed toward mediocre paths simply because of other people's visions, in which we may be seen as predisposed for these commonplace destinations. Yet, it is possible to avoid this curse without confining ourselves within an imagined egg-shaped bubble as a protective aura of light that blocks all the incoming rays of emotions emitted by surrounding spirits. The key is offered by the Way of Love and the partial withdrawnness of our attention that it speaks in favor of. It allows us to be different and simply see others as bathed in divine lights, journeying towards some celestial paths that bring salvation for their souls, without interfering with our simultaneous empathic unison with the world seen from their eyes.

Walking on a hiking trail or long distance swimming may provide us with interesting parables of the final causes in the conductance of our actions. Namely, for as long as we do not see the marks of the destination, there is a sense of insecurity in us as we incessantly wonder whether we are on the right track. But once we see our goal in the distance, we begin to feel as if some inner force that guides us towards it is added to our strength. A similar power of our guiding visions may be discerned in any other situation in life as well. When we sustain bright fields of hope and inspiring landscapes that we aspire to reach, both our being and external circumstances seem to develop in the direction of their coming true. And so, although the postmodern philosophies idealize the symbolism of the road on the account of neglecting that of the finish line, here we see that keeping aims in mind is often enough to create the

path leading thereto even through the most unapproachable landscapes, just as much as roads come to be seen as destinations in themselves in the minds of the enlightened ones.

Having glanced at countless human destinies, we might be able to induce the following conclusion: many, if not all, of them have been obviously predetermined by the fire of love of life that resided within them. Once this lust for life and knowledge ceases to be fed from within the being's core, the life itself comes to retreat. Therefore, it is primarily our deepest visions and desires that get to either develop or destroy our beings on the physical levels. Yet, for as long as there is an optimistic luster of the three ultimate Christian qualities – faith, hope and love - underneath our skin, and for as long as we believe that there is still a part of that great mission from God that we have got to live out for others, our life will flourish with gracefulness and charm.

In the end, all the miraculous achievements in life are about great wishes that have burnt within their creators. Whether we are trying to make inspiring works in the fields of arts, sciences or ordinary, casual communications, nourishment of great wishes inside ourselves presents the first step to successful embodiment of our visions and dreams. The Christ walked across the Earth and showed us how having wonderful wishes to help people and live up to the heavenly potentials that all humans are endowed with is the source of divine creativity that each one of us can ultimately attain. To dream and to be are, thus, the magic pair of steps, walking in which is to transform the earthliness in us into an angelical grace.

Michael Polanyi, a philosopher of science who had intensively argued in favor of the essentiality of uncertainty and faith in sustaining the creativity of scientific reasoning, wrote the following passage in one of his essays: 'A spoken word loses its meaning if we repeat it a number of times, while carefully attending to the movement of our lips and tongue and to the sound we are making. All these elements are meaningful, so long as we attend through them to that on which they bear, but lose their meaning when we attend to them in themselves, focally. The famous tight-rope walker, Blondin, says in his memoirs that he would instantly lose his balance if he thought directly of keeping it; he must force himself to think only of the way he would eventually descend from the rope'⁷⁹¹. It goes without saying that this observation is in direct agreement with the idea that final visions and enlightening aspirations ignited within our hearts determine the successfulness of our deeds, irrespective of whether they fall in the domain of sophisticated scientific reasoning or common social endeavors.

This point of view is also tightly connected to the systemic, generally applicable assertion that the interplay between the intrinsic nature of a physical system and the nature of its environment defines the observable qualities of the system. On one extreme, human beings are shaped by their individual biological and cognitive predispositions and drives on one side, and by the environmental circumstances and influences on the other. On the other extreme, electron clouds of atoms are subject to change depending on the charge distribution in their physical surrounding. The same atom or molecule may thus display a drastically different electronic configuration and spectroscopic fingerprint in different microenvironments. This is evident in many molecular spectroscopic techniques in which changes in the internal vibrations of molecules can be detected with the modifications of the medium in which these species are dispersed. As everywhere else in Nature, different environmental settings trigger different internal music of the entities dispersed therein.

As Polanyi further pointed out during his sliding acrobatically from science to language and back on the rope of analogies⁷⁹², the meanings of words and sentences are defined partly by their intrinsic structure and partly by the context in which they are uttered. Once our focus shifts from this natural balance to the structure of words themselves, the meaning of the words thoroughly vanishes. Thus we indirectly prove that words and language are individually shaped as much as they are socially defined. Their meanings are shaped by the implicit visions of destinations that they are meant to orient the persons in communication to as much as they are determined by the structure of the individual letters,

voices and words. If we were to start thinking that linguistic constructions are completely objective statements free from any subjective effects, and somehow forgot that the meaning of words has to be always constructed in the context of implicit messages that we want to stress out and the destinations in the domain of human imagination that we want others to be led to by their means, our ability to be pragmatic and creative in linguistic communications would swiftly dissipate. It is floating incessantly on the balance between these two poles – grammatical, technical mastery and feeding the flame of wonderful aspirations within our hearts - that makes our linguistic creativity and communicational mastery thrive. Certainly, the same argument can be accepted for many other areas of human creativity where living for and from the essence of one's own being and living for and from others are always beautifully entwined.

One of the reasons why the modern scientific practice often seems empty of the romantic charm and profound, alchemical enthusiasm that used to endow scientific endeavors of the past is that the majority of scientists have nowadays lost their faith in the inner beauty and beliefs that ought to underline each research and teaching effort. Unless we believe in strewing the eyes of young scholars with a starry passion for the quest for knowledge, we would never be able to do so, just like we would never be able to reach truly significant scientific discoveries unless our whole beings start living for their sake. The first step in awakening that old artistic lyricism in doing research is to let scientists know that, just like in many other areas where human creativity is exhibited, the technique and know-how are at most only equally important as the great aspirations and wishes that scientific minds nourish within.

The whole of scientific reason ultimately rests on innumerable implicit and explicit assumptions, the existence of which predisposes scientific practice to inevitably reflect the deepest human beliefs about the nature of the physical order. By dissembling this inherent presence of beliefs as ingrained within each segment of science, only damage is done thereto. Thus we witness prematurely and pretentiously deduced conclusions based on a modest set of observations, just because being unsure, uncertain and hypothetic is banned from the language of modern science. And most paradoxically, this thoughtful doubt, incessant questioning of it all and intellectual insecurity present the essential drives of human inquiry and scientific research in general.

In the end, whenever we face difficulties in science and life alike, and it seems that there is no way out anywhere in sight, we should recall that the most fundamental question to ask has ever since been not do we know, but do we believe in finding solutions to our problems, in reaching answers to our questions and coming across treasures in our quests after them. For, a bright vision has always stood at the beginning of each productive journey towards new horizons of being and knowledge.

And to make sure that science as a whole will one day openly restore the balance between purely intellectual know-how and the sparkles of beauty and divine inspiration leaping inside of our minds, we should try our best to be the first to cultivate it. For, like Sandy kept captive in the eerie castle of Maniac Mansion, at this moment of time, as these words are being impressed on these pages, the goddess of science, who had been all about Wonder and Love, stays imprisoned between heartlessly cold walls of an impersonal cubicle of the modern world, shackled and obtuse, hoping that someone like us would magically come and save her. After all, science in this contemporary, crippled form has little to do with the embodiment of the devotion that endowed her in the past, the devotion to reveal the wonders of the world and discover things that will make human lives beautiful again. Once guided by an immense thirst for knowledge, having been the epitome of a sacred quest to reveal the answers to the fundamental questions of life, it has turned itself into a coldhearted profession, separated by impassably vacuous distances from the daily lives of its practitioners. Yet, unless the so-called private and professional lives of scientists start to interfere and through analogies and emotional associations inspire each other, the doors that lead to the most exciting discoveries and revelations would stay shut. As the most renowned

Slovenian scientist, Jožef Stefan pointed out, ‘what science needs today are people with knowledge in their minds and love in their hearts’⁷⁹³. The qualities of bright intellect alone, without the support of the shining grace of the human heart underneath would never be able to reach enduring solutions to the problems of life posed in front of us.

Human heart as the fountain of wishes

‘What makes the desert beautiful is that somewhere it
hides a well’

Antoine Saint de-Exupery, *The Little Prince*

One of the most inspiring things one could do in Rome is to get to famous Fontana di Trevi, turn back against the fountain and throw a coin in it. And at the same time wish something beautiful.

This act is, however, merely a metaphor of something we continually perform with every passing moment of our lives: sowing the spirit of the world with our deepest wishes and aspirations, while facing away from the soil on which they fall and possibly find a fertile ground. ‘I like the view but I enjoy sitting with my back turned to it’, Gertrude Stein said once. And so do we need to look back, away from the direction in which the trains of our thoughts and movement stream, if we wish to glimpse and get hold of the essence of our being and its profound effects on the world.

In the Hindu theological tradition, human heart is metaphorically depicted either as a magic tree whose fruits directly correspond to wishes concealed in its roots or a wishing well that stirs the streams of natural events so as to direct the ship of our being towards fulfillment of wishes with which we have dropped the coins of our thoughts into it. And it is these inner wishes that are involved in the co-creative construction of the world of one’s experience. Products of their dialogue with the mysterious creative force of Nature yield the experiential appearances of the subject’s world.

Therefore, although brilliant visions are indeed able to influence the development of the world, they present only a half of the story. For, only when they are met with great wishes, desires, emotions and aspirations that come straight from the heart can they produce wonderful effects on the world. Heart and mind are, as always, acting as a couple in every truly creative act. Only where ratio and love meet is where the fertile fields of divine creativity are found.

In fact, life is all about wishes and aspirations, directed to both our self and others, for better or worse. Our wishes is what truly builds our beings and the world at their most fundamental. The latter could be seen as a magnificent concert stage in which silent music produced by the aspirations and wishes of billions of stellar hearts arises and floats. The dream of one creature may get incarnated in the reality of another, like the way the dream of bombers flying over the city of Lethe, in the midst of which a character awakens on a sofa, under a Don Quixote drawing, in the first scene of Roy Andersson’s *You, the Living*, comes true in the last scene of it, before a completely different set of characters. Each such dream, even the shiest one, gets released from the confines of our sentience and into the world, where it blends with the dreams of innumerable other coexisting creatures, forming a symphony that underscores our every gesture, every thought. This music is at the root of the whole existence, inaudible even to their creators. Its majestic notes collide and combine, forming harmonies that in togetherness co-create the world, though always in touch with the other co-creative side, that is, Nature, that is, God.

Sometimes I see life as a dance of evanescent appearances that arise in form of spirited waves from the sea of invisible qualities that swirl at the bottoms of human hearts and minds, including, most prominently, love and lust for knowledge and life.

Occasionally we are able to glimpse the reflections of our deepest spiritual intentions, though in general they are invisible to us, just like any propositions of human reasoning. And yet, these spiritual

aspirations and implicit assumptions are ingrained in every detail of our experiential and epistemological worlds, respectively. Still, strictly speaking, whenever we observe these implicit premises of thinking, we do it on the basis of some other implicit presuppositions. And the process of trying to explicate them resembles our vain attempts to stick to our own shadow or touch the end of the rainbow. Yet, this inability to directly observe the implicit intentions that truly outline the essence of our spirituality is inescapable, just as the roots of a tree need to be hidden underground and left concealed from the face of the world to be able to sustain the burgeoning of its visible stem, branches and leaves. The awareness of this inexplicability of the essence is, however, a powerful epistemological launching pad for the flights of our reason into something beyond it, ideally into the sublime skies of realization that beautiful being is a true aim of our intellectual endeavors, as opposed to finding aim in the process of epistemic enrichment itself. Or, as put into words by Karl Jaspers, 'Quietly, something enormous has happened in the reality of Western man: a destruction of all authority, a radical disillusionment in an overconfident reason, and a dissolution of bonds have made anything, absolutely anything, seem possible. Work with the old words can appear as a mere veil which hid the preparing powers of chaos from our anxious eyes. This work seemed to have no other power than that of a long continued deception. The passionate revivifying of these words and doctrines, though done with good intentions, appears as without real effect, an impotent call to hold fast. Philosophizing to be authentic must grow out of our new reality, and there take its stand'⁷⁹⁴. Finally, although this sense of epistemological groundlessness lightens our mind and prepares it for the flight toward the sublime, it is by no means a call to cease to dig through the spiritual soil of being in search of its stable roots. For, like the saint from La Grande Bellezza, who ate roots and roots only because she, in her own words (though incredibly scarce as the result of her having given the vow of poverty, which, she thought, must be lived in every aspect of one's being, lest one be a hypocrite), believed that 'roots are important', so must we understand that all things perceptible at the physical plane are but manifestations of battles and courses taking place at the more fundamental, spiritual plane, which we are to feel an incessant intimacy with if we wish to conquer for good this mystical puzzle called life.

To be rooted in spirit is to find all actions fructifying from its feelings perfectly logical and appropriate. Remember when we fall into a state of anger how all our infuriated actions seem to us at those moments as reasonable and necessary. Only when we 'step aside', so to say, and when our heart with its invisible aspirations becomes purified again do we see the irrationality and destructiveness of our former deeds. And then we regret for the things said and done. The reason for this 'lack of reason' lies in the fact that our acts and thoughts spring from some hidden roots that, among other things, hide the essence of our spirituality. Reasonability of the visible traces of our thoughts and being is always measured in connection to its invisible essence. As St. Paul the Apostle said, 'we look not at the things which are seen, but at the things which are not seen: for the things which are seen are temporal; but the things which are not seen are eternal' (Corinthians II 4:18).

On the other hand, we should not be so enormously pitiful about things we said in our disturbed states. For, in accordance with the fundamental role of the Shakespearean 'dreams of which stuff is made', it is our inner wishes, feelings, prayers and aspirations that have the sole power to resolve the conflict situations we had initiated by our actions and words. They can miraculously rearrange the worldly appearances by sending the loving angels of beautiful thought to the beings we care about or we happened to have hurt in conversation. For, at the end of the day, the words we utter matter little compared to the intentions and the overall spirit from which they emanated. And to be rooted in spirit is to be immune to the malicious words flying like poisonous arrows all around us.

Moreover, in pursuing the attitude that continuously highlights the importance of our deepest wishes and prayers, we should not fall to the opposite side of this balance between visible and invisible,

thinking that we could do our best by uselessly sitting filled with leisure and simply wishing well. No, the concept proposed herein is connected to the idea of Middle Way, which this whole book argues in favor of. In this particular context, it suggests that we should cultivate both the leaves and the roots of the trees of our being and knowledge. We ought to care about our visible actions, striving to make the world a better place on a perceptible plane, and to equally foster the purification and active involvement of these deepest qualities within ourselves in everything we do. As King Solomon preached, ‘the horse is prepared against the day of battle: but safety is of the Lord’ (Proverbs 21:31); or, as Tenzin Gyatso, the 14th Dalai Lama, more recently said, ‘Trust in God, but keep your car doors locked’, a phrase that, on a side note, albeit meaningful, reflects the mundane and prosaic state of today’s displays of religious thought.

Finally, this is the point at which we could recall the ancient Hindu story wherein three monks walked down a forest when a roaring tiger suddenly jumped in front of them: the real devotee of God was neither the monk who gave up any hope and desperately uttered, ‘Brothers, we are already eaten’, nor the one who fell on his knees, saying ‘Brothers, in God and God only is salvation, so let us quickly pray, for only that can save us’, but the one who, as if holding the Hafiz’s verse ‘Why ever trouble yourself with God when He is so unjudging and kind’⁷⁹⁵ tightly sealed to his holy heart, serenely observed, ‘Brothers, why should we bother God; let us all climb the tree instead’. For, the cold, emotionally detached rationality that is deaf and blind to the voice of God calling on us all through the passageways of our heart, wishing to gift us with the complementary powers of insightful intuition and heartwarming emotion, is equally inauspicious for the growth of our bodies and souls as a faith that obstinately refuses to acknowledge the merits of practical ideas and deeds. After all, as it is said in Qur’an (Al-Rad(13):11), God will help a man only insofar as he helps himself – ‘tis a holy writ that indicates the inextricability of rational and spiritual thought in the spheres of knowledge of the most celestial of mindsets that have endowed the Earth with their enchanting presence.

Pervading every single detail of our cognitive realities, reason and love present a pair of cosmic poles of colossal importance for our understanding of the nature of life. Through their touches, they give rise to the features of life usually worth endless astonishments. Wherever we get to feel a synchrony between reason and love, we could also sense an immaculate harmony residing therein as well. If we were to depict our life as a ship sailing across oceans in quest for the new coasts of knowledge, the compass in our hands would correspond to the power of reason, whereby our ability to spread the sails of the ship towards oceanic winds would correspond to allowing the source of compassionate and loving intentions that dwells in our hearts to uplift our entire being on its wings. Should we neglect the importance of knowledge that the compass of reason can give us and begin to think that we would do well with only relying on the fire of compassion within our hearts, our boat would float back and forth without a precise sailing course, losing its creative momentum every now and then because there would be no consistent vision of the aim on our minds. This would be similar to a basketball player who, carried by emotions of the yelling fans, loses its calmness and focus, enters a cranky mood and, as a result, makes a bad move or a foul. For, it is the balance between being on the road with one’s whole being and holding on to a vision of the destination as the purpose of one’s journeying that reflects a truly harmonious living attitude. Elaborate choice of behavioral strategies brought about by rational means and cultivation of the fire of loving aspirations as the driving forces of our actions in the world should be always kept in continuous reference to each other. That is, on one side of our consciousness we should run an endless stream of comparisons between alternative choices for an each conceived action, while on the other side of it there is an underlying stream of our desires, intentions and aspirations that secretly guide these decisions of ours. People in cognitive sciences thus frequently talk about two brain hemispheres, the left and the right, the former of which is equipped with analytical skills and the latter of

which is dedicated to intuitive tasks, whereby the maximization of human creativity corresponds to a balance in their activity.

However, it is essential to be aware that our intentions are the basis of every type of logical thinking. Namely, in order to start an analytical process of comparing the desirable and undesirable outcomes of any action that we consider performing, we first have to come up with the question about whether to perform that action or not. And where does that question come from? Why do we think only about the actions that we normally think about, and not about some others? Simply because the heart of our intentions is the one that raises these acting propositions in front of our consciousness. We first intend to do something, and then invoke our reason and analyze if the task conceived is favorable or not. Therefore, we can be sure that there is a substrate composed of our deepest aspirations underlying every algorithm that our reasoning proceeds according to.

‘Take care of the sense and the voice will take care of itself’⁷⁹⁶, is the message reminiscent of the advice given by the Duchess to Alice in Wonderland, and is also applicable to any semantic communication. Namely, if our attention in the act of communicating with others ends up superficially with mere words and their meanings *per se*, our participation in it would be predestined to be empty and fruitless. We have to pay equal attention to the intentions that radiate from our heart and mind, as if from a sun, because it is them that truly form relationships with the surrounding beings.

In this sense, there is the example of learning new languages. Namely, in order to learn how to speak a novel language without any foreign accent whatsoever, it is not enough to move one’s tongue and lips in a proper way while vocally reproducing the elementary sounds of the language. It is equally significant to reproduce the whole melody of the colloquial speech. And that this music implicit in a particular accent can correct improper pronunciation of individual words can be seen whenever a non-native opens her mouth and after a few or so incorrectly pronounced words lets the melody guide the way she speaks, automatically correcting her accent. This is, of course, a clear example of holistic, top-down effects that are in the context of linguistics normally limited to textual constructions⁷⁹⁷. However, in order to succeed in excelling a new language, it is essential to adopt the mental attitude of its native speakers. Or, as noticed by Robin Collingwood, ‘An Englishman who can talk French, if he reflects on his own experience, knows very well that he feels differently when he talks a different tongue. The English tongue will only express English emotions; to talk French you must adopt the emotions of a Frenchman. To be multilingual is to be a chameleon of the emotions’⁷⁹⁸. Indeed, many times while talking to my fluently bilingual friends I witnessed how sentiments sent out in the air for the spirits of all the conversation participants to bath in completely changes when language in which we communicated was switched. Having had their dewy-eyed emotionality and glorious outbursts of passions fluidly transformed into either valley-girl shallowness or stiffened and characterless bleakness in behavior by simply switching from using Serbian to using English in conversation, some of my Serbian-American acquaintances have thus exhibited spectacular personality schisms as a result of their bilingualism. Modifying the essence of one’s personality when learning a new language is, however, neither doable nor desirable on most occasions, as can be exemplified by the case of the former Californian governor, Arnold Schwarzenegger⁷⁹⁹. Namely, soon after he began attending courses on accent reduction, it was realized that perfect success would equal erasure of his characteristic personality and replacement with a new one, something that was not seen as desirable in view of the actor’s political ambitions that necessitated cultivation of the already existent persona that the public admired. Therefore, the tutors changed their core methodology and focused on maintenance of his original accent while merely clarifying the pitch and resonance so as to make the voice more understandable to the natives. Similarly, in my own attempts to reach a proficient level of speaking American English, I realized that - in addition to reproducing the vocal sounds by placing the tongue at the right places, opening lips correctly, moving

my tummy in and out in producing deep sounds right from the belly, slightly narrowing the throat, and letting the sounds travel all the way up the throat, as if almost reverberating against the crown of the head - I had to give up on expressing self-confidence through humbleness and adopt the other way around: expressing humbleness through self-confidence, so typical of modern American natives. Only after I had succeeded in that did my voice begin to reverberate with the proper sound and color. And then, as it often happens in life, once one wins the battle for blending with exotic foreign worldviews, one gains a perfect view at the tradition left behind and only then recognizes its value. So has it happened with me to some extent and today, when I am being asked if I speak English, my answer is that I speak my native Serbian only and only through this native Serbian do I speak English, meaning, of course, that I speak it with the mindset of my mother tongue, with its intonation, melody, flavor and spirit, thus creating a linguistic *mélange* that oftentimes startles and mesmerizes the casual listener.

Therefore, to sum up, one has to be changed from the roots of one's cognition when it comes to profoundly learning any new skill or mastery. To let one's 'convictions melt like ice cubes in an ocean'⁸⁰⁰ in an encounter with a worldview to which one becomes open unconditionally, with no reservations, is a prerequisite for equipping oneself with the new knowledge to a deepest degree. This is why the famous Zen archer taught his disciples that they first must become one with their targets before they can grow into masterful archers⁸⁰¹. On the other hand, when it comes to my own ambitions in learning new languages, I have always aimed not to perfectly blend with the natives, but to achieve a balance between adaptation and originality. My ideal has been to adapt myself to vocal characteristics of the language just enough so that I could be understood well, but also to preserve a distinct color and melody. Because, in the end, the opportunity to learn a new way of communicating at an older age presents too great of a chance to be ruined by learning it perfectly well. It, in fact, leaves so much room to consciously blend a sense of uniqueness and smart adaptivity; to instill one's own sense of beauty into the music of the language instead of being a 'slave' of linguistic expressions ingrained too deeply in us, as in the case of languages learned during childhood; and to attain the beautiful systemic ideal of diversity in unity. For, each harmonious evolution necessarily preserves the balance between becoming the same as everyone else, through respect and empathy, and still remaining unique and true to oneself. To assimilate just about enough to be understood and to stay true to my inherently unique self so as to continue to amaze the world with every winged word softly sent into the air was thus the aim I posed before myself. Thus I told myself I would always freely and spontaneously let the sounds of my voice bounce from and reverberate along every tiny point in my vocal tract, endowing me with a charm of subtle melodies played behind my voice. Instead of reproducing stuffy or squealing American voices like the speakers who badly want to adapt and be the same, such an approach would have given me a chance to be special and understandable at the same time, which is the feature of every progressive pattern in life. This approach, of course, has its own difficulties, which are mainly related to an inability of one such intelligible, but unique way of expressing oneself to promptly establish an emotional connection with the reader or the listener. However, challenges such as these always strew the path of those who follow the line of novelty and/or determinedly walk along middle grounds, in the spirit of true peacekeepers, having to avoid arrows flying from all sides, while not being able to find a home for oneself, rejected by all sides as foreign and unfamiliar thereto.

Getting back to the discoursed balance between reason and love, we may notice the following. If we start now paying too much attention to what the compass in our hands has to say and forget about filling our hearts with devotion to fellow beings and Nature (i.e., God) as a whole, we would become overwhelmed with the knowledge of where we are, though this knowledge would not make us truly happy persons. As with the devil from the *Paradise Lost*, lost along the labyrinths of his mind in endless vain attempts to find the way out without referring to the transcending power of love, our knowledge

and awareness about our place in the world would, in fact, seem terrifying to us. Scared and lost would we walk and wake in the night once we fall from grace of the balance between reason and love into this abyss of the domination of pure reason. But once we infuse each cell of our being with the sense of charity, empathy and a great, mountainously moving wish to live our worldly mission for the sake of sanctifying others, we would share the fate of the character from Ivan Karamazov's dream - who had found himself on an endlessly long stretch of the road to the heavens, requiring a whole infinity to be traversed, but suddenly realized that, on the wings of love, he could have crossed it in the blink of an eye⁸⁰² - and step from this insolvable labyrinth of logic into wholly novel dimensions of being. As if acquiring angelical wings, at those majestic moments of enlightenment, we would be absolutely sure that there is no limit to the radiance of our spirit.

But still, the question remains: who sends the winds that enable us to voyage forth? Well, no one else but Nature, the other creative half of every action in the Universe. This is so because we do not inhabit a solipsistic, neo-Schopenhauerian world in which our aspirations and decisions are plainly mirrored in the appearance of the world of our experience. We have climbed the tree of life a bit farther than the carnivorous animals that see only the reflections of themselves in the eyes of their prey⁸⁰³. We have learned how to complement the constructivist with the objectivistic and engage in empathy by seeing the same and exchanging elating energies for the soul thereby. In other words, we live in the world in which every act of creation is an act of co-creation. Both man and Nature play equally significant roles in each creative act we conceive. It is the dialogue between human mind and Nature, spirit and God, the soul and the Universe that could be found immanent in every detail of the world.

This point is exactly what prevents us from falling into an idealistic world in which all would be falsely seen as arising from the well of wishes concealed within our hearts. Knowing that the world is not a solipsistic arena in which all our dreams come true, but a divine stage upon which an incessant dialogue between the desires of the human soul and the guiding voice of God takes place, we could overcome many disastrous consequences of the former worldviews. One such point of view has been recently presented in the popular book and movie, 'The Secret'⁸⁰⁴, yet another 'treatise on how to get God to serve the demands of self-centered individuals'⁸⁰⁵, as some may say, pointing not only to powers hidden beneath the depths of the human mind in terms of our deepest aspirations and desires, but mainly celebrating the phony values found in satisfaction of thirstiness for material wealth and monstrously egotistic attitudes grown along the way⁸⁰⁶. Believing in oneself and holding that 'God helps those who help themselves', as Benjamin Franklin put it, is an inherent aspect of every creative personality, but if this individualistic and self-centered attitude fails to be balanced with the burning wishes to save the surrounding souls from their spiritual ailments, with kindhearted trust in other people's opinions and with an interest to read small signs that Nature strews on our ways, it may have disastrous consequences for one's spiritual development. Any opposite extreme attitude, based on neglecting the sense of self-responsibility on the account of a blind obedience of rules and principles proposed by others, would lead to a similar fall from grace. Expounding idealistic ideals such as these can indeed be balancing in the current times still dominated by objectivistic descriptions of the world that the modern physics mistakenly sticks to, but in the long run it is only the balance between subjectivism and realism that can be applied for a consistent explanation of the physical/experiential phenomena from both scientific and theological points of view.

This viewpoint reminds us that our visions and dreams can be sources of the most enchanting senses of beauty that we could ever come to experience, but can also lie at the roots of the feelings of desperation, envy and anger. In the end, it has been known for a long time that mismatches between human concepts of the way reality evolves and the reality itself is the cause of many mental disorders. But we should never underestimate that an imbalance between the way we imagine what the world could

be in our visions and the way it looks in our eyes presents the driving force for exhibiting any creativity in life. If the way the world looks in our eyes perfectly fit our visions of a perfect order in it, the need to rise and create something that fosters an improvement and evolution of that world would be nonexistent. And this is probably why people often maintain that a line that divides an autistic and mentally abnormal and disordered mind from the one of a creative genius is thin.

The art of balancing the states of balance and imbalance was earlier in the text highlighted as the ultimate systemic balance of human creativity. In this case as well, I have in mind the art of stepping over the line and guiding our visions to freely deviate from the physical appearances and yet preserving the thin trace that will help us bring all the treasures found on the way back to the moderate frames of reality. We have to be brave enough to embark on the voyage of our dreams and thoughts that we believe will bring benefit not to our spirit only but to the whole humanity as well in order to be successful in what seems as the ultimate adventure of the human mind.

Hence, we could recognize that every dream at its core contains a tiny sprout of dissatisfaction with the world as perceived by the dreamer. No wonder then that human visions are indeed akin to dynamite boxes that could on one side either implode, delivering enlightenment to their bearers, or explosively clear the path through the granite obstacles posed on the ways of the world, while on the other side they could uncontrollably and suddenly turn into seeds of destruction of both ourselves and the world. In the end, however, the loss of dreams that make our worldviews shine with exuberance accounts for many, if not all, forms of depression.

In that sense, though, we should remind ourselves that, according to the co-creational thesis, the underlying creativity of anything we perceive, think or do is always spliced to partly us and partly Nature. If we were to think that the ultimate artistic creativity lies in a perfect match between our visions and the final appearances of our works, we would never reach an artistic excellence and the ideal of perfection. In order to be perfect, we have to leave the space for imperfections to fit in. Thus, artistic perfection is not tied to flawless copying of the blueprints of our dreams onto the substrate of the reality. Likewise, it is the preservation of the frail and delicate balance between our enthusiastic strivings to make our benevolent dreams change the world and our acceptance of the world as it is that is crucial for attaining perfection in the art of living. So, with our dreams showing absolutely no chance of ever becoming perfectly fused in with the reality, we should not become disappointed and desperate. Instead of striving to satisfy our dreams for good, we should always head towards the horizons that will expand our questions under ever more beautiful contextual skies and thus deepen the starry wells of wishes within ourselves. For, in the end, not the art of simple arrivals at aims set forth before ourselves, but the one of keeping them within our hearts, surrounded by a bright glow of faith, hope and love, is the one that reflects the essence of the symbolism and philosophy of the Way, of constant journeying toward the end of the rainbow, through rain and sunshine alike.

And as we trace the divinely penciled path of our lives, we should know that our dreams are mysteriously instilled into everything we see, think or do. Hope is that our dreams and aspirations may continue to live with the products of our work and travel on the waves of the invisible essence of the world, so as to inconspicuously inspire and guide innumerable souls on Earth toward spiritual fulfillment. Lest we be swallowed by the giant who roams around the forest of our minds and feeds on those who spin idle, egotistic thoughts, we must continue to dream and dream only, in manners so beautiful that they could not be expressed by these words. For, through dreams we lay bricks on the road to salvation for our piteous selves, for the few beloved souls lying near us on the transcendent starry sky whereon worldly spirits faintly shine, and for the world as a whole. Hence, squander not a second, but go out, run across the hills and meadows and echo the dreams of you, of fellow earthlings, of all life, and of dreams *per se*, dreams woven by the depths of your soul like prayers in motion that, when beautiful

enough, tear apart the strands of reality to redraw the paths of destiny and make true all the seeds of wishes sown across them like stars. And then, one day, under the dome of a burnt sienna sunset, we may realize that this dream of the all-pervading and everlasting nature of our dreams has always stood as the one of the most beautiful dreams of our lives.

As of today, we should keep this dream firmly anchored to the seabed of our heart. It will make everything we see, think or do shine with an impeccable grace. For, when the foundations of our spirit are built with the bricks of ancient wisdom and lit with sunny, bright and optimistic visions, all the visible signs of our existence and creativity will point to the dance of divine joy, penetrating every miniscule detail of this world.

The guiding lights of the human heart

‘Ask, and it shall be given you; seek, and ye shall find; knock, and it shall be opened unto you: For every one that asketh receiveth; and he that seeketh findeth; and to him that knocketh it shall be opened’
Matthew 7:7-8

Each impression is first swallowed by the heart. Each expression at its roots also radiates from the unfathomable depths of the human heart. This is why Blaise Pascal famously proclaimed that ‘heart has its reasons of which reason knows nothing about’, whereby King Solomon preached that we should ‘keep thy heart with all diligence; for out of it are the issues of life...for as he thinketh in his heart, so is he’ (Proverbs 4:23...23:7).

The foundations of our heart present a hidden guidance responsible for all our fruitful endeavors in the world. Our deepest desires, wishes, tendencies, anticipations and aspirations in a mysterious way guide the evolution of our beings and the whole life. What we desire at the bottom of our heart mysteriously directs the actions of our being towards their fulfillment. Therefore, we should learn the secrets of our heart prior to becoming engaged in any creative action in the world. After all, ‘how you gonna win if you ain’t right within’⁸⁰⁷, as Lauryn Hill’s popular line goes, iterating the point that devising strategies and steps that should lead to specific states is fruitless unless supplemented from the very start with the tuning of the heart to the right frequency.

Benevolent and motivational thoughts have been traditionally considered among the postmodern spiritual healers as sufficient to turn even the blackest of the black holes of depression in our consciousness into suns that ceaselessly shine with happiness. Yet, what is often overlooked in this context is that just like smiles can affect how we feel, but in no way present the sole key to feeling good, the same can be said for thoughts that are patently invoked with the purpose of making us happy. This is so because the roots of our happiness lie much deeper than the rather shallow sphere of our psyche where mere textual thoughts circle in orbit. The semantics of the hush of the river of spirit that stream through our heart is thus quite often diametrically opposite from that of the thoughts spun in our head, and that especially so in the modern world wherein infinitely pure souls upon birth are systematically infected with the virus of hypocrisy that will pose innumerable gates of untruthfulness between the two and that will obstruct even the most avid of adventurers in their wishing to cross this magical path. This may also explain why a recent study revealed an overall negative effect on mood of self-affirming statements in people with low self-esteem⁸⁰⁸. The most positive thinking in my microcosm as well as in the personal universes of Zen Buddhists has thus been no thinking at all, that is, wiping out any verbal thoughts and letting the silent vibe of the spirit take over my being and guide it along mysterious ways. Although there is a feedback loop that connects the surface of our thoughts and physical expressions

with the spiritual core of our being, in which causes and effects are inextricably entwined, changing the direction of the rivers of our heart, to whose music Nature responds in the course of our lives, is a mission that requires far greater imagination and tenacity than that involved in sheer repetition of mantras or any other suggestive thoughts.

After all, if we were to look deeply into the surrounding creatures with the eyes of a spiritual superman, we might be able to realize that, ultimately, their beauty lies in the beauty of yearnings, inner drives and aspirations that they carry within. And these cannot be easily explicated to themselves, even during the most insightful ruminations, let alone to others. Yet, human intentions present the torch in our hearts that enlightens every atom of our being from the very roots. When it shines forth with blessings and purifying aspirations, the waves of healing harmony wash over us.

It is no wonder that the answer to the mysterious path of human destiny that the great Oracle in Delphi pointed to was not tied to the cold and inhumane powers of distant Gods, but to the depths of human nature, manifested in the famous saying: 'Know Thyself'. For, just like the interior of the Earth is a far greater mystery to the scientists than what goes on in the outermost layers of the stratosphere or inside of even the most distant stars of our galaxy, so is it the fate of man to remain the greatest secret to himself in the whole of Nature for as long as he lives.

The roots of these sources of either beneficial or devastating effects of our actions in the world extend deep, deeper than the deepest seafloor of the sea of our soul. So deep they reach, in fact, that they are usually completely immune to our attempts to change them with mere textual thoughts or superficial desires. Only emotions, suggestive vibrations of mantras and heroic aspirations that are guided so as to swirl at the bottom of our heart can induce the change. And even then, it may take as much time as is needed for a cherry tree to fructify after being planted as a sapling before our attempts to sanctify our spirit truly bear fruit.

This may be the essence of spirituality of human being in general. These hidden links spread between our hearts and the appearances of the world around.

Simply saying, great and benevolent aspirations have to produce deeds that contribute to welfare in the world, although sometimes in unobvious ways, whereas malicious thoughts tend to produce the corresponding, ill-natured effects in the world. However, the tasks of evaluating both the qualities of our deepest intentions that underlie our actions on one side, and the qualities of their effects in the world on the other inevitably remain incomplete on each occasion. This is why these hidden connections might present the ultimate mystery of living and the topical foundation of every conceivable theology. It becomes clear, then, that 'the unapparent connection is more powerful than the apparent one', as Heraclitus thought.

Many are tales adorning the cultural heritage of humanity that convey to us the elusiveness of attempts to establish a direct correspondence between the internal and the external, including the Biblical Book of Job and the ancient Taoist story about the horse-keeper Po Lo's confusing a dun-colored mare with a black studhorse and bringing a seemingly lame horse to the king's court instead of a superb steed he was sent on a search for, causing an avalanche of scoffing at first, but then proving to all to have found a magnificent animal. On a more delicate plane, these narratives stress the impossibility of figuring out exactly when the state of our world and the goodness written within our hearts are satisfactory or not. Seeing the seeds of benevolence that sleep in our hearts presents the ultimate clairvoyant journey to the center of the Earth of a kind, though, with the latter being a metaphor of the planetary spirit of ours, still circling around a sun in hope of learning how to awaken similar starriness within ourselves. However, closely related to the fact that only an artist can know how good and gracious his pieces of art are, we are not able to gather a complete insight into these wells of wishes of others based only on observing them, let alone on reasoning based on superficial meanings of their

words and acts. Because not what mouth speaks about, but what hearts quietly sings from underneath defines the qualities of the man's action and being in the world.

A parallel perspective may be now established by comparing the epistemological foundations that mysteriously guide our cognitive processes with the general nature of reasoning. Namely, any framework of reasoning is based on an inherently tautological set of premises, that is, statements that are proposed, but neither proved nor provable in the same framework of reasoning. In fact, as we always compare the conceptual results derived upon the given propositions with the experience, the validness of these propositions must remain concealed. What is more, the finest propositions that are normally implicit within explicit propositions (e.g., human concepts of space and time that are ingrained in most of the premises within the explanatory systems of physical sciences) present a sort of a 'blind spot' of one's reasoning within the given logical system. Although they could be partially explicated in another framework of reasoning – in a same way as literal blind spots can be noticed after we switch the observational perspective - the foundations of this new system of reasoning would present another set of blind spots. In fact, the more we explicate the patterns of reality, the richer and more ramified the implicit patterns that sustain the former become. And since the majority of these blind spots are consequential to our biological constitution, they would remain permanently present despite the hypothetical changes in the frameworks of reasoning.

Physics and metaphysics thus faithfully mirror each other within every conceivable framework of thought, and we can be sure that if the metaphysical foundations were built and sustained with benevolent wishes in the heart of the builders, its visible portions would radiate with stability, graciousness and beauty to the world. Or, as expressed in the timelessly relevant words of Jesus, echoing across seashores, hammocks, groves and meadows of past, present and future, 'Whosoever heareth these sayings of mine, and doeth them, I will liken him unto a wise man, which built his house upon a rock: And the rain descended, and the floods came, and the winds blew, and beat upon that house; and it fell not: for it was founded upon a rock. And every one that heareth these sayings of mine, and doeth them not, shall be likened unto a foolish man, which built his house upon the sand: And the rain descended, and the floods came, and the winds blew, and beat upon that house; and it fell: and great was the fall of it.' (Matthew 7:24-27). Hence, when intentions and aspirations concealed behind the veil of our thoughts and actions are colored with a graceful glow, all of our expressions will spontaneously send blessings all the world over. Irrespective of whether superficial glances directed at them will suggest to the observers that they are all about pure formality or foolishly extrovert emptiness, the blessing waves of our expressions could not be stopped and will wash and crash over the creatures of the world, overwhelming them with the heavenly signs that point to the way of their spiritual ascension.

The metaphor of the concealed foundations can be, furthermore, invoked in verily any situation in life. Primarily because the interrelation between the invisible roots and the visible stems, leaves and fruits presents one of the most elementary systemic relationships one can conceive of. In it one finds a permanent and impalpable source of Mystery, the driving force behind the evolution of being and knowledge. Or, as Lao-Tzu wrote in the opening song of Tao-Te-Ching, 'Mystery within mystery, the gateway to all understanding'.

Acknowledging the essential role that premises and intentions play in human reasoning and the formation of our concepts about ourselves and the world goes hand-in-hand with the co-creational thesis, which tells us that the world of experience of each one of us arises at the intersection between its objective aspects, independent of the nature of the observer, and subjective ones, actively constructed by the observer. As a result, even the tiniest detail of the world as we perceive it hides the essence of our being as much as it mirrors the global features of the world, the beauty of which is independent, yet in a perpetual touch with ourselves, as in accordance with the Way of Love and the simultaneous distantness

and unity that it represents. Or, as Arthur Eddington, the man who set the limit to the luminosity of the stars and conducted the expedition to the eclipse of the Sun that proved the relativistic Universe, beautifully summed this up: ‘All through the physical world runs that unknown content which must surely be the stuff of our consciousness. Here is a hint of aspects deep within the world of physics and yet unattainable by the methods of physics’⁸⁰⁹. Such instances during which we recognize the bits of our consciousness dispersed all over the fields of reality, making a shift from an objectively realistic worldview to a co-creational one, may be seen as authentically psychedelic, knowing that the latter word is a composite of the Greek words *psyche*, meaning ‘soul’, and *deloun*, meaning ‘to make apparent, show’⁸¹⁰. Thence, in the blink of an eye we become illuminated by an insight that the perceived reality is a perfectly balanced blend of who we are at the given moment and what the world really is, an inseparable amalgam of our celestial soul and godly Nature in their unending spiritual communication.

Every experiential detail thus reflects the veiled essence of our own being in terms of our deepest values, wishes, dreams and aspirations. That is, it mysteriously points to the very heart of ourselves. When the sacred seeker stood unwaveringly before the Sphinx and the Sphinx asked him what it was that has four legs at dawn, two at noon and three at dusk, not only did the question explicitly revolve around the elusive line that separates beginnings from ends, but the answer also made a full circle and ended in the point of its origin - the seeker, himself, in all his sacredness. And like the answer to the question of the Sphinx, the end of every complete observation takes us back to the beginnings: to the very heart of the observer. However, since the co-creational thesis suggests that the foundations of both the subject and Nature are concealed within each experiential detail, we could also recognize the foundations of God in every minute sparkle of our cognition and in every natural detail. By keeping one ‘eye’ of ours on the foundations of our epistemological attitudes and the other ‘eye’ on the ontological foundations of existence, we are, in fact, able to stretch the tiny threads of true religiousness that will vibrate with an ardent music along the pathway of our spiritual growth, the growth that has its roots in becoming smaller than the smallest speckle of dust, dying in divine beauties from one moment to the next, just like that Biblical seed (John 12:24-25) that we held on the palms of these pages that are soon to fold, and tirelessly extinguishing the vicious vigor of our ego in the ocean of One.

Thus, as we look forward in our explorations, we are simultaneously looking back towards the very beginnings. And that is the perpetual course that the developing humanity is on: to expose the foundations of our creativity to the same extent as we unveil novel inventions and discoveries. Hence, as we enrich the world around us, we should make sure not to underestimate the value of enriching the worlds within. At the same time, we ought to be aware that sacrifices made on the practical plane, chaste and charitable, untainted by the venom of self-interest, are like keys that unlock the steeliest gates on our magnificent meditative journey to the center of the soul. For, the spiritual evolution has its roots in the informational evolution, and *vice versa*. The stars in and out merge into one.

The same observation can also be placed at the end of this chapter. It is the way back, towards taking care of the foundations of our existence, both epistemological and ontological, that opens the real path forward in front of us. That seems to be the way to face the wonders of the human spirit and God, for they both reside at the very foundations of our experience.

Epilogue: From pebbles to stars and the way back

As in all great books and stories in life, we have passed the whole circle from beginning to an end. And now, at the end, as ‘the drawing of this Love and the voice of this Calling’⁸¹¹ come near, we can see the beginnings in a new light.

This book has started with a sense of wonder awakened by the starry sky and ends with our enchanting views of the guiding lights of the human heart. Thus, we realize that to deepen and diversify the beauty of stars and the world we should look deep into ourselves and beautify the foundations of our beings. But to succeed in that, we have to rely on the miraculous power of wonder in our facing diverse mysteries of the world. The secrets of the beauty of the world lie within us, but the way to meet the essence of our beings traces through wise and lucid reading of the responses of Nature to the deepest qualities cultivated within ourselves.

Immanuel Kant referred to two ultimate sources of an eternal wonder: the divine ethics within us and the starry sky above us. And the co-creational thesis that stretched through this book filled with starry ideas like a Milky Way has pointed out that no matter how distant and untouchable to each other these two may seem to be, they continually give rise to each other. Wonders of Nature find the reflections of themselves in the starry eyes of humanity, and *vice versa*. Shining grace strewn across the starry skies awakes the enlightening glow of divine ethics within us, whereas the wheels of wonderful wishes spinning within our hearts manage to outline the ways of Nature.

Man and Nature, they are one. Man ascending through his wondering aspirations to become God, and God in his love descending to become man. As mentioned in the introduction of this book, the place where Wonder and Love encounter each other is the most fertile ground for the evolution of human spirit and any living order conceivable. Wherever they meet, the greatest muses of science and art find their dwelling places, in all their inexplicable charm arising from a blend of stony ethical determinateness and graceful watery gentleness.

In essence, the more love we keep within ourselves, the more beautiful the world would seem to us, and *vice versa*. Our amazement with the details of the world sustains the blaze of love within our hearts and keeps the guiding lights to many starry souls in life lit.

From the moments of childlike wonder whilst carrying pebbles on the palms of our hands to the raising of our glances towards starry skies, we realize that our wonder draws the pathways of Love.

Love which stands at the beginning and end of both knowledge and being.

References:

¹ Dylan, Bob – “Mr. Tambourine Man”, In: Bringing It All Back Home, Columbia Records (1965).

² Hamvas, Béla – “Anthologia humana”, Dereta, Beograd (1947), pp. 228.

³ Behrens, James Stephen – “Like Stars, Words Bring Light”, *National Catholic Reporter* (September 17, 1999).

⁴ Uskoković, Vuk – “Philosophy of the Way: Systemic Perspectives on Cognition, Creativity and Ethics of the Modern Era”, unpublished (2007). Uskoković, Vuk – “The Ethics of the Modern Living”, unpublished (2006). Uskoković, Vuk – “The Principles of a Holistic Science of the Future”, Istraživački centar ICNT, Beograd (2006). Uskoković, Vuk – “On the Path of a Reductionistic-Holistic Balance for the Modern Science and Society”, Akademska misao, Beograd (2004). Uskoković, Vuk – “On the Relational Character of Mind and Nature”, *Res Cogitans: Journal of Philosophy* 6 (1) 286 – 400 (2009). Uskoković, Vuk – “On the Light Doves and Learning on Mistakes”, *Axiomathes: An International Journal in Ontology and Cognitive Systems* 19, 17 - 50 (2009). Uskoković, Vuk – “On Science of Metaphors and the Nature of Systemic Reasoning”, *World Futures: Journal of General Evolution* 65, 241 – 269 (2009). Uskoković, Vuk – “Co-Creation of Experiential Qualities”, *Pragmatics & Cognition* 19 (3) 562 – 589 (2011). Uskoković, Vuk – “On Holism and the Contextual Character of Natural Qualities”, *World Futures: Journal of General Evolution* 68 (6) 406 – 429 (2012).

-
- ⁵ Eagleman, David – “Incognito: The Secret Lives of the Brain”, Vintage Books, New York, NY (2011), pp. 23.
- ⁶ Buber, Martin – “On Polarity: Dialogue After the Theater”, In: Martin Buber and the Theater, edited and translated by Maurice Friedman, Funk & Wagnalls, New York, NY (1969), pp. 56.
- ⁷ Rombes, Nicholas – “A Cultural Dictionary of Punk”, Continuum, New York, NY (2009), pp. 104.
- ⁸ Morris, Jonathan – “The Ethics of Biotechnology”, Chelsea House Publishers, New York, NY (2006), pp. 45.
- ⁹ Uskoković, Vuk – “Philosophy of the Way: Systemic Perspectives on Cognition, Creativity and Ethics of the Modern Era”, unpublished (2007). Uskoković, Vuk – “On the Relational Character of Mind and Nature”, *Res Cogitans: Journal of Philosophy* 6 (1) 286 – 400 (2009).
- ¹⁰ Bateson, Gregory – “Mind and Nature”, Hampton Press, Cresskill, NJ (1979).
- ¹¹ Helmholtz, Hermann von – “Handbook of Physiological Optics or Treatise on Physiological Optics”, Dover, New York, NY (1851).
- ¹² Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 188.
- ¹³ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 200.
- ¹⁴ Eagleman, David – “Incognito: The Secret Lives of the Brain”, Vintage Books, New York, NY (2011), pp. 49 - 50.
- ¹⁵ Maturana, Humberto, Francisco Varela – “The Tree of Knowledge: The Biological Roots of Human Understanding”, Shambhala, Boston, MA (1987).
- ¹⁶ Churchman, C. West – “The Systems Approach”, Dell Publishing Co., New York, NY (1968).
- ¹⁷ Tinoco Jr., Ignacio, Kenneth Sauer, James C. Wang – “Physical Chemistry: Principles and Applications in Biological Sciences”, Third Edition, Prentice Hall, Englewood Cliffs, NJ (1995), pp. 547.
- ¹⁸ Goldsmith, T. H. – “What Birds See”, *Scientific American* 295 (1) 68 – 75 (July 2006).
- ¹⁹ Iwashita, N., M. V. Swain – “Elasto-plastic deformation of silica glass and glassy carbon with different indenters”, *Philosophical Magazine A: Physics of Condensed Matter, Structure, Defects and Mechanical Properties* 82(10), pp. 2199-2250 (2002).
- ²⁰ Reyes-Carcaño, O., J. Martínez-Trinidad, A. Meneses-Amador, G.A. Rodríguez-Castro, I. Campos-Silva, U. Figueroa-López – “Scratch test in boride layers: influence of indenter tip radius on failure mechanisms”, *Materials Letters*, <https://doi.org/10.1016/j.matlet.2022.131918> (2022).
- ²¹ Cazaux, J. – “Errors in Nanometrology by SEM”, *Nanotechnology* 15, 1195 – 1199 (2004).
- ²² Glans, Per-Anders, Geza Szigethy, Dustin Demoin, Tolek Tyliczszak, Jide Xu, Jinghua Guo, Kenneth N. Raymond, David K. Shuh – “Actinide Science with a Soft X-ray Scanning Transmission X-ray Microscope (STXM)”, *Materials Research Society Proceedings* Vol. 1264, edited by J. K. Gibson, S.K. McCall, E.D. Bauer, L. Soderholm, T. Fanghaenel, R. Devanathan, A. Misra, C. Trautmann, B.D. Wirth, Cambridge University Press, Cambridge, MA (2010).

-
- ²³ Viret, M., C. Meny, V. Da Costa, D. Colson, B. Doudin – “Wavelength Dependence of Photoinduced Deformation of BiFeO₃”, *Physical Review B* 85, 092301 (2012).
- ²⁴ Harre, Rom – “Foreword”, In: *Chemical Explanation: Characteristics, Development, Autonomy*, edited by Joseph E. Earley, Sr., New York Academy of Sciences, New York, NY (2003).
- ²⁵ Schnell, Ulrike, Freark Dijk, Klaas A. Sjollema, Ben N. G. Giepmans – “Immunolabeling Artifacts and the Need for Live-Cell Imaging”, *Nature Methods* 9 (2) 152 – 158 (2012).
- ²⁶ Grimes, G. W., K. J. Aufderheide – “Cellular Aspects of Pattern Formation: The Problem of Assembly”, Karger, Basel (1991).
- ²⁷ Japaridze, A., A. Benke, S. Renevey, C. Benadiba, G. Dietler – “Influence of DNA Binding Dyes on Bare DNA Structure Studied with Atomic Force Microscopy”, *Macromolecules* 48 (6) 1860 – 1865 (2015).
- ²⁸ Uskoković, Vuk, Tejal A. Desai – “Phase Composition Control of Calcium Phosphate Nanoparticles for Tunable Drug Delivery Kinetics and Treatment of Osteomyelitis. Part 2: Antibacterial and Osteoblastic Response”, *Journal of Biomedical Materials Research Part A* 101 (5) 1427 - 1436 (2013).
- ²⁹ Ibsen, C. J., H. Birkedal – “Modification of bone-like apatite nanoparticle size and growth kinetics by alizarin red S”, *Nanoscale* 2(11) 2478 - 2486 (2010).
- ³⁰ Foerster, Heinz von – “Cybernetics of Cybernetics”, Lecture retrieved from grace.evergreen.edu/~arunc/texts/cybernetics/heinz/cybernetics.pdf (1979).
- ³¹ Uskoković, Vuk, A. Košak, M. Drogenik – “Preparation of Silica-Coated Lanthanum-Strontium Manganite Particles with Designable Curie Point, for Application in Hyperthermia Treatments”, *International Journal of Applied Ceramic Technology* 3 (2) 134 – 143 (2006).
- ³² Williams, D. F. – “The Williams Dictionary of Biomaterials”, Liverpool University Press, Liverpool, UK (1999).
- ³³ Sun, He, Hong Zhao – “Physiologic Drug Distribution and Protein Binding”, In: *Applied Biopharmaceutics and Pharmacokinetics*, edited by Leon Shargel and Andrew Yu, McGraw-Hill, New York, NY (2016), pp. 259.
- ³⁴ J. A. Kim, C. Aberg, A. Salvati, K. A. Dawson - “Role of cell cycle on the cellular uptake and dilution of nanoparticles in a cell population”, *Nature Nanotechnology* 7, 62 – 68 (2012).
- ³⁵ Arber, Agnes – “The Mind and the Eye”, Cambridge University Press, New York, NY (1954).
- ³⁶ Jaspers, Karl – “Reason and Existenz”, Translated by William Earle, Johs. Storm Verlag, Bremen, Germany (1935), pp. 28.
- ³⁷ Mistry, Amit S., Antonios G. Mikos – “Tissue Engineering Strategies for Bone Regeneration”, *Advances in Biochemical Engineering/Biotechnology* 94, 1 – 22 (2005).
- ³⁸ Saint Augustine of Hippo – “Sermon 362: On the Resurrection of the Dead, Chapter 7”, In: *The Works of Saint Augustine: Sermons III/10 (341 – 400) on Various Subjects*, Translated by Edmund Hill, New City Press, Hyde Park, NY (1995).
- ³⁹ Müller, Bert – “Tailoring Biocompatibility: Benefitting Patients”, *Materials Today* 13 (4) 58 (2010).
- ⁴⁰ H. Liu, E. B. Slamovich, T. J. Webster – “Increased Osteoblast Functions among Nanophase Titania/Poly(Lactide-Co-Glycolide) Composites of the Highest Nanometer Surface Roughness”, *Journal of*

Biomedical Materials Research A 78, 798 – 807 (2006). C. Xu, F. Yang, S. Wang, S. Ramakrishna – “*In vitro* Study of Human Vascular Endothelial Cell Function on Materials with Various Surface Roughness”, *Journal of Biomedical Materials Research A* 71, 154 – 161 (2004).

⁴¹ Lo Nostro, Pierandrea, Barry W. Ninham – “After DLVO: Hans Lyklema and the keepers of the faith”, *Advances in Colloid and Interface Science* 276, 102082 (2020).

⁴² van der Meer, Frits – “Atlas of Western Civilization”, Van Nostrand, New York, NY (1960).

⁴³ Saint Augustine of Hippo – “Sermon 362: On the Resurrection of the Dead, Chapter 7”, In: *The Works of Saint Augustine: Sermons III/10 (341 – 400) on Various Subjects*, Translated by Edmund Hill, New City Press, Hyde Park, NY (1995).

⁴⁴ Thanyaphoo, S., J. Kaewsrichan – “Synthesis and evaluation of novel glass ceramics as drug delivery systems in osteomyelitis”, *Journal of Pharmaceutical Sciences* 101(8):2870-2882 (2012).

⁴⁵ Guzzi, Laszlo, Zoltan Paszti – “Gold Catalysis: Particle Size or Promoting Oxide Morphology”, Presented at the Materials Research Society Spring Meeting and Exhibit, San Francisco, CA (April 2011).

⁴⁶ Lowenstein, Stephen (ed.) – “My First Movie: Take Two – Ten Celebrated Directors Talk about Their First Film”, Pantheon, New York, NY (2008), pp. 192.

⁴⁷ Lefkowitz, Mary – “Euripides and the Gods”, Oxford University Press, Oxford, UK (2016).

⁴⁸ Šarlo Akrobata – “O, O, O...”, In: *Bistriji ili tuplji čovek biva kad...*, Jugoton (1981).

⁴⁹ Lipscomb, W. N. – “Aesthetic Aspects of Science”, In: *The Aesthetic Dimension of Science*, edited by D. W. Curtin, Philosophical Library, New York, NY (1980).

⁵⁰ Bacon, Francis – “The New Organon”, retrieved from www.constitution.org/bacon/nov_org.htm (1620).

⁵¹ Zeng, Patricia – “The Healer’s Art Elective: Where the Doctor Becomes Whole”, *Synapse* 53 (13) 1 – 14 (December 3, 2008).

⁵² Bateson, Gregory – “Steps to an Ecology of Mind”, The University of Chicago Press, Chicago, IL (1972).

⁵³ Foerster, Heinz von – “Understanding Understanding: Essays on Cybernetics and Cognition”, Springer, New York, NY (2010).

⁵⁴ Dirac, Paul – “The Evolution of Physicist’s Picture of Nature”, *Scientific American* 208 (5) (1963).

⁵⁵ Rexroth, Kenneth – “Introduction to D. H. Lawrence’s Selected Poems”, Viking, New York, NY (1959). Quoted in: Killion, Tom, Gary Snyder – “Tamalpais Walking”, Heyday Books, Berkeley, CA (2009), pp. 103.

⁵⁶ Thompson, Jon – “How to Read a Modern Painting: Lessons from the Modern Masters”, Abrams, New York, NY (2006), pp. 93.

⁵⁷ National Geographic Channel – “Countdown to Armageddon” (2012).

⁵⁸ Maturana, Humberto, Francisco Varela – “The Tree of Knowledge: The Biological Roots of Human Understanding”, Shambhala, Boston, MA (1987).

⁵⁹ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade (1923).

-
- ⁶⁰ Schiller, F. C. S. – “Solipsism”, *Mind: A Quarterly Review of Psychology and Philosophy* 70, pp. 172 (April 1909).
- ⁶¹ Aristotle – “Nicomachean Ethics”, Book IX, Part 8, Translated by W. D. Ross, retrieved from <http://classics.mit.edu/Aristotle/nicomachaen.9.ix.html> (350 BC).
- ⁶² Hirschfeld, Robert – “Obituary for Gustav Mahler”, *Weiner Zeitung* (May 20, 1911), In: Mahler and His World, edited by Karen Painter, Princeton University Press, Princeton, NJ (2002), pp. 344 - 346.
- ⁶³ Jeremić, Dragan – “Narcis bez lica”, Nolit, Belgrade (1981).
- ⁶⁴ Mailer, Normal – “Portrait of Picasso as a Young Man”, Grand Central Publishing, New York, NY (1995).
- ⁶⁵ Fromm, Erich – “The Art of Loving”, Naprijed, Zagreb (1956).
- ⁶⁶ Jung, Carl Gustav – “Memories, Dreams, Reflections”, Atos, Belgrade (1961).
- ⁶⁷ Grotowski, Jerzy – “Towards a Poor Theater”, Routledge, New York, NY (1968).
- ⁶⁸ Grotowski, Jerzy, Interview, Creative Arts Television, retrieved from video.alexanderstreet.com/watch/jerzy-grotowski-interview-1973 (1973).
- ⁶⁹ Cohen, Shimi – “The Innovation of Loneliness”, retrieved from <http://www.lostateminor.com/2013/08/19/the-innovation-of-loneliness/> (2013).
- ⁷⁰ Hofstadter, Douglas – “Le Ton Beau de Marot: In Praise of the Music of Language”, Basic Books, New York, NY (1998).
- ⁷¹ Radtke, Kristen – “Seek You: A Journey through American Loneliness”, Pantheon Books, New York, NY (2021), pp. 308, 340.
- ⁷² Aurelius, Marcus – “Meditations”, Penguin, London, UK (167), pp. 89.
- ⁷³ Vollmann, William T. – “Expelled from Eden: A William T. Vollmann Reader”, edited by Larry McCaffery and Michael Hemmingson, Thunder’s Mouth Press, Emeryville, CA (2004).
- ⁷⁴ Masini, April – “Dating Secret Exposed: Why Nice Guys Finish Last”, retrieved from <http://dating.personals.yahoo.com> (2008).
- ⁷⁵ Morrissey – “Now My Heart is Full”, In: Vauxhall and I, Parlophone (1994).
- ⁷⁶ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁷⁷ Douglass, Frederick – “Narrative of the Life of Frederick Douglass, an American Slave”, Signet, New York, NY (1845), pp. 123.
- ⁷⁸ Žižek, Slavoj – “Soul of the Party”, *New Statesman* (April 1, 2010); available at <http://www.newstatesman.com/religion/2010/04/god-order-wisdom-paul-love>.
- ⁷⁹ Sullivan, Andrew – “Christianity in Crisis”, *The Daily Beast* (April 2, 2012); available at <http://www.thedailybeast.com/newsweek/2012/04/01/andrew-sullivan-christianity-in-crisis.html>.

-
- ⁸⁰ Anzai, Yuichiro – “Discovery and Innovation: Their Impact on the Growth”, Lecture at the 2013 World Alliance Forum: Future of Stem Cells, Golden Gate Club, San Francisco, CA (November 15, 2013).
- ⁸¹ Fletcher, Alan – “The Art of Looking Sideways”, Phaidon, London (2001).
- ⁸² Gladwell, Malcolm – “Choice, Happiness and Spaghetti Sauce”, TED Talk (February 2004), available at http://www.ted.com/talks/malcolm_gladwell_on_spaghetti_sauce.html.
- ⁸³ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 357.
- ⁸⁴ “Thom Yorke’s Favourite Radiohead Tune Revealed”, NME (October 23, 2006); available at <http://www.nme.com/news/thom-yorke/24831>.
- ⁸⁵ B92 News – “What the World ‘Googled’ Most in 2012” (December 12, 2012), available at http://www.b92.net/tehnopolis/vesti.php?yyyy=2012&mm=12&nav_id=668397.
- ⁸⁶ Clowes, Daniel – “Justin M. Damiano”, In: *The Best American Comics 2009*, edited by Charles Burns, Houghton Mifflin Harcourt, New York, NY, pp.89 (2009).
- ⁸⁷ Plato – “The Laws”, University of Chicago Press, Chicago, IL.
- ⁸⁸ Harris, Gardiner – “Debate Flaring Over Grants for Research”, *New York Times* D6 (September 22, 2009).
- ⁸⁹ Bekker, Paul – “Obituary for Gustav Mahler”, *Frankfurter Zeitung* (May 1911), In: *Mahler and His World*, edited by Karen Painter, Princeton University Press, Princeton, NJ (2002), pp. 350.
- ⁹⁰ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁹¹ Glasersfeld, Ernst von – “The Incommensurability of Scientific and Poetic Knowledge”, retrieved from www.oikos.org/vGknowl.htm (1994).
- ⁹² Kant, Immanuel – “Groundwork of the Metaphysics of Morals”, Longmans, Green and Co., London, UK (1785).
- ⁹³ Emerson, Ralph Waldo – “Nature” (1836), retrieved from <http://oregonstate.edu/instruct/phl302/texts/emerson/nature-emerson-a.html#Chapter%20I>.
- ⁹⁴ Emerson, Ralph Waldo – “Nature”, In: *The Complete Works of Ralph Waldo Emerson*, Houghton, Mifflin and Company, Boston, MA (1904).
- ⁹⁵ Foerster, Heinz von – “Perception of the Future and the Future of the Perception”, *Instructional Science* 1 (1) S31 – 43 (1972).
- ⁹⁶ National Geographic Television - “Test Your Brain: Pay Attention” (2011).
- ⁹⁷ Eagleman, David – “Incognito: The Secret Lives of the Brain”, Vintage Books, New York, NY (2011), pp. 40.
- ⁹⁸ Park, David – “The Fire Within the Eye”, Princeton University Press, Princeton, NJ (1997).

-
- ⁹⁹ Hojo, K. – “The Philosophy of Kitaro Nishida and Current Concepts of the Origin of Life”, In “Chemical Explanation: Characteristics, Development, Autonomy”, edited by Joseph E. Earley, Sr., The New York Academy of Sciences, New York, NY (2003).
- ¹⁰⁰ Aristotle – “On the Soul”, Waxkeep, New York, NY (4th Century BC).
- ¹⁰¹ Kant, Immanuel – “Critique of Pure Reason”, retrieved from <http://www.gutenberg.org/files/4280/4280-h/4280-h.htm> (1781).
- ¹⁰² Zuffi, Stefano – “Color in Art”, Abrams, New York, NY (2012), pp. 205.
- ¹⁰³ Fujiya & Miyagi – “Transparent Things”, In: Transparent Things, Tirk Records (2006).
- ¹⁰⁴ Kriescher, Rosemary – “Dancing with God”, Personal correspondence (2008).
- ¹⁰⁵ Buber, Martin – “I and Thou”, Touchstone, New York, NY (1923).
- ¹⁰⁶ Škorić, Viktor – “Hermetičan i nerazumljiv”, *Međutim* 9 (2015), retrieved from <http://medjutim.org/pdf/9-18.pdf>.
- ¹⁰⁷ De Young Fine Arts Museum in San Francisco, CA (2007).
- ¹⁰⁸ Saint-Exupery, Antoine de – “The Little Prince”, Mladost, Zagreb, Yugoslavia (1943).
- ¹⁰⁹ Nietzsche, Friedrich – “Thus Spake Zarathustra”, Translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ¹¹⁰ Fromm, Erich – “Escape from Freedom”, Nolit, Belgrade (1941).
- ¹¹¹ “The Pervert’s Guide to Ideology”, a documentary film directed by Sophie Fiennes (2012).
- ¹¹² Slowdive – “Dagger”, In: Souvlaki, Creation (1992).
- ¹¹³ Luctari, Lukas – “Lanternfish and the Spirits of Immaculate Time”, Myopic Apocalypse Press (2011).
- ¹¹⁴ The Beatles – “Across the Universe”, In: Let It Be, Apple (1970).
- ¹¹⁵ Loye, David – “Darwin’s Lost Theory”, Benjamin Franklin Press, Carmel, CA (2007).
- ¹¹⁶ Loye, David – “Darwin on Love: The New Story of Evolution”, Benjamin Franklin Press, Carmel, CA (2007), pp. 113.
- ¹¹⁷ Hurley, Dan – “Grandma’s Experiences Leave a Mark on Your Genes”, *Discover* (April 23, 2013), retrieved from <http://discovermagazine.com/2013/may/13-grandmas-experiences-leave-epigenetic-mark-on-your-genes#.UbdjBpyFK1v>.
- ¹¹⁸ Bateson, Gregory – “Mind and Nature: A Necessary Unity”, Hampton Press, Cresskill, NJ (1979).
- ¹¹⁹ Dias, Brian G., Kerry J. Ressler – “Parental olfactory experience influences behavior and neural structure in subsequent generations”, *Nature Neuroscience* 17, 89 – 96 (2014).
- ¹²⁰ Ng, S. F., R. C. Lin, D. R. Laybutt, R. Barres, J. A. Owens, M. J. Morris – “Chronic high-fat diet in fathers programs β -cell dysfunction in female rat offspring”, *Nature* 467 (7318) 963 - 966 (2010).

-
- ¹²¹ Dietz, David M., Quincey LaPlant, Emily L. Watts, Georgia E. Hodes, Scott J. Russo, Jian Feng, Ronald S. Oosting, Vincent Vialou, Eric J. Nestler – “Paternal Transmission of Stressed-Induced Pathologies”, *Biological Psychiatry* 70 (5) 408–414 (2011).
- ¹²² Loye, David – “Darwin on Love: The New Story of Evolution”, Benjamin Franklin Press, Carmel, CA (2007), pp. 164.
- ¹²³ Ingber, Donald E. – “The Architecture of Life”, *Scientific American* 278, 48 – 57 (January 1998).
- ¹²⁴ Marcuse, Herbert – “One-Dimensional Man”, Beacon Press, Boston, MA (1964).
- ¹²⁵ Shephard, Alex – “The Real Retail Killer”, *The New Republic* (March 28, 2018), retrieved from <https://newrepublic.com/article/147669/real-retail-killer>.
- ¹²⁶ Television – “Marquee Moon”, In: *Marquee Moon*, Elektra (1976).
- ¹²⁷ Tinoco, Ignacio Jr., Kenneth Sauer, James C. Wang – “Physical Chemistry: Principles and Applications in Biological Sciences”, Third Edition, Prentice Hall, Englewood Cliffs, NJ (1995), pp. 125.
- ¹²⁸ Velde, Bruce – “Clay Minerals: A Physico-Chemical Explanation of their Occurrence”, Elsevier, Amsterdam, NL (1985).
- ¹²⁹ Milton, John – “Paradise Lost and Paradise Regained”, Signet Classic, New York, NY (1671), pp. 47.
- ¹³⁰ “Tate Gallery – London – Victor Pasmore – Coast of the Inland Sea”, Masterworks documentary series, Arthaus Musik (1988).
- ¹³¹ Eagleman, David – “Incognito: The Secret Lives of the Brain”, Vintage Books, New York, NY (2011), pp. 31.
- ¹³² Watson, Andi – “Little Star”, Oni Press, Portland, OR (2006), pp. 117.
- ¹³³ Shins – “Gone for Good”, In: *Chutes Too Narrow*, Sub Pop (2003).
- ¹³⁴ R.E.M. – “Harborcoat”, In: *Reckoning*, I. R. S. (1984).
- ¹³⁵ Pascal, Blaise – “Pensées”, Translated by A. J. Krailshheimer, Penguin, Harmondsworth, UK (1662), pp. 92 - 93.
- ¹³⁶ Pope, Alexander – “An Essay on Criticism” (1709), retrieved from <http://poetry.eserver.org/essay-on-criticism.html>.
- ¹³⁷ Bogdanovich, Peter: Interview, *The Last Picture Show*, directed by Peter Bogdanovich, Criterion Collection (1971).
- ¹³⁸ Corn, Wanda M. – “The Art of Andrew Wyeth”, New York Graphic Society, Greenwich, CN (1973), pp. 65.
- ¹³⁹ Classixx – “Borderline”, In: *Hanging Gardens*, Innovative Leisure (2013).
- ¹⁴⁰ Farm – “All Together Now”, In: *Spartacus*, Sire (1991).
- ¹⁴¹ Ashby, W. Ross – “An Introduction to Cybernetics”, Chapman & Hall, London, UK (1956).

-
- ¹⁴² Bishop, C. M. – “Neural Networks for Pattern Recognition: Chapter 9”, Oxford Press, Oxford, UK (1996), pp. 346 – 349.
- ¹⁴³ R. E. M. – “Losing My Religion”, In: *Out of Time*, Warner Bros (1991).
- ¹⁴⁴ Fletcher, Alan – “The Art of Looking Sideways”, Phaidon, London, UK (2001).
- ¹⁴⁵ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade (1923).
- ¹⁴⁶ Wittgenstein, Ludwig – “Tractatus Logico-Philosophicus” Translated by C. K. Ogden, Dover, New York, NY (1918), pp. 97.
- ¹⁴⁷ Bacon, Francis – “The New Atlantis”, retrieved from oregonstate.edu/instruct/phl302/texts/bacon/atlantis.html (1627).
- ¹⁴⁸ White, Leslie A. – “The Science of Culture: A Study of Man and Civilization”, Kultura, Belgrade (1949), pp. 267.
- ¹⁴⁹ Solanas, Fernando, Octavio Getino – “Towards a Third Cinema: Notes and Experiences for the Development of a Cinema of Liberation in the Third World” (Argentina, 1969), In: *Film Manifestos and Global Cinema Cultures: A Critical Anthology*, edited by Scott MacKenzie, University of California Press, Berkeley, CA (2014), pp. 247.
- ¹⁵⁰ Willis, Ellen – “Crowds and Freedom”, In: *Stars Don’t Stand Still in the Sky: Music and Myth*, Edited by Karen Kelly and Evelyn McDonnell, New York University Press, New York, NY (1999), pp. 153.
- ¹⁵¹ Crabb, Cindy – “The Encyclopedia of Doris”, Doris Press, Athens, OH (2011), pp. 9.
- ¹⁵² *Twin Peaks: TV Series, Season 2, episode 13: Checkmate*, directed by Todd Holland, Republic Pictures (1991).
- ¹⁵³ Kriescher, Kevin – “Geometric Guitar”, Xlibris, La Vergne, TN (2010).
- ¹⁵⁴ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade (1923).
- ¹⁵⁵ Godard, Jean-Luc – “Histoire(s) du cinema: The Coin of the Absolute”, Gaumont, Neuilly-sur-Seine (1998).
- ¹⁵⁶ LCD Soundsystem – “All My Friends”, In: *Sound of Silver*, DFA (2006).
- ¹⁵⁷ Nilsson, Molly – “1995”, In: *Zenith*, Self-released (2015).
- ¹⁵⁸ Buber, Martin – “I and Thou”, Touchstone, New York, NY (1923), pp. 63.
- ¹⁵⁹ Grotowski, Jerzy, Interview, Creative Arts Television, retrieved from video.alexanderstreet.com/watch/jerzy-grotowski-interview-1973 (1973).
- ¹⁶⁰ Long, Marguerite – “At the Piano with Fauré”, Translated by Olive Senior-Ellis, Taplinger Publishing Company, New York, NY (1963), pp. 12.
- ¹⁶¹ Ketcham, Charles B. – “Federico Fellini: The Search for a New Mythology”, Paulist Press, New York, NY (1976), pp. 24.

-
- ¹⁶² Saito, Stephen – “Interview: Amber Sealey + Gemma Brockis on the Thrill of the Search in ‘No Light and No Land Anywhere’”, *The Moveable Fest* (June 8, 2016), retrieved from <https://moveablefest.com/amber-sealey-gemma-brockis-no-light-and-no-land-anywhere/>.
- ¹⁶³ Radiohead – “Subterranean Homesick Alien”, In: OK Computer, Parlophone (1997).
- ¹⁶⁴ Chittick, William C. – “Sufism: A Beginner’s Guide”, Oneworld, Oxford, UK (2000), pp. 5.
- ¹⁶⁵ Wittgenstein, Ludwig – “Tractatus Logico-Philosophicus” (1918), Routledge, London, UK.
- ¹⁶⁶ Williams, Richard – “The Perfect 10”, Faber & Faber, London, UK (2006).
- ¹⁶⁷ Wilson, Jonathan – “Inverting the Pyramid”, Orion Books, London, UK (2008).
- ¹⁶⁸ Eckner, Constantin – “Arrigo Sacchi’s Cultural Revolution”, *Spielverlagerung* (January 1, 2016), retrieved from <https://spielverlagerung.com/2016/01/01/arrigo-sacchis-cultural-revolution/>.
- ¹⁶⁹ MitsoJR – “The 4-2-3-1 Formation / Strengths And Weaknesses / Football Basics Explained”, retrieved from <https://www.youtube.com/watch?v=ADkGmT21-gI> (2019).
- ¹⁷⁰ A. R. – “Tadic Propels Ajax at the Bernebeu”, *Spielverlagerung* (March 8, 2019), retrieved from <https://spielverlagerung.com/2019/03/08/tadic-propels-ajax-at-the-bernebeu/>.
- ¹⁷¹ G. J., J. D., M. K. – “I Thought Football Teams were Supposed to Have Even Numbers”, retrieved from <https://spielverlagerung.com/2020/07/29/i-thought-football-teams-were-supposed-to-have-even-numbers/> (July 29, 2020).
- ¹⁷² Wilson, Jonathan – “The Question: How is Brazil's 4-2-3-1 different from a European 4-2-3-1?”, *Guardian* (June 24, 2009), retrieved from <http://www.theguardian.com/sport/blog/2009/jun/24/the-question-brazil-4-2-3-1>.
- ¹⁷³ E. A. – “Tactical Theory: Vertical build-up passing”, *Spielverlagerung* (May 12, 2016), retrieved from <https://spielverlagerung.com/2016/05/12/tactical-theory-vertical-build-up-passing/>.
- ¹⁷⁴ M. V. – “Deep Full-Backs in Possession: a Strategic Alternative”, *Spielverlagerung* (August 5, 2020), retrieved from https://spielverlagerung.com/2020/08/05/tactical_theory_deep_fullback/.
- ¹⁷⁵ Fletcher, Alen – “The Art of Looking Sideways”, Phaidon, London, UK (2001).
- ¹⁷⁶ Cumming, Robert D. – “The Trial and Death of Socrates”, In: Plato – “Euthyphro, Apology, Crito”, Translated by F. J. Church, MacMillan Publishing Co., New York, NY (1955), pp. viii.
- ¹⁷⁷ K. A. Pyrshev, A. S. Klymchenko, G. Csucs, A. P. Demchenko – “Apoptosis and eryptosis: Striking differences on biomembrane level”, *Biochimica et Biophysica Acta (BBA) – Biomembranes* 1860, 1362 – 1371 (2018).
- ¹⁷⁸ Yamashita, Y. M., H. Yuan, J. Cheng, A. J. Hunt – “Polarity in Stem Cell Division: Asymmetric Stem Cell Division in Tissue Homeostasis”, *Cold Spring Harbor Perspectives in Biology* 2 (1) a001313 (2010).
- ¹⁷⁹ Yamashita, Yukiko M. – “Cell Adhesion in Regulation of Asymmetric Cell Division”, *Current Opinion in Cell Biology* 22 (5) 605 – 610 (2010).
- ¹⁸⁰ Arber, Agnes – “The Mind and the Eye”, Cambridge University Press, New York, NY (1954).
- ¹⁸¹ Hundred Waters – “Murmurs”, In: *The Moon Rang Like a Bell*, OWSLA (2014).

-
- ¹⁸² Westside Toastmasters – “Say What – Managing Accents”, available at http://westsidetoastmasters.com/article_reference/physical_technique.shtml#bodylang (2012).
- ¹⁸³ Plato – “Phaedrus”, translated by Benjamin Jowett, retrieved from classics.mit.edu/Plato/phaedrus.html.
- ¹⁸⁴ Koyre, Alexandre – “Scientific Revolution”, Nolit, Beograd (1973).
- ¹⁸⁵ Bateson, Gregory – “Mind and Nature”, Hampton Press, Cresskill, NJ (1979).
- ¹⁸⁶ Poerksen, Bernhard – “At Each And Every Moment, I Can Decide Who I Am: Heinz von Foerster on the Observer, Dialogic Life, and a Constructivist Philosophy of Distinctions”, *Cybernetics & Human Knowing* 10 (3-4) 9 – 26 (2003).
- ¹⁸⁷ Roy, Mathieu and Harold Crooks – “Surviving Progress”, Cinemaginaire, National Film Board of Canada (2011).
- ¹⁸⁸ Hua, Ellen Kei – “Kung Fu Meditations: Chinese Proverbial Wisdom”, Arion, Zemun (1987), pp. 36.
- ¹⁸⁹ Berlin, Isaiah – “The Hedgehog and the Fox”, Ivan R. Dee, Lanham, MD (1953).
- ¹⁹⁰ Pascal, Blaise – “Pensées”, Pensée No. 518, Translated by A. J. Krailsheimer, Penguin, Harmondsworth, UK (1662), pp. 213.
- ¹⁹¹ Fletcher, Alan – “The Art of Looking Sideways”, Phaidon, London, UK (2001), pp.244.
- ¹⁹² Upton, Dell – “Architecture in the United States”, Oxford University Press, Oxford, UK (1998), pp. 181.
- ¹⁹³ Gioia, Ted – “Healing Songs”, Duke University Press, Durham, NC (2006), pp. 73.
- ¹⁹⁴ Gioia, Ted – “Healing Songs”, Duke University Press, Durham, NC (2006), pp. 158.
- ¹⁹⁵ Nichols, Roger – “Ravel”, Yale University Press, New Haven, CT (2011), pp. 301.
- ¹⁹⁶ Amaducci, L., E. Grassi, F. Boller – “Maurice Ravel and right-hemisphere musical creativity: influence of disease on his last musical works?”, *European Journal of Neurology* 9 (1) 75–82 (2002).
- ¹⁹⁷ Zabel, Gary – “Adorno on Music: A Reconsideration”, *The Musical Times* 130 (1754) 198 – 201 (1989).
- ¹⁹⁸ Reich, Rob, Mehran Sahami, Jeremy M. Weinstein – “System Error: Where Big Tech Went Wrong and How Can We Reboot”, HarperCollins, New York, NY (2021), pp. XXX
- ¹⁹⁹ Uskoković, Vuk – “My Music, a Starry Train”, www.myspace.com/starrytrain (2001).
- ²⁰⁰ Selimović, Meša – “Death and the Dervish”, Translated by Bogdan Rakić, Stephen M. Dickey, Northwestern University Press, Chicago, IL (1996).
- ²⁰¹ Jung, Carl Gustav – “Memories, Dreams, Reflections”, Atos, Belgrade (1961).
- ²⁰² Kant, Immanuel – “The Critique of Practical Reason”, Translated by Thomas Kingsmill Abbott, Electronics Classics Series, Pennsylvania State University, Hazleton, PA (1788), pp. 4.

-
- ²⁰³ Glasersfeld, Ernst von – “A Cybernetician before Cybernetics”, *Systems Research and Behavioral Science* 14 (2) 137 – 139 (1997).
- ²⁰⁴ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade (1923).
- ²⁰⁵ Dubin, Nina L. – “Futures & Ruins: Eighteenth-Century Paris and the Art of Hubert Robert”, Getty Research Institute, Los Angeles, CA (2010), pp. 143.
- ²⁰⁶ Grünbein, Durs – “The Bars of Atlantis”, Farrar, Straus and Giroux, New York, NY (2010), pp. 78.
- ²⁰⁷ Smiley, Jess Smart – “What is Art?”, *Emanata* (2013).
- ²⁰⁸ Bukszpan, Daniel – “The Encyclopedia of New Wave”, Sterling, New York, NY (2012), pp. 107.
- ²⁰⁹ Koblenz, Alexander N. – “The Chess Strategy”, Ciassa Commerce, Beograd.
- ²¹⁰ Wittgenstein, Ludwig – “On Certainty”, Fidelis, Belgrade (1951).
- ²¹¹ Crabb, Cindy Gretchen Ovenrack – “Doris: An Anthology 1991 – 2001”, pp. 205, Microcosm Publishing, Portland, OR (2005).
- ²¹² Graham-Dixon, Andrew – “Howard Hodgkin”, Harry N. Abrams, Inc., Publishers, New York, NY (1994), pp. 173.
- ²¹³ Selimović, Meša – “Death and the Dervish”, Translated by Bogdan Rakić, Stephen M. Dickey, Northwestern University Press, Chicago, IL (1996).
- ²¹⁴ Stanislavski, Constantin – “Building a Character”, Routledge, New York, NY (1936), pp. 99 & 110.
- ²¹⁵ Sullivan, Martin, Private correspondence, Irvine, CA (2020).
- ²¹⁶ Chesterton, Gilbert Keith – “Orthodoxy”, retrieved from www.gutenberg.org/files/130/130.txt (1906).
- ²¹⁷ Rank, Otto – “Psychology and the Soul: A Study of the Origin, Conceptual Evolution, and Nature of the Soul”, Johns Hopkins University Press, Baltimore, MD (2003).
- ²¹⁸ Frost, Anthony, Ralph Yarrow – “Improvisation in Drama”, 2nd Edition, Palgrave Macmillan, New York, NY (2007), pp. 197.
- ²¹⁹ Pragacz, Piotr – “Notes on the Life and the Work of Jozef Maria Hoene-Wronski”, In: *Algebraic Cycles, Sheaves, Shtukas, and Moduli. Trends in Mathematics*. Pragacz, P. (ed.), Birkhäuser, Basel (2007).
- ²²⁰ Selimović, Meša – “Death and the Dervish”, pp. 8, Translated by Bogdan Rakić, Stephen M. Dickey, Northwestern University Press, Chicago, IL (1996).
- ²²¹ Eagleman, David – “Incognito: The Secret Lives of the Brain”, Vintage Books, New York, NY (2011), pp.5.
- ²²² Wade, Nicholas – “Recent Remolding of Human Clay”, *New York Times* (July 2, 2007).
- ²²³ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 60.
- ²²⁴ Ashby, W. Ross – “An Introduction to Cybernetics”, Chapman & Hall, London (1956).

-
- ²²⁵ Fromm, Erich – “The Art of Loving”, Naprijed, Zagreb (1956).
- ²²⁶ Chesterton, Gilbert Keith – “The Everlasting Man”, Hodder & Stoughton, London, UK (1925).
- ²²⁷ Doxiadis, Apostolos – “Uncle Petros and Goldbach’s Conjecture”, Plato, Belgrade, (1992), pp. 66.
- ²²⁸ Campbell, Joseph, Henry Morton Robinson – “A Skeleton Key to *Finnegans Wake*”, Hardcourt, Brace and Company, New York, NY (1944), pp. xi.
- ²²⁹ Bateson, Gregory – “Allegory”, *CoEvolution Quarterly* 44 - 46 (Spring 1978).
- ²³⁰ Bateson, Gregory – “Mind and Nature: A Necessary Unity”, Hampton Press, Cresskill, NJ (1979), pp. 200.
- ²³¹ Bateson, Gregory – “Mind and Nature: A Necessary Unity”, Hampton Press, Cresskill, NJ (1979), pp. 197.
- ²³² Balašević, Đorđe – “Jednom su sadili lipu”, In: *Panta Rei*, Jugoton (1988).
- ²³³ Pixies – “Alec Eiffel”, In: *Trompe le Monde*, 4AD (1991).
- ²³⁴ DeCurtis, Anthony – “R.E.M.: The Rolling Stone Files”, Rolling Stone Press, New York, NY (1995), pp. 133.
- ²³⁵ Listen to R.E.M.’s bonus track, aka Untitled, In: *Green*, Warner Bros (1988).
- ²³⁶ Berlin, Isaiah – “Freedom and Its Betrayal: Six Enemies of Human Liberty”, Editorial Preface, Chatto & Windus, London, UK (1952).
- ²³⁷ Frost, Anthony, Ralph Yarrow – “Improvisation in Drama”, 2nd Edition, Palgrave Macmillan, New York, NY (2007), pp. 18.
- ²³⁸ Zaporah, Ruth – “Action Theatre: The Improvisation of Presence, North Atlantic Books, Berkeley, CA (1995), pp. xx.
- ²³⁹ Lebrecht, Norman – “The Book of Musical Anecdotes”, The Free Press, New York, NY (1985), pp. 126 - 127.
- ²⁴⁰ Crouch, Stanley – “Considering Genius”, Basic Civitas Books, New York, NY (2006), pp. 56.
- ²⁴¹ Mann, Thomas – “The Magic Mountain”, Translated by John E. Woods, Alfred A. Knopf, New York, NY (1924).
- ²⁴² Callister, William D. Jr., David G. Rethwisch – “Fundamentals of Materials Science and Engineering: An Integrated Approach”, John Wiley & Sons, Hoboken, NJ (2008), pp. 179.
- ²⁴³ Stendhal – “On Love”, Liveright, New York, NY (1822), pp. 6.
- ²⁴⁴ Burton, W. K., N. Cabrera, F. C. Frank – “The Growth of Crystals and the Equilibrium Structure of their Surfaces”, *Philosophical Transactions of the Royal Society of London Series A, Mathematical and Physical Sciences* 243, 299 – 358 (1951).
- ²⁴⁵ Kang, Suk-Joong L., Yang-Il Jung, Sang-Hyun Jung, John G. Fisher – “Interface Structure-Dependent Grain Growth Behavior in Polycrystals”, In: *Microstructural Design of Advanced Engineering Materials*, edited by Dmitri A. Molodov, Wiley-VCH Verlag, New York, NY (2013), pp. 299 - 322.

-
- ²⁴⁶ Choi, S.-Y., S.-J. L. Kang – “Sintering Kinetics by Structural Transition at Grain Boundaries in Barium Titanate”, *Acta Materialia* 52, 2937 – 2943 (2004).
- ²⁴⁷ Hornyak, Gabor L., John J. Moore, Harry F. Tibbals, Joydeep Dutta – “Introduction to Nanoscience & Nanotechnology”, CRC Press, Boca Raton, FL (2009), pp. 223.
- ²⁴⁸ Foerster, Heinz von – “On Constructing a Reality”, Presented at the Fourth International Conference on Environmental Design Research, Blacksburg, VA (1973). In: Heinz von Foerster’s Understanding Understanding: Essays on Cybernetics and Cognition, Springer, New York, NY (2010), pp. 211 – 228.
- ²⁴⁹ Ristić, Momčilo - “Principi nauke o materijalima”, Srpska Akademija Nauka i Umetnosti, Belgrade, Serbia (1993), pp.73.
- ²⁵⁰ “Report of the Basic Energy Sciences Workshop on Basic Research Needs for Synthesis Science for energy Relevant Technologies”, pp. 93 (May 2016), retrieved from https://science.energy.gov/~media/bes/pdf/reports/2017/BRN_SS_Rpt_web.pdf.
- ²⁵¹ Uskoković, Vuk, Miha Drofenik, Irena Ban – “The Characterization of Nanosized Nickel-Zinc Ferrites Synthesized within Reverse Micelles of CTAB/1-Hexanol/Water Microemulsion”, *Journal of Magnetism and Magnetic Materials* 284, 294 – 302 (2004). Uskoković, Vuk, Miha Drofenik – “Synthesis of Relatively Highly Magnetic Nano-Sized NiZn-Ferrite in Microemulsion at 45 °C”, *Surface Review and Letters* 12 (1) 97 - 100 (2005). Uskoković, Vuk, Darko Makovec, Miha Drofenik – “Synthesis of Lanthanum-Strontium Manganites by a Hydroxide-Precursor Co-Precipitation Method in Solution and Reverse Micellar Microemulsion”, *Materials Science Forum* 494, 155 – 160 (2005). Uskoković, Vuk, Miha Drofenik – “A Mechanism for the Formation of Nanostructured NiZn Ferrites via a Microemulsion-Assisted Precipitation Method”, *Colloids and Surfaces A: Physicochemical and Engineering Aspects* 266, 168 – 174 (2005). Uskoković, Vuk, Miha Drofenik – “Synthesis of Nanocrystalline Nickel-Zinc Ferrites via a Microemulsion Route”, *Materials Science Forum* 453 – 4, 225 – 230 (2004). Uskoković, Vuk, Miha Drofenik – “Synthesis of Nanocrystalline Nickel-Zinc Ferrites within Reverse Micelles”, *Materials and Technology* 37 (3-4) 129 – 131 (2003).
- ²⁵² Naughton, Brain T., and David R. Clarke - “Lattice Expansion and Saturation Magnetization of Nickel-Zinc Ferrite Nanoparticles Prepared by Aqueous Precipitation”, *Journal of the American Ceramic Society* 90 (11) 3541 - 3546 (2007).
- ²⁵³ Goldman, Alex – “Modern Ferrite Technology”, 2nd Edition, Springer, New York, NY (2006), pp. 57.
- ²⁵⁴ Konstanchuk, Irina – “Reactivity of Nanocrystalline Magnesium”, Presented at the 13th Yugoslav Materials Research Society Conference, Herceg-Novci, Montenegro (September 6, 2011).
- ²⁵⁵ A. Ivanovska, N. Barać, V. Radojević, P. Uskoković, Đ. Janačković, E. Barcelo, P. Gane, M. Kosti – “Obtaining and characterising Cu-infused antimicrobial films formed from regenerated cellulose-CaCO₃ composite”, In: Twenty-third Annual Conference YUCOMAT 2022 & Twelfth World Round Table Conference on Sintering XII WRTCS, Program and Book of Abstracts, edited by D. P. Uskoković, Materials Research Society of Serbia, Belgrade (2022), pp. 90.
- ²⁵⁶ J. Guo, J. R. Morris, Y. Ihm, C. I. Contescu, N. C. Gallego, G. Duscher, S. J. Pennycook, M. F. Chisholm – “Topological Defects: Origin of Nanopores and Enhanced Adsorption Performance in Nanoporous Carbon”, *Small* 8, 3283 – 3288 (2012).
- ²⁵⁷ Perlis, Alan J. – “Epigrams in Programming” SIGPLAN (September 1982); available at <http://www.cs.yale.edu/quotes.html>.

-
- ²⁵⁸ “The Glass Bead Game”, Wikipedia article, retrieved from https://en.wikipedia.org/wiki/The_Glass_Bead_Game (September 21, 2016).
- ²⁵⁹ Barthes, Roland – “Camera Lucida: Reflections on Photography”, Translated by Richard Howard, Hill and Wang, New York, NY (1980), pp. 59.
- ²⁶⁰ The final line of dialogue in the movie *Mistress America* directed by Noah Baumbach (2015).
- ²⁶¹ Hooks, bell – “Teaching to Transgress: Education as the Practice of Freedom”, Routledge, New York, NY (1994), pp. 8.
- ²⁶² Quoted is Ron Scapp from Queens College in New York City, In: Hooks, bell – “Teaching to Transgress: Education as the Practice of Freedom”, Routledge, New York, NY (1994), pp. 165.
- ²⁶³ Tkachiev, Vlad – “Verdict: Genius”, Chess24 (January 29, 2015), retrieved from <https://chess24.com/en/read/news/is-ivanchuk-a-genius>.
- ²⁶⁴ *Histoire(s) du cinema* directed by Jean-Luc Godard, Chapter 2b: *Deadly Beauty* (1997).
- ²⁶⁵ Popovich, Nicholas G. – “One View from the Mentor Perspective”, Presented at the Expanding Our Horizons: 2010 Annual Meeting of the American Association of Colleges of Pharmacy (July 19, 2010).
- ²⁶⁶ Wittgenstein, Ludwig – “*Tractatus Logico-Philosophicus*” (1918), Routledge, London, UK.
- ²⁶⁷ Interview with Warren McCulloch on Canadian Broadcasting Co. (1969), retrieved from <https://www.youtube.com/watch?v=MTmR6X2w8Tg>.
- ²⁶⁸ Wikipedia article on Joseph Beuys: https://en.wikipedia.org/wiki/Joseph_Beuys (2021).
- ²⁶⁹ Wikipedia article on the Uskoks: <https://en.wikipedia.org/wiki/Uskoks> (2017).
- ²⁷⁰ Cook, Pat, David Riordan, Randy Platt, Jeffrey Hilbers, Jeff Godfrey, Kenneth Melville, Greg Haggard, Jim Simmons – “It Came from the Desert”, *Cinemaware* (1989).
- ²⁷¹ Wilke, M., E. Fortunati, M. van den Broek, A. T. Hoogeveen, B. J. Scholte – “Efficacy of a peptide-based gene delivery system depends on mitotic activity”, *Gene Therapy* 3 (12) 1133 - 1142 (1996). Tsenga, Wen-Chi, Frederick R. Haselton, Todd D. Giorgio – “Mitosis enhances transgene expression of plasmid delivered by cationic liposomes”, *Biochimica et Biophysica Acta (BBA) - Gene Structure and Expression* 1445, 53–64 (1999).
- ²⁷² Chaithawiwat, Krittanut, A. Vangnai, J. M. McEvoy, B. Pruess, S. Krajangpan, E. Khan – “Impact of Nanoscale Zero Valent Iron on Bacteria is Growth Phase Dependent”, *Chemosphere* 144, 352 – 359 (2016).
- ²⁷³ Glaserfeld, Ernst von – “*Radical Constructivism: A Way of Knowing and Learning*”, RoutledgeFalmer, London, UK (1995).
- ²⁷⁴ Tatsumi, Yoshihiro – “Hell”, In: *Good-Bye, Drawn & Quarterly*, Montreal, QC (2008).
- ²⁷⁵ Lowry, John – “*Painting and Understanding Abstract Art*”, Crowood Press, Ramsbury, UK (2010).
- ²⁷⁶ Kurtović, Elvis J. – “Folk reping”, In: *Mitovi i legende o kralju Elvisu*, RTV Ljubljana (1984).
- ²⁷⁷ Paterson, Mary – “*The Monks and Me: How 40 Days at Thich Nhat Hanh’s French Monastery Guided Me Home*”, Hampton Roads, Charlottesville, VA (2012), pp. 6.

-
- ²⁷⁸ The Bhagavad Gita, Chapter 17, Verses 23 – 26, Translated by B. Srinivasa Murthy, Long Beach Publications, Long Beach, CA (1985), pp. 126.
- ²⁷⁹ Hoffmann, Roald – “The Same and Not the Same”, Columbia University Press, New York, NY (1995).
- ²⁸⁰ Rogers, E. M., F. F. Shoemaker – “Communication of Innovations”, Free Press, New York, NY (1971).
- ²⁸¹ Sierro, J., M. C. Loretto, G. Szpl, J. J. M. Massen, T. Bugnyar – “Food calling in wild ravens (*Corvus corax*) revisited: Who is addressed?” *Ethology* 126, 257–266 (2020).
- ²⁸² “Photographers in Focus: Dennis Morris” directed by Kenji Hirano, *Nowness* (June 2018), retrieved from <https://www.nowness.com/series/photographers-in-focus/photographers-in-focus-dennis-morris>.
- ²⁸³ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 295.
- ²⁸⁴ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 296.
- ²⁸⁵ Williams, Alex - “Eco-Friendly Shopping is Hip, but Is It Helpful”, *New York Times* (July 9, 2007)
- ²⁸⁶ Krauss, Clifford – “Retailer Looks for Ways to Apply a Green Label”, *New York Times* (July 9, 2007).
- ²⁸⁷ National Science Foundation IIP – “NSF-Funded Companies in the News”, Email to Vuk Uskoković (July 2, 2021).
- ²⁸⁸ Tennyson, Alfred – “Idylls of the King”, retrieved from <http://www.gutenberg.org/cache/epub/610/pg610.html> (1885).
- ²⁸⁹ Upton, Dell – “Architecture in the United States”, Oxford University Press, Oxford, UK (1998), pp. 70.
- ²⁹⁰ Najjar & Najjar – “Home Alone: Bug, Vienna, Austria”, In: *XS Future: New Ideas, Small Structures*, edited by Phyllis Richardson, Universe, New York, NY (2009), pp. 24 – 27.
- ²⁹¹ Kunstler, James Howard – “The Geography of Nowhere: The Rise and Decline of America’s Man-Made Landscape”, Touchstone, New York, NY (1994), pp. 267.
- ²⁹² Kunstler, James Howard – “The Geography of Nowhere: The Rise and Decline of America’s Man-Made Landscape”, Touchstone, New York, NY (1994), pp. 166.
- ²⁹³ Rashid, Karim – “Evolution”, Universe Publishing, New York, NY (2004).
- ²⁹⁴ Murray, Lydia Soraya – “The Human Touch”, *Nature* 478, pp. 145 (2011).
- ²⁹⁵ Crabb, Cindy – “Doris”, Issue 27, Cindy Crabb, POB 29, Athens, OH 45701, USA (Fall 2009).
- ²⁹⁶ Leakey, Meave, Fred Spoor, M. Christopher Dean, Craig S. Feibel, Susan C. Antón, Christopher Kiarie, Louise N. Leakey – “New fossils from Koobi Fora in northern Kenya confirm taxonomic diversity in early *Homo*”, *Nature* 488, 201 – 214 (2012).
- ²⁹⁷ Tirman, John – “100 Ways America is Screwing Up the World”, Harper Perennial, New York, NY (2006), pp. 182.

-
- ²⁹⁸ Worldwatch Institute – “Good Stuff? A Behind-the-Scenes Guide to the Things We Buy” (2004); available at http://www.worldwatch.org/system/files/GoodStuffGuide_0.pdf.
- ²⁹⁹ Ziv, Ilan (director) – “Capitalism: A Six-Part Series”, Part 1, Icarus Films, Brooklyn, NY (2018).
- ³⁰⁰ Wittgenstein, Ludwig – “On Certainty”, Fidelis, Belgrade (1951).
- ³⁰¹ Gasset, José Ortega y – “What is Philosophy”, Translated by Mildred Adams, W. W. Norton & Co., New York, NY (1960), pp. 98.
- ³⁰² Iyer, Pico – “Where is Home?”, TED Talk, Edinburgh, Scotland (2013).
- ³⁰³ Hooks, bell – “Teaching to Transgress: Education as the Practice of Freedom”, Routledge, New York, NY (1994), pp. 46.
- ³⁰⁴ Sweet, Leonard – “Quantum Spirituality: A Postmodern Apologetic”, United Theological Seminary, Trotwood, OH (1991).
- ³⁰⁵ Hua, Ellen Kei – “Kung Fu Meditations: Chinese Proverbial Wisdom”, Arion, Zemun (1987), pp. 105.
- ³⁰⁶ Doidge, Norman – “The Brain That Changes Itself: Stories of Personal Triumph from the Frontiers of Brain Science”, Viking Adult, New York, NY (2007).
- ³⁰⁷ Madroñal, Noelia, José M. Delgado-García, Azahara Fernández-Guizán, Jayanta Chatterjee, Maja Köhn, Camilla Mattucci, Apar Jain, Theodoros Tsetsenis, Anna Illarionova, Valery Grinevich, Cornelius T. Gross, Agnès Gruart – “Rapid erasure of hippocampal memory following inhibition of dentate gyrus granule cells”, *Nature Communications* 7: 10923 (2016).
- ³⁰⁸ Campa, C. C., G. Germeña, E. Ciraolo, F. Copperi, A. Sapienza, I. Franco, A. Ghigo, A. Camporeale, A. Di Savino, M. Martini, A. Perino, R. T. Megens, A. R. Kurz, C. Scheiermann, M. Sperandio, A. Gamba, E. Hirsch – “Rac signal adaptation controls neutrophil mobilization from the bone marrow”, *Science Signaling* 9 (459):ra124 (2016).
- ³⁰⁹ Ducy, Patricia, C. Desbois, B. Boyce, G. Pinero, B. Story, C. Dunstan, E. Smith, J. Bonadio, S. Goldstein, C. Gundberg, A. Bradley, G. Karsenty – “Increased Bone Formation in Osteocalcin-Deficient Mice”, *Nature* 382(6590):448-52 (1996).
- ³¹⁰ Fantner, G. E., E. Oroudjev, G. Schitter, L. S. Golde, P. Thurner, M. M. Finch, P. Turner, T. Gutsman, D. E. Morse, H. Hansma, P. K. Hansma – “Sacrificial Bonds and Hidden length: Unraveling Molecular Mesostructures in Tough Materials”, *Biophysical Journal* 90, 1411 – 1418 (2006).
- ³¹¹ Ritchie, R. O. – “How does human bone resist fracture?”, *Annals of the New York Academy of Sciences* 1192:72-80 (2010).
- ³¹² Kunz, W. – “Specific Ion Effects in Colloidal and Biological Systems”, *Current Opinion in Colloid & Interface Science* 15 (2010) 34–39.
- ³¹³ Orlovskii, V. P., V. S. Komlev; S. M. Barinov – “Hydroxyapatite and Hydroxyapatite-Based Ceramics”, *Inorganic Materials* 38, 973 – 984 (2002).
- ³¹⁴ Hot Chip – “Ready for the Floor”, In: *Made in the Dark*, EMI (2008).
- ³¹⁵ Kolasinski, Kurt W. – “Surface Science: Foundations of Catalysis and Nanoscience”, Third edition, John Wiley & Sons, Chichester, UK (2012), pp. 230.

-
- ³¹⁶ Wolchover, Natalie – “The Surprisingly Strange Physics of Water”, Live Science (September 18, 2011), retrieved from <http://www.livescience.com/33505-water-strange-physics.html>.
- ³¹⁷ Currey, J. – “Collagen and the Mechanical Properties of Bone and Calcified Cartilage”, In: *Collagen: Structure and Mechanics*, edited by Peter Fratzl, Springer, New York, NY (2008), pp. 405.
- ³¹⁸ Barrere, F., T. A. Mahmood, K. de Groot, C. A. van Blitterswijk – “Advanced Biomaterials for Skeletal Tissue Regeneration: Instructive and Smart Functions”, *Materials Science and Engineering R* 59 (1-6) 38-71 (2008).
- ³¹⁹ Seeman, E. – “Exercise to Gain Bone Strength: Myth or Reality?”, *Bone* 40 (6) S131 (2007).
- ³²⁰ Silverstein, Shel – “Sick”, In: *Time to Read, Childcraft – The How and Why Library Volume 2*, World Book, Chicago, IL (1991), pp. 28.
- ³²¹ Narducci, P., V. Nicolin – “Differentiation of activated monocytes into osteoclast-like cells on a hydroxyapatite substrate: an in vitro study”, *Annals of Anatomy* 191(4) 349 - 355 (2009).
- ³²² Vallittu, Pekka, Personal correspondence (2019).
- ³²³ Kader, K. N., C. H. Coyle – “Reactive oxygen and nitrogen species: implications for cardiovascular device engineering”, *Journal of Biomedical Materials Research B: Applied Biomaterials* 83, 138 – 144 (2007).
- ³²⁴ A. Espinosa, C. Henriquez-Olguin, E. Jaimovich – “Reactive oxygen species and calcium signals in skeletal muscle: A crosstalk involved in both normal signaling and disease”, *Cell Calcium* 60, 172 – 179 (2016).
- ³²⁵ McClung, J. P., C. A. Roneker, W. Mu, D. J. Lisk, P. Langlais, F. Liu, X. G. Lei – “Development of insulin resistance and obesity in mice overexpressing cellular glutathione peroxidase”, *Proceedings of the National Academy of Sciences USA* 101, 8852 – 8857 (2004).
- ³²⁶ Wu, X., W. Wang, C. Meng, S. Yang, D. Duan, W. Xu, X. Liu, M. Tang, H. Wang – “Regulation of differentiation in trabecular bone-derived mesenchymal stem cells by T cell activation and inflammation”, *Oncology Reports* 30, 2211 - 2219 (2013).
- ³²⁷ Porter, Alexandra E., C. M. Botelho, M. A. Lopes, J. D. Santos, S. M. Best, W. Bonfield – “Ultrastructural comparison of dissolution and apatite precipitation on hydroxyapatite and silicon-substituted hydroxyapatite in vitro and in vivo”, *Journal of Biomedical Materials Research A* 69 (4) 670 - 679 (2004).
- ³²⁸ Li, Y., Q. Li, S. Zhu, E. Luo, J. Li, G. Feng, Y. Liao, J. Hu – “The effect of strontium-substituted hydroxyapatite coating on implant fixation in ovariectomized rats”, *Biomaterials* 31 (34) 9006 - 9014 (2010).
- ³²⁹ Stefani, S., S. Campana, L. Cariani, V. Carnovale, C. Colombo, M. M. Lleo, V. D. Iula, L. Minicucci, P. Morelli, G. Pizzamiglio, G. Taccetti – “Relevance of multidrug-resistant *Pseudomonas aeruginosa* infections in cystic fibrosis”, *International Journal of Medical Microbiology* 307(6):353-362 (2017).
- ³³⁰ Rehman, Jalees, University of Illinois at Chicago, Personal Correspondence, Chez Joel Restaurant, Chicago, IL (November 14, 2014).

-
- ³³¹ Lee, J., N. Sayed, A. Hunter, K. F. Au, W. H. Wong, E. S. Mocarski, R. R. Pera, E. Yakubov, J. P. Cooke – “Activation of Innate Immunity is Required for Efficient Nuclear Reprogramming”, *Cell* 151, 547 – 588 (2012).
- ³³² Cooke, John, Methodist Research Institute, Houston, TX, Personal Correspondence (August 13, 2013).
- ³³³ Thomas, M. V., D. A. Puleo – “Infection, inflammation, and bone regeneration: a paradoxical relationship”, *Journal of Dental Research* 90 (9) 1052 - 1061 (2011).
- ³³⁴ Ammann, Daniel, Michael Krobath – “‘We’re Waging a War against Our Own Children: Interview with Laurence J. Kotlikoff’”, *Credit Suisse Bulletin* (4/2014), pp. 20.
- ³³⁵ Xia, Ivan Fan – “Enhancing Immunity and Disease Resistance in Fish by Chitosan-Selenium Nanoparticles”, Lecture at the 2018 NanoWorld Conference, San Francisco, CA (2018).
- ³³⁶ Hsu, Fei-Ting, Zung-Hang Wei, Yogi Chang-Yo Hsuan, Willie Lin, Yu-Chin Su, Chia-Hui Liao, Chia-Ling Hsieh – “MRI tracking of polyethylene glycol-coated superparamagnetic iron oxide-labelled placenta-derived mesenchymal stem cells toward glioblastoma stem-like cells in a mouse model”, *Artificial Cells, Nanomedicine, and Biotechnology* 46, S448 – S459 (2018).
- ³³⁷ Mladenović, Ivan, Institute for Mental Health and the Clinic for Psychiatric Illnesses „Laza Lazarević”, Belgrade, Serbia – “Korona virus i alkoholna pića”, B92 News (January 30, 2021), retrieved from https://www.b92.net/bbc/index.php?yyyy=2021&mm=01&dd=30&nav_id=1803100.
- ³³⁸ Wu, R. T., Cao, L., Mattson, E., Witwer, K. W., Cao, J., Zeng, H., He, X., Combs Jr., G. F., Cheng, W. H. – “Opposing impacts on healthspan and longevity by limiting dietary selenium in telomere dysfunctional mice”, *Aging Cell* 16, 125 – 135 (2017).
- ³³⁹ Tamara Rakić, Maja Lazarević, Živko S. Jovanović, Svetlana Radović, Sonja Siljak-Yakovlev, Branka Stevanović, Vladimir Stevanović – “Resurrection plants of the genus *Ramonda*: prospective survival strategies – unlock further capacity of adaptation, or embark on the path of evolution?”, *Frontiers in Plant Science* 4, 550 (2014).
- ³⁴⁰ Traversa, Enrico – “Cerium Oxide Nanoparticles for Antioxidant Therapy Perspectives”, Lecture at the 15th YUCOMAT, Herceg-Novi, Montenegro (September 4, 2013).
- ³⁴¹ Wang, Xiaogang, Yuanman Yua, Luli Jia, Zhen Genga, Jing Wang, Changsheng Liu – “Calcium phosphate-based materials regulate osteoclast-mediated osseointegration”, *Bioactive Materials* (under review, 2021).
- ³⁴² Puleo, D. A., L. A. Holleran, R. H. Doremus, R. Bizios – “Osteoblast Responses to Orthopedic Implant Materials *in vitro*”, *Journal of Biomedical Materials Research* 25 (6) 711 – 723 (1991).
- ³⁴³ Onuma, K. – “Recent Research on Pseudobiological Hydroxyapatite Crystal Growth and Phase Transition Mechanisms”, *Progress in Crystal Growth and Characterization of Materials* 52, 223 – 245 (2006).
- ³⁴⁴ Xiao, Qian, R. A. Murphy, D. K. Houston, T. B. Harris, W. H. Chow, Y. Park – “Dietary and Supplemental Calcium Intake and Cardiovascular Disease Mortality: The National Institutes of Health-AARP Diet and Health Study”, *JAMA Internal Medicine* 4:1-8 (2013).
- ³⁴⁵ McNeil, Paul L., Mark Terasaki – “Coping with the Inevitable: How Cells Repair a Torn Surface Membrane”, *Nature Cell Biology* 3, E124 – E129 (2001).

-
- ³⁴⁶ Orme, Christian A., Jennifer L. Giocondi – “Model Systems for Formation and Dissolution of Calcium Phosphate Minerals”, In: *Handbook of Biomineralization Vol.2*, edited by P. Behrens & E. Bäuerlein, Wiley, Weinheim (2007).
- ³⁴⁷ Koza, John R., Martin A. Keane, Matthew J. Streeter – “Evolving Inventions”, *Scientific American* (February 2003), pp. 52 - 59.
- ³⁴⁸ Habraken, Wouter, Pamela Habibovic, Matthias Epple, Marc Bohner – “Calcium phosphates in biomedical applications: materials for the future?” *Materials Today* 19, 69 – 87 (2016).
- ³⁴⁹ Miljković, Branko – “The Sun”, available in Serbian at <http://anaiceage.blogspot.com/2011/05/branko-miljkovic-sunce.html> (1960).
- ³⁵⁰ Mandap, Madalene – “Bridging the Gap between Medicine and the Arts”, *Synapse* 53 (34) 8 (2009).
- ³⁵¹ Kramer, Kenneth – “World Scriptures: An Introduction to Comparative Religions”, Paulist Press, Mahwah, NJ (1986), pp. 100.
- ³⁵² Sorokin, Pitirim A. – “A Long Journey: The Autobiography of Pitirim A. Sorokin”, College and University Press, New Haven, CT (1963), pp. 105-106.
- ³⁵³ Updike, John – “Other Continents: Two Anglo-Indian Novels”, In: *More Matter: Essays and Criticism* by John Updike, Random House, New York, NY (1999), pp. 429.
- ³⁵⁴ Rasmussen, Steen Eiler – “Experiencing Architecture”, The M. I. T. Press, Cambridge, MA (1959), pp. 12.
- ³⁵⁵ Heppenstall, Rayner – “The Sexual Idiom” (1936), In: *What is Dance?* Edited by Roger Copeland and Marshall Cohen, Oxford University Press, New York, NY (1983).
- ³⁵⁶ Wallace, David Foster – “Big Red Son”, In: *Consider the Lobster and Other Essays*, Back Bay Books, New York, NY (2006), pp. 8.
- ³⁵⁷ “Kakav je odnos Srbije prema umetnicima?”, B92 News, retrieved from http://www.b92.net/kultura/vesti.php?nav_category=1087&yyyy=2015&mm=07&dd=12&nav_id=1014692 (July 12, 2015).
- ³⁵⁸ Campbell, Charlie – “Healthy Eating Guru Jamie Oliver Plans U. K. Hot Dog Joint”, *Time* (March 21, 2013), available at <http://newsfeed.time.com/2013/03/21/healthy-eating-guru-jamie-oliver-plans-u-k-hot-dog-joint/>.
- ³⁵⁹ *Classic Albums: The Band*, Isis Productions, VH1 (1997).
- ³⁶⁰ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 348.
- ³⁶¹ “Jill Bilcock: Dancing the Invisible”, a documentary film directed by Axel Grigor (2017).
- ³⁶² Machel, Samora – “Knowledge and science should be for the total liberation of man”, *Race and Class* 19 (4) 399 – 404.
- ³⁶³ Smith, Jeffrey C. – “Analysis of Bartók String Quartet #5”, retrieved from the repository of the Center for Computer Research in Music and Acoustics at Stanford University: <https://ccrma.stanford.edu/~jchrsmt/Papers/bartokno5v6.pdf>.

-
- ³⁶⁴ Bartók, Béla, Albert B. Lord – “Serbo-Croatian Folks Songs”, Columbia University Press, New York, NY (1951).
- ³⁶⁵ Bartók, Béla – “The Influence of Peasant Music on Modern Music” (1931), In: Béla Bartók Essays, edited by Benjamin Suchoff, Faber & Faber, London, UK (1976), pp. 340 – 344.
- ³⁶⁶ Bateson, Gregory – “Allegory”, *CoEvolution Quarterly* 44 - 46 (Spring 1978).
- ³⁶⁷ “Godard on Godard”, edited by Jean Narboni and Tom Milne, Da Capo Press, New York, NY (1968), pp. 193 - 194.
- ³⁶⁸ Yalom, Irvin D. – “The Schopenhauer Cure”, Plato, Belgrade (2006), pp. 125.
- ³⁶⁹ Schopenhauer, Arthur – “The World as Will and Representation”, Translated by E. F. J. Payne, Dover, New York, NY (1844), pp. 388.
- ³⁷⁰ Rasmussen, Steen Eiler – “Experiencing Architecture”, The M. I. T. Press, Cambridge, MA (1959), pp. 134.
- ³⁷¹ Walter, Bruno – “Gustav Mahler”, Alfred A. Knopf, New York, NY (1958), pp. 27.
- ³⁷² Dascal, Marcelo – “About Your Paper Submitted to Pragmatics & Cognition”, email correspondence (August 2, 2010).
- ³⁷³ Wikipedia article on Henry James, available at http://en.wikipedia.org/wiki/Henry_James (2012).
- ³⁷⁴ Wikipedia article on Henry James’ novel *The Ambassadors* (1903), available at http://en.wikipedia.org/wiki/The_Ambassadors (2012).
- ³⁷⁵ Schwartz, Lynne Sharon – “Ruined by Reading”, Beacon Press, Boston, MA (1996), pp. 15.
- ³⁷⁶ Uskoković, Vuk – “On Love in the Realm of Science”, *Technoetic Arts: A Journal of Speculative Research* 10 (2-3) 359 – 374 (2012).
- ³⁷⁷ Uskoković, Vuk – “Punk Philosophy as a Path to the Summit of Ethos”, *Journal of European Popular Culture* (submitted, 2015).
- ³⁷⁸ Uskoković, Vuk, Private Correspondence with David Green, David Johnston and Lisa Klein, editors of *Journal of the American Ceramic Society* (May 2015).
- ³⁷⁹ Wittgenstein, Ludwig – “*Tractatus Logico-Philosophicus*” (1918), Routledge, London, UK.
- ³⁸⁰ “The Mystery of Picasso” directed by Henri-Georges Clouzot, Filmsonor (1956).
- ³⁸¹ Prefab Sprout – “Hallelujah”, In: Steve McQueen, *Kitchenware* (1985).
- ³⁸² Hafiz – “Two Bears”, In: *My Favorite Hafiz*, an anonymously compiled collection of poems by Hafiz (300s AD), pp. 41, retrieved from <http://www.abuddhistlibrary.com/Buddhism/F-%20Miscellaneous/Miscellaneous%20Buddhism/Essays/Articles%20by%20various%20teachers/My%20Favorite%20Hafiz.pdf>.
- ³⁸³ Dewey, John – “Reconstruction in Philosophy”, Henry Holt and Co., New York, NY (1920), pp. 1.
- ³⁸⁴ Virgil – “Aeneid”, Book I: Line 462, available at <http://classics.mit.edu/Virgil/aeneid.html> (19 BC).

-
- ³⁸⁵ Solnit, Rebecca – “A Field Guide to Getting Lost”, Penguin, London (2005).
- ³⁸⁶ Picart, Caroline Joan – “Thomas Mann and Friedrich Nietzsche: Eroticism, Death, Music and Laughter”, Brill Rodopi, Leiden (1999), pp. 91.
- ³⁸⁷ Smith, Patti – “M Train”, Alfred A. Knopf, New York, NY (2015), pp. 247.
- ³⁸⁸ Wong, Jasper – “About Pow! Wow! Hawaii”, retrieved from <http://powwowhawaii.com/about-pow-wow-hawaii/> (2013).
- ³⁸⁹ Igarashi, Daisuke – “Children of the Sea 2”, VIZ Media, LLC, San Francisco, CA (2007), pp. 73.
- ³⁹⁰ “Cosmos: A Spacetime Odyssey”, documentary television series directed by Brannon Braga, Bill Pope and Ann Druyan, Cosmos Studios (2014).
- ³⁹¹ Hartsthorne, C. – “Science as the Search for the Hidden Beauty of the World”, In: *The Aesthetic Dimension of Science*, edited by D. W. Curtin, Philosophical Library, New York, NY (1980).
- ³⁹² Curtin, Deane W. (Ed.) – “The Aesthetic Dimension of Science”, Philosophical Library, New York, NY (1980).
- ³⁹³ Shakespeare, William – “Romeo and Juliet”, Act I, Scene 4, retrieved from <http://www.pubwire.com/DownloadDocs/PDFfiles/SHAKESPR/TRAGEDY/RMEOJLET.PDF> (1597).
- ³⁹⁴ Bohm, David, D. Factor, P. Garrett – “Dialogue – A Proposal”, retrieved from http://www.infed.org/archives/e-texts/bohm_dialogue.htm (1991).
- ³⁹⁵ Fitzgerald, F. Scott – “The Crack-Up”, *Esquire* (February 1936).
- ³⁹⁶ Smith, Adam – “An Inquiry into the Nature and Causes of the Wealth of Nations”, Classic House Books, New York, NY (1776).
- ³⁹⁷ Pariser, Eli – “Beware Online ‘Filter Bubbles’”, TED Talk, Long Beach, CA (2011), available at http://www.ted.com/talks/eli_pariser_beware_online_filter_bubbles.html.
- ³⁹⁸ Bach, Richard – “Jonathan Livingston Seagull”, Scribner, New York, NY (1970), pp. 61.
- ³⁹⁹ Fior, Manuele – “The Interview”, Fantagraphics Books, Seattle, WA (2013), pp. 137.
- ⁴⁰⁰ “It Looks Like a Crazy Guy Just Walking Around in the Snow. Then You Zoom Out and... Whoa”, *Viralnova* (December 23, 2013), retrieved from www.viralnova.com/simon-beck-snow-art/.
- ⁴⁰¹ Muir, John – “My First Summer in the Sierra”, Houghton Mifflin, Boston, MA (1911).
- ⁴⁰² Andrić, Dragoslav – “Chess: The Game of Millions: Advanced Course”, 8th Edition, Sportska knjiga, Belgrade (1990).
- ⁴⁰³ Vitray-Meyerovitch, Eva de – “An Anthology of Sufi Texts”, Naprijed, Zagreb (1978).
- ⁴⁰⁴ Godard, Jean-Luc - “The Image Book”, Casa Azul Films (2018).
- ⁴⁰⁵ 10,000 Maniacs – “The Big Parade”, In: *Blind Man’s Zoo*, Elektra (1989).
- ⁴⁰⁶ Sweet, Leonard – “Quantum Spirituality: A Postmodern Apologetic”, United Theological Seminary, Trotwood, OH (1991).

-
- ⁴⁰⁷ Miller, Paul D. (DJ Spooky That Subliminal Kid) – “Dark Carnival”, In: *Stars Don’t Stand Still in the Sky: Music and Myth*, Edited by Karen Kelly and Evelyn McDonnell, New York University Press, New York, NY (1999), pp. 166.
- ⁴⁰⁸ “Before Midnight”, a movie directed by Richard Linklater (2013).
- ⁴⁰⁹ Flaming Lips – “Yoshimi Battles the Pink Robots Pt. 1”, In: *Yoshimi Battles the Pink Robots*, Warner Bros (2002).
- ⁴¹⁰ Heidegger, Martin – “The Question Concerning Technology”, In: *Basic Writings*, translated by D. F. Krell, Harper & Row, New York, NY (1954).
- ⁴¹¹ “Byzantium Story”, a documentary directed by Sam Robertson (1995).
- ⁴¹² J. Giesbrecht – “How the Ballpoint Pen Killed Cursive”, *The Atlantic* (August 28, 2015), retrieved from <https://www.theatlantic.com/technology/archive/2015/08/ballpoint-pens-object-lesson-history-handwriting/402205/>.
- ⁴¹³ Rabolt, John F. – “Innovations in Spectroscopic Instrumentation: Evolution, Revolution or Back to the Future?”, *Innovations in Materials Characterization Award Lecture*, Materials Research Society Conference, San Francisco, CA (April 4, 2013).
- ⁴¹⁴ “Harakiri”, directed by Masaki Kobayashi (1962).
- ⁴¹⁵ “Portable Blake”, Selected and Arranged by Alfred Kazin, Viking press, New York, NY (1946).
- ⁴¹⁶ Gowans, Alan – “The Restless Art: A History of Painters and Painting, 1760 – 1960”, J. B. Lippincott Company, Philadelphia, PA (1966), pp. 56.
- ⁴¹⁷ Dostoyevsky, Fyodor Mikhailovich – “The Idiot”, Prosveta, Belgrade (1869).
- ⁴¹⁸ Alex, comment on Cran, Brad – “The Academic Mob and Its Fatal Toll”, *Quiellette* (March 2, 2018), retrieved from <http://quiellette.com/2018/03/02/academic-mob-fatal-toll/>.
- ⁴¹⁹ de Villeneuve, Gabrielle-Suzanne Barbot – “The Beauty and the Beast”, Harper, New York, NY (1740).
- ⁴²⁰ Love – “Alone Again Or”, In: *Forever Changes*, Elektra (1967).
- ⁴²¹ Crabb, Doris – “Breaking Silence”, Speech given at University of North Carolina, Asheville, available at <http://www.dorisdoris.com/speech.html> (2009).
- ⁴²² Crabb, Cindy, Official Web Page, available at <http://www.dorisdoris.com/submit.html> (2012).
- ⁴²³ Berry, Mick, Michael R. Edelstein – “Stage Fright: 40 Stars Tell You How They Beat America’s #1 Fear”, See Sharp Press, Tucson, AZ (2009), pp. 36.
- ⁴²⁴ Uskoković, Vuk – “Isn't Self-Assembly a Misnomer? Multi-Disciplinary Arguments in Favor of Co-Assembly”, *Advances in Colloid and Interface Science* 141 (1-2) 37 - 47 (2008).
- ⁴²⁵ Nietzsche, Friedrich – “Why I am So Wise”, Section 2 in *Ecce Homo: How One Becomes What One Is*, Oxford University Press, Oxford, UK (1888).
- ⁴²⁶ Washburne, Christopher J., Maiken Derno (Eds.) – “Bad Music: The Music We Love to Hate”, Routledge, New York, NY (2004), pp. ix.

-
- ⁴²⁷ Fletcher, Alen – “The Art of Looking Sideways”, Phaidon, London (2001).
- ⁴²⁸ Johnson, Stephen – “Mahler: His Life & Music”, Sourcebooks, Naperville, IL (2007), pp. 82.
- ⁴²⁹ Zuffi, Stefano – “Color in Art”, Abrams, New York, NY (2012), pp. 142.
- ⁴³⁰ Kauffmann, Stanley – “Tokyo Story”, In: Tokyo Story, edited by David Desser, Cambridge University Press, Cambridge, UK (1975), pp. 152.
- ⁴³¹ Cooke, Alistair – “Fame”, In: The Essential Chaplin: Perspectives on the Life and Art of the Great Comedian, edited by Richard Schickel, Ivan R. Dee, Chicago, IL (2006), pp. 122.
- ⁴³² Glanville, Ranulph – “Sed Quis Custodient Ipsos Custodes?”, In: *Self-Steering and Cognition in Complex Systems*, pp. 107 - 112, edited by F. Heylighen, E. Rosseel and F. Demeyere, Gordon and Breach, London, UK (1990).
- ⁴³³ Schimmel, Annemarie – “Mystical Dimensions of Islam”, University of North Carolina Press, Chapel Hill, NC (1975), pp. 165.
- ⁴³⁴ Uskoković, Vuk – “Isn't Self-Assembly a Misnomer? Multi-Disciplinary Arguments in Favor of Co-Assembly”, *Advances in Colloid and Interface Science* 141 (1-2) 37 - 47 (2008).
- ⁴³⁵ Mahon, Basil – “The Man who Changed Everything: The Life of James Clark Maxwell”, Wiley, Chichester, UK (2004), pp. 61.
- ⁴³⁶ Weaver, Frederick S. – “Economic Literacy: Basic Economics with an Attitude”, Roman & Littlefield Publishers, Inc., Lanham, MD (2011), pp. 78.
- ⁴³⁷ Imai, Masaaki – “KAIZEN – The Key to Japan’s Competitive Success”, Mono i Manjana, Belgrade, Serbia (1986), pp. 95.
- ⁴³⁸ Seoane-Vazquez, Enrique – “Teaching Cost-Effectiveness Analysis to PharmD Students”, Lecture at the Chapman University School of Pharmacy, Irvine, CA (April 21, 2017).
- ⁴³⁹ Džamić, Lazar – “Najčešći stereotipi o Srbima: 10 pojmova balkanskog mentaliteta“, B92 News (November 15, 2015), retrieved from http://http://bulevar.b92.net/srpska-posla.php?yyyy=2015&mm=11&dd=15&nav_id=1063357.
- ⁴⁴⁰ Dubin, Nina L. – “Futures & Ruins: Eighteenth-Century Paris and the Art of Hubert Robert”, Getty Research Institute, Los Angeles, CA (2010), pp. 13.
- ⁴⁴¹ Vlahos, James – “Is Sitting a Lethal Activity?”, *The New York Times* (April 14, 2011); available at <http://www.nytimes.com/2011/04/17/magazine/mag-17sitting-t.html>.
- ⁴⁴² Rynck, Patrick de – “How to Read a Painting: Lessons from the Old Masters”, Harry N. Abrams, Inc., Publishers, New York, NY (2004), pp. 56.
- ⁴⁴³ Kiely, Robert – “Blessed and Beautiful”, Yale University Press, New Haven, CT (2010), pp. 5.
- ⁴⁴⁴ Pet Shop Boys – “Being Boring”, In: Behaviour, Parlophone (1990).
- ⁴⁴⁵ Sivananda, Swami – “Thought Power”, 11th Edition, A Divine Life Society, Uttar Pradesh, The Himalayas, India (1996).

-
- ⁴⁴⁶ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁴⁴⁷ Signer, Michael – “Demagogue: The Fight to Save Democracy from Its Worst Enemies”, Macmillan, New York, NY (2009).
- ⁴⁴⁸ “Minority Report”, *The Daily Beast* (February 18, 2012); available at <http://www.thedailybeast.com/newsweek/2010/02/18/minority-report.html>.
- ⁴⁴⁹ Callister, William D. Jr., David G. Rethwisch – “Fundamentals of Materials Science and Engineering: An Integrated Approach”, John Wiley & Sons, Hoboken, NJ (2008), pp. 46.
- ⁴⁵⁰ Bateson, Gregory – “Mind and Nature”, Hampton Press, Cresskill, NJ (1979).
- ⁴⁵¹ Corcoran, George, Department of Pharmaceutical Sciences, Wayne State University, Personal Correspondence (2012).
- ⁴⁵² Young, Neil – “From Hank to Hendrix”, In: *Unplugged*, Reprise (1993).
- ⁴⁵³ Churchill, Winston – “The World Crisis”, The Folio Society, London, UK (1923).
- ⁴⁵⁴ Giles, Jim – “Internet Encyclopaedias Go Head to Head”, *Nature* 438, 900 – 901 (December 15, 2005).
- ⁴⁵⁵ Lanier, Jaron – “You Are Not a Gadget: A Manifesto”, New York, NY (2011).
- ⁴⁵⁶ Peng, S., H. Dhruv, B. Armstrong, B. Salhia, C. Legendre, J. Kiefer, J. Parks, S. Virk, A. E. Sloan, Q. T. Ostrom, J. S. Barnholtz-Sloan, N. L. Tran, M. E. Berens – “Integrated genomic analysis of survival outliers in glioblastoma”, *Neuro Oncology* 19(6):833-844 (2017).
- ⁴⁵⁷ Maggini, Laura, Davide Bonifazi – “Hierarchised Luminescent Organic Architectures: Design, Synthesis, Self-Assembly, Self-Organisation and Functions”, *Chemical Society Reviews* 41 (1) 211 – 241 (2012).
- ⁴⁵⁸ Baum, R. – “Nanotechnology: Drexler and Smalley Make the Case For and Against 'Molecular Assemblers'”, *Chemical & Engineering News* 81 (48) 37 – 42 (December 1, 2003).
- ⁴⁵⁹ The phrase is from Ursula K. Le Guin’s *Unlocking the Air* and is quoted in: Jauregul, Ann – “Epiphanies: A Psychotherapist’s Tales of Spontaneous Emotional Healing”, Prima Lifestyles, New York, NY (2003).
- ⁴⁶⁰ Kohut, Margaret – “The Complete Guide to Understanding, Controlling, and Stopping Bullies & Bullying at Work”, Atlantic Publishing Group, Ocala, FL (2008), pp. 119.
- ⁴⁶¹ “Greenberg”, a movie directed by Noah Baumbach (2010).
- ⁴⁶² Horrocks, Dylan – “Hicksville”, *Drawn & Quarterly*, Montreal, CA (1998), pp. 80.
- ⁴⁶³ Newsom, Joanna – “Ys”, *Drag City*, Chicago, IL (2006).
- ⁴⁶⁴ Dylan, Bob – “Desolation Row”, In: *Highway 61 Revisited*, Columbia (1965).
- ⁴⁶⁵ Heidegger, Martin – “Poetry, Language, Thought”, Harper Perennial, New York, NY (1971), pp. 3.
- ⁴⁶⁶ Capra, Fritjof – “The Science of Leonardo: Inside the Mind of the Great Genius of the Renaissance”, Doubleday, New York, NY (2007).

-
- ⁴⁶⁷ Gelb, Michael J. – “How to Think like Leonardo da Vinci: Seven Steps to Genius Every Day”, Dell, New York, NY (2000).
- ⁴⁶⁸ Buñuel, Luis – “My Last Sigh”, Translated by Abigail Israel, Vintage Books, New York, NY (1983), pp. 5.
- ⁴⁶⁹ Lambert, Frank L. – “The Conceptual Meaning of Thermodynamic Entropy in the 21st Century”, *International Research Journal of Pure & Applied Chemistry* 1 (3) 65 - 68 (2011).
- ⁴⁷⁰ Anthes, E. – “The Re-Envisionaries”, *Seed* 76 – 84 (July/August 2008).
- ⁴⁷¹ Reed, Sarah – “Is There an Astronomer in the House?”, *Science* 331 (6018) 696 – 697 (2011).
- ⁴⁷² Hassan, Z., C. H. Lai (eds.) – “Ideals and Realities: Selected Essays of Abdus Salam”, World Scientific, Singapore (1984).
- ⁴⁷³ Reis, Richard M. – “Tomorrow’s Professor: Preparing for Careers in Science and Engineering”, Wiley-IEEE, New York, NY (1997).
- ⁴⁷⁴ Weiner, Norbert – “Cybernetics: or, Control and communication in the animal and the machine”, MIT Press, Boston, MA (1965).
- ⁴⁷⁵ Whitehead, Alfred North – “Science and the Modern World”, Nolit, Belgrade (1925).
- ⁴⁷⁶ Milgram, Sharon – “Working and Playing Well with Others: Using the Myers-Briggs Type Indicator to Understand Yourself and Those around You”, Lecture at the National Postdoctoral Association Conference, Philadelphia, March 13, 2010.
- ⁴⁷⁷ Kaku, Michio – “Einstein’s Universe”, Heliks, Smederevo (2004).
- ⁴⁷⁸ Glasersfeld, Ernst von – “Radical Constructivism: A Way of Knowing and Learning”, RoutledgeFalmer, London, UK (1995).
- ⁴⁷⁹ Tesla, Nikola – “My Inventions”, SoHo Books, New York, NY (1919), pp. 43.
- ⁴⁸⁰ Hong, Felix T. – “A Multi-Disciplinary Survey on Biocomputing: 1 & 2. Molecular and Cellular Levels & Systems and Evolutionary Levels, and Technological Applications”, in “Information Processing and Living Systems” 1 - 573, edited by V. B. Bajic and T. T. Wee, Imperial College Press, London (2005).
- ⁴⁸¹ European Molecular Biology Laboratory – “Forgetting to learn: Neural mechanisms in mouse brains indicate that we actively forget as we learn”, *Science Daily* (March 18, 2016), retrieved from <https://www.sciencedaily.com/releases/2016/03/160318085641.htm>.
- ⁴⁸² Ramachandran, Vilayanur – “Three Clues to Understanding Your Brain”, TED Talk (March 2007), available at http://www.ted.com/talks/vilayanur_ramachandran_on_your_mind.html.
- ⁴⁸³ Pask, Gordon – “Against Conferences or the Poverty of Reduction in Sop-Science and Pop-Systems”, In: Proceedings of the Silver Anniversary International Meeting of Society for General Systems Research, London, August 1979, SGSR, Washington, DC (1979), pp. xii - xxv.
- ⁴⁸⁴ Ashby, W. Ross – “An Introduction to Cybernetics”, Chapman & Hall, London, UK (1956).
- ⁴⁸⁵ Chang, Peter, Chapman University, Personal Correspondence (February 13, 2018).

-
- ⁴⁸⁶ The quote is originally from Alexander Pope's *Thoughts on Various Subjects* (1727) and was found in: Hoff, Benjamin – "The Tao of Pooh and the Te of Piglet", Egmont, London, UK (1992).
- ⁴⁸⁷ Green, Martin L., Laura Espinal, Enrico Traversa, Eric J. Amis – "Materials for Sustainable Development", *MRS Bulletin* 37 (4) 303 – 308 (2012).
- ⁴⁸⁸ McGirr, Lisa – "Suburban Warriors: The Origins of the New American Right (Politics and Society in Modern America)", Chapter 1, Princeton University Press, Princeton, NJ (2002).
- ⁴⁸⁹ Mann, Stephen – "Biom mineralization: Principles and Concepts in Bioinorganic Materials Chemistry", Oxford University Press, New York, NY (2001).
- ⁴⁹⁰ Kierkegaard, Søren – "Purity of Heart is to Will One Thing", Harper & Row, New York, NY (1847).
- ⁴⁹¹ Gregoire, Carolyn – "Explaining the 'Empathy Gap' in Our Reactions to Paris and Beirut", Huffington Post (November 16, 2015), retrieved from http://www.huffingtonpost.com/entry/paris-beirut-response_5649d707e4b08cda34898202.
- ⁴⁹² Heidegger, Martin – "Poetry, Language, Thought", Harper Perennial, New York, NY (1971).
- ⁴⁹³ Harper, Ralph – "The Seventh Solitude: Man's Isolation in Kierkegaard, Dostoyevsky, and Nietzsche", The Johns Hopkins Press, Baltimore, MD (1965), pp. 14.
- ⁴⁹⁴ Wallace, David Foster – "This is Water: Some Thoughts, Delivered on a Significant Occasion about Living a Compassionate Life", Little, Brown and Company, New York, NY (2009).
- ⁴⁹⁵ Specht, Richard – "Feuilleton: *Das Lied von der Erde*", Newue Freie Presse (December 4, 1911), In: Mahler and His World, edited by Karen Painter, Princeton University Press, Princeton, NJ (2002), pp. 336.
- ⁴⁹⁶ Bateson, Gregory – "Mind and Nature", Hampton Press, Cresskill, NJ (1979).
- ⁴⁹⁷ Feynman, Richard P. – "The Meaning of It All: Thoughts of a Citizen Scientist", Helix Books/Addison-Wesley, Reading, MA (1998).
- ⁴⁹⁸ Mutaftschiev, Boyan – "The Atomistic Nature of Crystal Growth", Springer, Berlin (2001).
- ⁴⁹⁹ Montoya, Estrella R., David Terburg, Peter A. Bos, Jack van Honk – "Testosterone, Cortisol, and Serotonin as Key Regulators of Social Aggression: A Review and Theoretical Perspective", *Motivation and Emotion* 36 (1) 65 – 73 (2012).
- ⁵⁰⁰ Hanna, Thomas – "Somatics", Perseus Books, Cambridge, MA (1988).
- ⁵⁰¹ Minsky, Marvin. Interview. Retrieved from <https://www.youtube.com/watch?v=yHValEmyKoM> (2016).
- ⁵⁰² Dostoyevsky, Fyodor Mikhailovich – "The Brothers Karamazov", Prosveta, Belgrade, Serbia (1880).
- ⁵⁰³ Marc J. Seifer – "Wizard: The Life and Times of Nikola Tesla: Biography of a Genius", Citadel Press, New York, NY (1998), pp. 105.
- ⁵⁰⁴ Hamvas, Béla – "Scientia Sacra", Dereta, Belgrade (1943).
- ⁵⁰⁵ "Oglasili se nemački naučnici: Brišite odmah poruke vanzemaljaca", B92 News (February 17, 2018), retrieved from https://www.b92.net/zivot/vesti.php?yyyy=2018&mm=02&dd=17&nav_id=1359945.

-
- ⁵⁰⁶ Chesterton, Gilbert Keith – “Orthodoxy”, retrieved from www.gutenberg.org/files/130/130.txt (1906).
- ⁵⁰⁷ Priester, Louise – “Grain Boundaries: From Theory to Engineering”, Springer Series in Materials Science 172, Springer, Dordrecht (2013), pp. 300.
- ⁵⁰⁸ I. Tinoco, K. Sauer Jr., K. C. Wang – “Physical Chemistry: Principles and Applications in Biological Sciences”, Third Edition, Prentice Hall, Englewood Cliffs, NJ (1995), pp. 325.
- ⁵⁰⁹ Reiss, H. – “Entropy-induced dispersion of bulk liquids”, *Journal of Colloid and Interface Science* 53, 61 – 70 (1975).
- ⁵¹⁰ Mason, Thomas G. – “Emulsiogenesis and the Emergence of Nanoemulsions”, *Matter* 1, 542 – 546 (2019).
- ⁵¹¹ Pellegrino, Charles – “Unearthing Atlantis: An Archeological Odyssey”, Random House, New York, NY (1991), pp. 37.
- ⁵¹² Pantarakis, Pareena, Masakuni Matsuoka, Adrian E. Flood – “Effect of Growth Rate History on Current Crystal Growth. 2. Crystal Growth of Sucrose, $\text{Al}(\text{SO}_4)_2 \cdot 12\text{H}_2\text{O}$, KH_2PO_4 , and K_2SO_4 ”, *Crystal Growth and Design* 7 (12) 2635 – 2642 (2007).
- ⁵¹³ Milošević-Đorđević, Nada – “Stefan Nemanja u srpskoj narodnoj književnosti”, In: Međunarodni naučni skup, Stefan Nemanja – Sveti Simeon Mirotočivi: Istorija i predanje (Septembar 1996), edited by Jovanka Kalić, Srpska Akademija Nauka i Umetnosti, Belgrade (2000), pp. 413.
- ⁵¹⁴ Jung, Carl Gustav – “Memories, Dreams, Reflections”, Atos, Belgrade (1961), pp.226.
- ⁵¹⁵ Jakšić, Đura – “Ja sam stena / I am a stone”, available at http://www.kodkicosa.com/ja_sam_stena.htm (1870).
- ⁵¹⁶ Dučić, Jovan – “First Letter from Switzerland”, In: Cities and Chimeras, Matica srpska, Belgrade, Serbia (1940), pp. 99.
- ⁵¹⁷ Shakespeare, William – “Hamlet: Act II, Scene 2” (1602).
- ⁵¹⁸ Ballvé, Marcelo – “The Literary Alchemy of César Aira”, *The Quarterly Conversation*, available at <http://quarterlyconversation.com/cesar-aira-how-i-became-a-nun> (2011).
- ⁵¹⁹ Bellos, David – “Jacques Tati: His Life and Art”, The Harvill Press, London, UK (1999), pp. 204.
- ⁵²⁰ Twin Peaks: TV Series, directed by David Lynch, Republic Pictures (1990).
- ⁵²¹ Chen, Y., H. I. Okur, N. Gomopoulos, C. Macias-Romero, P. S. Cremer, P. B. Petersen, G. Tocci, D. M. Wilkins, C. Liang, M. Ceriotti, S. Roke – “Electrolytes induce long-range orientational order and free energy changes in the H-bond network of bulk water”, *Science Advances* 2, e1501891 (2016).
- ⁵²² Phillips, Brian – “Crisis on Infinite Courts”, *The Ringer* (July 14, 2019), retrieved from <https://www.theringer.com/2019/7/14/20693870/novak-djokovic-roger-federer-wimbledon-final-2019>.
- ⁵²³ “Crossfire Hurricane” documentary directed by Brett Morgan (2012)
- ⁵²⁴ Anderson, Laurie Halse, Emily Carroll – “Speak”, Farrar Strauss Giroux, New York, NY (2018), pp. 280 - 281.
- ⁵²⁵ Pamplin, Brian R. (ed.) – “Crystal Growth”, 2nd Edition, Pergamon Press, Oxford, UK (1980).

-
- ⁵²⁶ Uskoković, Vuk – “On Science of Metaphors and the Nature of Systemic Reasoning”, *World Futures: Journal of General Evolution* 65, 241 – 269 (2009).
- ⁵²⁷ Seferis, George – “Mycenae”, In: *Collected Poems, 1924 – 1955, Bilingual Edition*, Translated by Edmund Keeley and Philip Sherrard, Princeton University Press, New Jersey, NJ (1967), pp. 67.
- ⁵²⁸ Borges, Jorge Luis – “The Aleph and Other Stories”, Penguin, London, UK (1946).
- ⁵²⁹ Blake, William – “The Pickering Manuscript”, Kessinger Publishing, Whitefish, MT (1803).
- ⁵³⁰ Hamvas, Béla – “Scientia Sacra”, Dereta, Belgrade (1943).
- ⁵³¹ Protić, Jelica, Dejan Ristanović – “Building Computers in Serbia: The First Half of the Digital Century”, *Computer Science and Information Systems (ComSIS)* 8 (3) 549 – 571 (2011).
- ⁵³² Orwell, George – “Nineteen Eighty-Four”, Secker and Warburg, London, UK (1949).
- ⁵³³ Knuth, Donald E. – “Structured Programming with *go to* Statements”, *Computing Surveys* 6 (4) 261 – 301 (December 1974).
- ⁵³⁴ Deaux, Jon – “Skool Daze”, In: Lowery C., Walker A., Thomas C. (eds), *Un-Democratic Acts*. SensePublishers, Rotterdam, NL (2016), pp. 131.
- ⁵³⁵ Ebert, Roger – “Why Did the Chicken Cross the Genders?”, *Chicago Sun-Times* (November 27, 2005).
- ⁵³⁶ Ward, Keith – “God: A Guide for the Perplexed”, Oneworld, Oxford, UK (2003).
- ⁵³⁷ Thomas, Lewis – “Late Night Thoughts on Listening to Mahler’s Ninth Symphony”, Bantam Books, New York, NY (1983), pp. 168.
- ⁵³⁸ Buckham, James Wright – “Idealism and Realism: A Suggested Synthesis”, *The Journal of Philosophy* 39 (15) 402 – 414 (1942).
- ⁵³⁹ Pascal, Blaise – “Pensées”, *Pensée No. 519*, Translated by A. J. Krailsheimer, Penguin, Harmondsworth, UK (1662), pp. 213.
- ⁵⁴⁰ Gombrich, E. H. – “The Story of Art”, Fifteenth Edition, Phaidon Press, London, UK (1989), pp. 464.
- ⁵⁴¹ Wilkinson, D. H. – “The Universe as Artefact”, In: *Scientific Models and Man*, The Herbert Spencer Lectures delivered at the University of Oxford, 1976, Clarendon Press, Oxford, UK (1979).
- ⁵⁴² The Mojo Hall of Fame, *Mojo Magazine*, 10th Anniversary Issue (November 2003), retrieved from <http://www.rocklistmusic.co.uk/mojo.html>.
- ⁵⁴³ Guinness, Os – “The Call; Finding and Fulfilling the Central Purpose of Your Life”, Thomas Nelson, Nashville, TN (1998).
- ⁵⁴⁴ Schuller, Gunther – “Form and Aesthetics in Twentieth Century Music”, In: *The Aesthetic Dimension of Science*, edited by D. W. Curtin, Philosophical Library, New York, NY (1980).
- ⁵⁴⁵ Wilczek, Frank, Betsy Devine – “Longing for the Harmonies: Themes and Variations from Modern Physics”, W. W. Norton & Company, New York, NY (1988), pp. XI.

-
- ⁵⁴⁶ “What Life Means to Einstein: An Interview by George Sylvester Viereck”, *Saturday Evening Post* 202, p. 117 (26 October 1929).
- ⁵⁴⁷ Wilkinson, D. H. – “The Universe as Artefact”, In: *Scientific Models and Man*, The Herbert Spencer Lectures delivered in the University of Oxford, 1976, Clarendon Press, Oxford, UK (1979).
- ⁵⁴⁸ Damascene, Hieromonk – “Christ the Eternal Tao”, Valaam Books, Platina, CA (1999).
- ⁵⁴⁹ Frost, Anthony, Ralph Yarrow – “Improvisation in Drama”, 2nd Edition, Palgrave Macmillan, New York, NY (2007), pp. 127.
- ⁵⁵⁰ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade, pp.102 (1923).
- ⁵⁵¹ Gibran, Kahlil – “The Prophet”, Paideia, Belgrade, pp.69 (1923).
- ⁵⁵² Slater, Mel – “Where I Do Science”, *Seed* 53 (July/August 2008).
- ⁵⁵³ Mettke-Hofmann, Claudia, Eberhard Gwinner – “Long-Term Memory for a Life on the Move”, *PNAS* 100, 5863 – 6 (2003).
- ⁵⁵⁴ Bjørkvold, Jon-Roar – “The Muse Within: Creativity and Communication, Song and Play from Childhood through Maturity”, Harper Collins, New York, NY (1989), pp. 52.
- ⁵⁵⁵ Anyanwu, K. – “The Idea of Art in African Thought”, In: *Contemporary Philosophy: A New Survey*, Vol. 5 – African Philosophy, edited by G. Fløistad, Springer, Dordrecht (1987).
- ⁵⁵⁶ Hawking, Stephen – “A Brief History of Time”, Bantam Books, New York, NY (1988).
- ⁵⁵⁷ Dylan, Bob – “Meet Me in the Morning”, In: *Blood on the Tracks*, Columbia (1975).
- ⁵⁵⁸ Pascal, Blaise – “Pensées”, Translated by A. J. Krailsheimer, Penguin, Harmondsworth, UK (1662), pp. 104.
- ⁵⁵⁹ LeFevre, Camille – “The Dance Bible: The Complete Resource for Aspiring Dancers”, Barron’s, Hauppauge, NY (2012), pp. 214.
- ⁵⁶⁰ D. Farhi – “Becoming Who You Are”, In: *Yoga: The Essence of Life*, edited by Alix Johnson, Allen & Unwin, Crows Nest, NSW (2004), pp. 1 – 24.
- ⁵⁶¹ LeFevre, Camille – “The Dance Bible: The Complete Resource for Aspiring Dancers”, Barron’s, Hauppauge, NY (2012), pp. 106.
- ⁵⁶² Bjørkvold, Jon-Roar – “The Muse Within: Creativity and Communication, Song and Play from Childhood through Maturity”, Harper Collins, New York, NY (1989), pp. 348.
- ⁵⁶³ Dylan, Bob – “Just Like Tom Thumb’s Blues”, In: *Highway 61 Revisited*, Columbia (1965).
- ⁵⁶⁴ Spolin, Viola – “Improvisation for the Theater”, Northwestern University Press, Evanston, IL (1963).
- ⁵⁶⁵ Hull, S. Loraine – “Strasberg’s Method: A Practical Guide for Actors, Teachers and Directors”, Ox Bow Publishing, Woodbridge, CN (1985), pp. 300.
- ⁵⁶⁶ Hanna, Thomas – “Somatics”, pp. 41, Perseus Books, Cambridge, MA (1988).

-
- ⁵⁶⁷ Havrilesky, Heather – “Why Are Americans So Fascinated With Extreme Fitness?”, *The New York Times* (October 14, 2014), retrieved from http://www.nytimes.com/2014/10/19/magazine/why-are-americans-so-fascinated-with-extreme-fitness.html?_r=0.
- ⁵⁶⁸ Stanislavski, Constantin – “Building a Character”, Routledge, New York, NY (1936), pp. 38.
- ⁵⁶⁹ Nokia, Miriam S., Sanna Lensu, Juha P. Ahitainen, Petra P. Johansson, Lauren G. Koch, Steven L. Britton, Heikki Kainulainen – “Physical exercise increases adult hippocampal neurogenesis in male rats provided it is aerobic and sustained”, *The Journal of Physiology* 594, 1855 – 1873 (2016).
- ⁵⁷⁰ Warner, John C. – “Green Chemistry”, Lecture held at the University of California, San Francisco (January 2009).
- ⁵⁷¹ Levenson, R. W., P. Ekman, W. V. Friesen – “Voluntary Facial Action Generates Emotion-Specific Autonomic Nervous System Activity”, *Psychophysiology* 27 (4) 363 – 384 (1990).
- ⁵⁷² Carpi, F., D. De Rossi – “Bioinspired Actuation of the Eyeballs of an Android Robotic Face: Concept and Preliminary Investigations”, *Bioinspiration & Biomimetics* 2, S50 – S63 (2007).
- ⁵⁷³ Maturana, Humberto, Francisco Varela – “The Tree of Knowledge: The Biological Roots of Human Understanding”, Shambhala, Boston, MA (1987).
- ⁵⁷⁴ Anon. – “How Guardiola & 3-2-2-3 (Ultimately) Solved the Defending Meta”, *Spielverlagerung* (March 22, 2021), retrieved from <https://spielverlagerung.com/2021/03/22/how-guardiola-3-2-2-3-ultimately-solved-the-defending-meta/>.
- ⁵⁷⁵ A. Cooper – “Thermodynamics of Protein Folding and Stability”, In *Protein: A Comprehensive Treatise* Vol. 2, pp. 217 – 270, edited by Geoffrey Allen, JAI Press, Stamford, CN (1999).
- ⁵⁷⁶ R. Metzler, T. Ambjörnsson – “Dynamic Approach to DNA Breathing”, *Journal of Biological Physics* 31 (3-4) 339 – 350 (2005).
- ⁵⁷⁷ Bjørkvold, Jon-Roar – “The Muse Within: Creativity and Communication, Song and Play from Childhood through Maturity”, Harper Collins, New York, NY (1989), pp. 129.
- ⁵⁷⁸ Interview with Warren McCulloch on Canadian Broadcasting Co. (1969), retrieved from <https://www.youtube.com/watch?v=MTmR6X2w8Tg>.
- ⁵⁷⁹ Interview with Warren McCulloch on Canadian Broadcasting Co. (1969), retrieved from <https://www.youtube.com/watch?v=MTmR6X2w8Tg>.
- ⁵⁸⁰ Wordsworth, William – “Rainbow/My Heart Leaps Up” (1802), available at http://en.wikipedia.org/wiki/My_Heart_Leaps_Up.
- ⁵⁸¹ Priester, Louisette – “Grain Boundaries: From Theory to Engineering”, Springer Series in Materials Science 172, Springer, Dordrecht (2013), pp. 3.
- ⁵⁸² Copeland, Roger – “Merce Cunningham and the Politics of Perception” (1979), In: *What is Dance?* Edited by Roger Copeland and Marshall Cohen, Oxford University Press, New York, NY (1983), pp. 317.
- ⁵⁸³ Vanderkam, Laura – “The Secret of School Success”, *USA Today* September 11 – 13, pp.7 (2009).
- ⁵⁸⁴ Witcher, Moony – “Nina and the Secret Eye of the Atlantis”, Giunti Junior, Milano (2005).
- ⁵⁸⁵ Plato – “Phaedrus”, translated by Benjamin Jowett, retrieved from

classics.mit.edu/Plato/phaedrus.html.

- ⁵⁸⁶ Foerster, Heinz von – “On Constructing a Reality”, Presented at the Fourth International Conference on Environmental Design Research, Blacksburg, VA (1973). In: Heinz von Foerster’s Understanding Understanding: Essays on Cybernetics and Cognition, Springer, New York, NY (2010), pp. 211 – 228.
- ⁵⁸⁷ The Smiths – “There is a Light that Never Goes Out”, In: Queen is Dead, Rough Trade (1986).
- ⁵⁸⁸ Monáe, Janelle – “The Electric Lady”, Wondaland Arts Society (2013).
- ⁵⁸⁹ Lowen, Alexander – “Spirituality of the Body”, Esotheria, Belgrade (1990).
- ⁵⁹⁰ Suzuki, Tadashi – “The Way of Acting: The Theatre Writings of Tadashi Suzuki”, Theatre Communications Group, New York, NY (1986), pp. 6.
- ⁵⁹¹ Bellos, David – “Jacques Tati: His Life and Art”, The Harvill Press, London, UK (1999), pp. 333.
- ⁵⁹² Paterson, Mary – “The Monks and Me: How 40 Days at Thich Nhat Hanh’s French Monastery Guided Me Home”, Hampton Roads, Charlottesville, VA (2012), pp. 204.
- ⁵⁹³ “Flip-flops are not good for feet?”, available at http://www.b92.net/zdravlje/vesti.php?yyyy=2012&mm=06&nav_id=616535 (2012).
- ⁵⁹⁴ Powell, Michael, Emeric Pressburger – “The Red Shoes”, Michael Powell & Emeric Pressburger a.k.a. The Archers, UK (1948).
- ⁵⁹⁵ Tirman, John – “100 Ways America is Screwing Up the World”, Harper Perennial, New York, NY (2006), pp. 204.
- ⁵⁹⁶ Tirman, John – “100 Ways America is Screwing Up the World”, Harper Perennial, New York, NY (2006), pp. 239.
- ⁵⁹⁷ Copeland, Roger – “Merce Cunningham: The Modernizing of Modern Dance”, Routledge, London, UK (2003).
- ⁵⁹⁸ Thompson, D’Arcy Wentworth – “On Growth and Form”, Dover, London, UK (1917).
- ⁵⁹⁹ Lowen, Alexander – “Spirituality of the Body”, Esotheria, Beograd (1990).
- ⁶⁰⁰ Schwartz, Jeffrey, Personal Correspondence (2009).
- ⁶⁰¹ Lieh-Tzu – “Taoist Teachings”; retrieved from <http://www.gutenberg.org/etext/7341> (5th Century BCE).
- ⁶⁰² Plato – “Phaedrus”, BIGZ, Belgrade.
- ⁶⁰³ Schumacher, Ernst Fritz – “A Guide for the Perplexed”, Harper & Row, New York, NY (1977).
- ⁶⁰⁴ The Cult – “She Sells Sanctuary”, In: Love, Beggars Banquet, London, UK (1985).
- ⁶⁰⁵ The Stooges – “T.V. Eye”, In: Fun House, Elektra, Los Angeles, CA (1970).
- ⁶⁰⁶ Hanna, Thomas – “Somatics”, Perseus Books, Cambridge, MA (1988).
- ⁶⁰⁷ Neugarten, Michael L. – “Foresight – Are We Looking in the Right Direction?”, *Futures* 38 (8) 894 – 907 (2006).

-
- ⁶⁰⁸ Soranzo, A., M. Newberry – “The Uncatchable Smile in Leonardo da Vinci’s La Bella Principessa Portrait”, *Vision Research* 113, 78 – 86 (2015).
- ⁶⁰⁹ R. E. M. – “Electrolite”, In: *New Adventures in Hi-Fi*, Warner Bros (1996).
- ⁶¹⁰ Coupland, Douglas – “Microserfs”, Flamingo, London, UK (1995).
- ⁶¹¹ Konopacki, Allen – “Making Eye Contact”, Incomm Center for Research & Sales Training, Chicago, IL (2010); available at <http://www.nlpinfocentre.com/nlpebooks/Eye%20Contact.pdf>.
- ⁶¹² Yates, Diana – “Brief Diversions Vastly Improve Focus, Researchers Find”, Illinois News Bureau (February 8, 2011), available at http://www.news.illinois.edu/news/11/0208focus_AlejandroLleras.html.
- ⁶¹³ Johnson, Linton Kwesi – “John de Crow”. Cited in Miller, Paul D. (DJ Spooky That Subliminal Kid) – “Dark Carnival”, In: *Stars Don’t Stand Still in the Sky: Music and Myth*, Edited by Karen Kelly and Evelyn McDonnell, New York University Press, New York, NY (1999), pp. 167.
- ⁶¹⁴ Neugarten, Michael L. – “Foresight – Are We looking in the Right Direction?”, *Futures* 38 (8) 894 – 907 (2006).
- ⁶¹⁵ Mann, Stephen – “Biomineralization: Principles and Concepts in Bioinorganic Materials Chemistry”, Oxford University Press, New York, NY (2001).
- ⁶¹⁶ Piper, Watty, Lois Lenski – “The Little Engine that Could”, Platt and Munk, New York, NY (1930).
- ⁶¹⁷ Van Morrison – “Ballerina”, In: *Astral Weeks*, Warner Bros (1968).
- ⁶¹⁸ Cat Power – “Lived in Bars”, In: *The Greatest*, Matador (2005).
- ⁶¹⁹ Sinelnikov, Valeriy – “Zavoli bolest svoju”, Zrak, Novi Sad (2014), pp. 60.
- ⁶²⁰ Wikipedia entry on Keith Johnstone, available at http://en.wikipedia.org/wiki/Keith_Johnstone (2012).
- ⁶²¹ Frost, Anthony, Ralph Yarrow – “Improvisation in Drama”, 2nd Edition, Palgrave Macmillan, New York, NY (2007), pp. 144.
- ⁶²² Bracewell, Michael – “When Surface was Depth: Death by Cappuccino and Other Reflections on Music and Culture in the 1990’s”, Da Capo Press, Cambridge, MA (2002), pp. 135.
- ⁶²³ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁶²⁴ Quoted in: Crowley, John – “Little, Big: or, The Fairies’ Parliament”, Bantam Books, New York, NY (1981).
- ⁶²⁵ Blur – “Girls & Boys”, In: *Parklife*, Food, UK (1994).
- ⁶²⁶ Person, Ethel Spector – “Dreams of Love and Fateful Encounters”, Penguin, New York, NY (1988), pp. 267.
- ⁶²⁷ Wikipedia page on Elisabeth Haich: https://en.wikipedia.org/wiki/Elisabeth_Haich (2015).
- ⁶²⁸ Pease, Barbara, Allen Pease – “The Definitive Book of Body Language”, Bantam, New York, NY (2006).

-
- ⁶²⁹ Rosanes-Berrett, Marilyn – “Do You Really Need Eyeglasses”, Finesa, Beograd (1983).
- ⁶³⁰ Lica, Mihaela – “Blank Face – Business Body Language Series”, Everything PR (December 29, 2009); available at <http://www.pamil-visions.net/blank-face/29585/>.
- ⁶³¹ Tillich, Paul – “The Courage to Be”, Yale University Press, New Haven, CN (1952), pp. 78.
- ⁶³² Tillich, Paul – “The Courage to Be”, Yale University Press, New Haven, CN (1952), pp. 78.
- ⁶³³ Rilke, Rainer Maria – “Letters to a Young Poet”, Translated by Charlie Louth, Penguin, New York, NY (1908), pp. 56.
- ⁶³⁴ Gadamer, Hans-Georg – “Truth and Method”, Continuum, New York, NY (1997).
- ⁶³⁵ Walsch, Neale Donald – “Conversations with God”, Ambrozija, Zagreb (1995).
- ⁶³⁶ Cochran, Noelle, Lele Diamond – “Emotional Intellect Discipline”, Lecture at the St. Mary’s Cathedral, San Francisco, CA (November 4, 2013).
- ⁶³⁷ Knight, Heather – “Alice’s life on the sidewalk ends with a dignified death”, San Francisco Chronicle (February 26, 2018), retrieved from <https://www.sfchronicle.com/news/article/Alice-s-life-on-the-sidewalk-ends-with-a-12710768.php>.
- ⁶³⁸ The modified quote is a reference to Mephistopheles’ description of himself in Goethe’s Faust, the description Mikhail Bulgakov used as the epigraph for his novel, *The Master and Margarita*: ““Say at last – who art thou?’ ‘That Power I serve which wills forever evil yet does forever good’” (Translated by Michael Glenny, Collins and Harvill Press, London, UK (1940)).
- ⁶³⁹ Coplan, Jeremy D., Sarah Hodulik, Sanjay J. Matthew, Xiangling Mao, Patrick R. Hof, Jack M. Gorman, Dikoma C. Shungu – “The Relationship between Intelligence and Anxiety: An Association with Subcortical White Matter Metabolism”, *Frontiers in Evolutionary Neuroscience* 3, 8 (2011).
- ⁶⁴⁰ Halbstar and Umbra – “SF Aphorisms”, www.myspace.com/halbstarandumbra (2008).
- ⁶⁴¹ Foerster, Heinz von – “On Constructing a Reality”, Presented at the Fourth International Conference on Environmental Design Research, Blacksburg, VA (1973). In: Heinz von Foerster’s *Understanding Understanding: Essays on Cybernetics and Cognition*, Springer, New York, NY (2010), pp. 211 – 228.
- ⁶⁴² ChessNetwork – “Bobby Fischer wins AGAIN with the Fischer-Sozin Attack in 19 moves”, retrieved from <https://www.youtube.com/watch?v=FzBQBUBuZo> (2021).
- ⁶⁴³ Dostoyevsky, Fyodor Mikhailovich – “The Idiot”, Prosveta, Belgrade (1869).
- ⁶⁴⁴ BorG, Comment to “Kako živi Panta Petrović, ‘čovjek iz pećine’ koji je zaintrigirao Ilona Maska”, B92 News (August 27, 2021), retrieved from https://www.b92.net/zivot/komentari.php?nav_id=1913371.
- ⁶⁴⁵ Costello, Elvis – “Alison”, In: *My Aim is True*, Stiff, UK (1977).
- ⁶⁴⁶ Beer, Stafford – “On the Nature of Models: Let Us Now Praise Famous Men and Women, Too (from Warren McCulloch to Candace Pert)”, *Informing Science* 2 (3) 69 – 83 (1999).
- ⁶⁴⁷ Kelly, Kevin – “Out of Control: The New Biology of Machines, Social Systems and the Economic World”, Perseus Books, Reading, MA (1994).

-
- ⁶⁴⁸ Joy Division – “She’s Lost Control”, In: Unknown Pleasures, Factory Records (1979).
- ⁶⁴⁹ Andrić, Ivo – “Signs Beside the Road”, Jumedica Mont, Podgorica (1976).
- ⁶⁵⁰ R. E. M. - “Nightswimming”, In: Automatic for the People, Warner Bros (1992).
- ⁶⁵¹ Gilroy, Paul – “Analogues of Mourning, Mourning the Analog”, In: Stars Don’t Stand Still in the Sky: Music and Myth, Edited by Karen Kelly and Evelyn McDonnell, New York University Press, New York, NY (1999), pp. 271.
- ⁶⁵² Feynman, Richard P. – “The Meaning of It All: Thoughts of a Citizen Scientist”, Helix Books/Addison-Wesley, Reading, MA (1998).
- ⁶⁵³ Pope, Alexander – “An Essay on Criticism” (1709), retrieved from <http://poetry.eserver.org/essay-on-criticism.html>.
- ⁶⁵⁴ Godard, Jean-Luc – “Histoire(s) du cinema – Chapter 1: Toutes les histoires”, Canal + (1988).
- ⁶⁵⁵ Updike, John – “Odd Jobs: Essays and Criticism”, Knopf, New York, NY (1991), pp. 791.
- ⁶⁵⁶ Upton, Dell – “Architecture in the United States”, Oxford University Press, Oxford, UK (1998), pp. 267. The pulpit can be seen in a bonus video feature An American Masterpiece: The First Church of Christ, Scientist, Berkeley that comes with the feature-length documentary Pursuing Beauty: The Architecture of Bernard Maybeck by Paul Bockhorst Productions, also available at <https://www.youtube.com/watch?v=uALwGA82Qmc> (2012), 7’15”.
- ⁶⁵⁷ Swaney, James A., Robert Premus – “Modern Empiricism and Quantum-Leap Theorizing in Economics”, In: Why Economics is Not Yet a Science, edited by Alfred S. Eichner, M. E. Sharpe, Inc., Armonk, NY (1983), pp. 48.
- ⁶⁵⁸ Spence, Joseph – “Anecdotes, Observations, and Characters, of Books and Men, Vol.1”, John Murray, London, UK (1820), pp. 158.
- ⁶⁵⁹ Hight, Gilbert – “The Art of Teaching”, Vintage Books, New York, NY (1950), pp. 212.
- ⁶⁶⁰ Marcus, Greil - “Like a Rolling Stone: Bob Dylan at the Crossroads”, Public Affairs, New York, NY (2005), pp. 56.
- ⁶⁶¹ Marcus, Greil - “Like a Rolling Stone: Bob Dylan at the Crossroads”, Public Affairs, New York, NY (2005), pp. 225.
- ⁶⁶² Hooks, bell – “Teaching to Transgress: Education as the Practice of Freedom”, Routledge, New York, NY (1994), pp. 11.
- ⁶⁶³ McCulloch, W. S., W. Pitts – “A Logical Calculus of the Ideas Immanent in Nervous Activity”, *Bulletin of Mathematical Biophysics* 5, 115 (1943).
- ⁶⁶⁴ Sakharkar, Meena Kishore, Vincent T. K. Chow, Pandjassarame Kanguane – “Distributions of Exons and Introns in the Human Genome”, *In Silico Biology* 4, 0032 (2004).
- ⁶⁶⁵ Mitscher, L. A. – “Bacterial Topoisomerase Inhibitors: Quinolone and Pyridone antibacterial Agents”, *Chemical Reviews* 105, 559 – 592 (2005).
- ⁶⁶⁶ Ball, Philip – “Chancing upon Chemical Wonders”, *Chemistry World* 32 (June 2006).

-
- ⁶⁶⁷ Roberts, R. M. – “Serendipity: Accidental Discoveries on Science”, Wiley, New York, NY (1989).
- ⁶⁶⁸ Ratner, Buddy, Allan S. Hoffman, Frederick J. Schoen, Jack E. Lemons – “Biomaterials Science: An Introduction to Materials in Medicine”, Academic Press, San Diego, CA (1996), pp. 1.
- ⁶⁶⁹ Bankhead, Charles - “Glaucoma Drug Boosts Eyelash Growth”, MedPage Today; retrieved from <http://www.medpagetoday.com/MeetingCoverage/AAD/13241> (March 12, 2009).
- ⁶⁷⁰ Castellana, Donatello, Ralf Paus, Mirna Perez-Moreno – “Macrophages Contribute to the Cyclic Activation of Adult Hair Follicle Stem Cells”, PLOS Biology 12 (12) e1002002.
- ⁶⁷¹ Hawkshaw, N. J., J. A. Hardman, I. S. Haslam, A. Shahmalak, A. Gilhar, X. Lim, et al. – “Identifying novel strategies for treating human hair loss disorders: Cyclosporine A suppresses the Wnt inhibitor, SFRP1, in the dermal papilla of human scalp hair follicles”, PLoS Biol. 16 (5): e2003705 (2018).
- ⁶⁷² Packard, Vernal S. – “Processed Foods and the Consumer: Additives, Labeling, Standards, and Nutrition”, University of Minnesota Press, Minneapolis, MN (1976), pp. 332.
- ⁶⁷³ Evans, H. M., J. A. Long – “The Effect of the Anterior Lobe of Administered Intraperitoneally upon Growth, Maturity and Oestrous Cycle”, 37th Session of the American Association of Anatomists, Abstract #38, Anatomic Record Abstract 38 (1921).
- ⁶⁷⁴ Bright, George M. – “Recombinant IGF-I: Past, Present and Future”, Growth Hormone & IGF Research 28, 62 – 65 (2016).
- ⁶⁷⁵ De Witt, Michelle, Alexander Gamble, Derek Hanson, Daniel Markowitz, Caitlin Powell, Saleh Al Dimassi, Mark Atlas, John Boockvar, Rosamaria Ruggieri, and Marc Symons – “Repurposing Meprobamate as a Replacement for Vincristine for the Treatment of Brain Tumors”, Molecular Medicine 2017, 50 – 56 (2017).
- ⁶⁷⁶ Simmering, J. E., Welsh, M. J., Liu, L., Narayanan, N. S., Pottegård, A. Association of Glycolysis-Enhancing α -1 Blockers With Risk of Developing Parkinson Disease. JAMA Neurology 78, 407 - 413 (2021).
- ⁶⁷⁷ Fukuda, Shinichi, Akhil Varshney, Benjamin J. Fowler, Shao-bin Wang, Siddharth Narendran, Kameshwari Ambati, Tetsuhiro Yasuma, Joseph Magagnoli, Hannah Leung, Shuichiro Hirahara, Yosuke Nagasaka, Reo Yasuma, Ivana Apicella, Felipe Pereira, Ryan D. Makin, Eamonn Magner, Xinan Liu, Jian Sun, Mo Wang, Kirstie Baker, Kenneth M. Marion, Xiwen Huang, Elmira Baghdasaryan, Meenakshi Ambati, Vidya L. Ambati, Akshat Pandey, Lekha Pandya, Tammy Cummings, Daipayan Banerjee, Peirong Huang, Praveen Yerramothu, Genrich V. Tolstonog, Ulrike Held, Jennifer A. Erwin, Apua C. M. Paquola, Joseph R. Herdy, Yuichiro Ogura, Hiroko Terasaki, Tetsuro Oshika, Shaban Darwish, Ramendra K. Singh, Saghar Mozaffari, Deepak Bhattarai, Kyung Bo Kim, James W. Hardin, Charles L. Bennett, David R. Hinton, Timothy E. Hanson, Christian Röver, Keykavous Parang, Nagaraj Kerur, Jinze Liu, Brian C. Werner, S. Scott Sutton, Srinivas R. Sadda, Gerald G. Schumann, Bradley D. Gelfand, Fred H. Gage, Jayakrishna Ambati – “Cytoplasmic synthesis of endogenous *Alu* complementary DNA via reverse transcription and implications in age-related macular degeneration”, Proceedings of the National Academy of Sciences 118 (6) e2022751118 (2021).
- ⁶⁷⁸ The National Institute of Neurological Disorders and Stroke – “21st Century Prevention and Management of Migraine Headaches”, Clinical Courier 19 (8) 1 – 15 (September 2001).

-
- ⁶⁷⁹ Giblett, E. R., J. E. Anderson, F. Cohen, B. Pollara, H. J. Meuwissen – “Adenosine-deaminase deficiency in two patients with severely impaired cellular immunity”, *Lancet* 2 (7786) 1067 – 9 (1972).
- ⁶⁸⁰ Thompson, Linda F., J. Edwin Seegmiller – “Adenosine Deaminase Deficiency and Severe Combined Immunodeficiency Disease”, In: *Advances in Enzymology and Related Areas of Molecular Biology*, Edited by Alton Meister, John Wiley & Sons, New York, NY (1980), pp. 168.
- ⁶⁸¹ Mentioned by Herbert Boyer during Campus to Commerce: Trailblazers of Biotechnology Transfer event, Byers Auditorium, UCSF Mission Bay, San Francisco, CA (November 18, 2013).
- ⁶⁸² Langer, Robert – “Advances in Chemistry and Their Implications for Studying and Treating Brain Disease”, *Molecular Frontiers Journal* 1, 1 – 8 (2017).
- ⁶⁸³ Ho, R. J. Y. – “Introduction to Biopharmaceuticals”, In: *Biotechnology and Biopharmaceuticals: Transforming Proteins and Genes into Drugs*, edited by R. J. Y. Ho, John Wiley & Sons, Hoboken, NJ (2013), pp. 481.
- ⁶⁸⁴ Brunham, R. C., K. M. Coombs – “In Celebration of the 200th Anniversary of Edward Jenner’s Inquiry into the causes and effects of the variolae vacinae”, *Canadian Journal of Infectious Disease* 9, 310 – 313 (1998).
- ⁶⁸⁵ Ban, Thomas A. – “The Role of Serendipity in Drug Discovery”, *Dialogues in Clinical Neuroscience* 8(3): 335–344 (2006).
- ⁶⁸⁶ Nilsson, Molly – “The Lonely”, In: *These Things Take Time*, Dark Skies Association (2008).
- ⁶⁸⁷ F. V. Ross (director) – “Bloomin’ Mud Shuffle”, Factory 25, Brooklyn, NY (2015).
- ⁶⁸⁸ Ho, R. J. Y. – “Introduction to Biopharmaceuticals”, In: *Biotechnology and Biopharmaceuticals: Transforming Proteins and Genes into Drugs*, edited by R. J. Y. Ho, John Wiley & Sons, Hoboken, NJ (2013), pp. 489.
- ⁶⁸⁹ Uskoković, Vuk – “Trends in Practical Colloid Science”, Nova Science Publishers, Hauppauge, NY (2009).
- ⁶⁹⁰ Ban, Thomas A. – “The Role of Serendipity in Drug Discovery”, *Dialogues in Clinical Neuroscience* 8(3): 335–344 (2006).
- ⁶⁹¹ Kornberg, Arthur – “Of Serendipity and Science”, retrieved from http://www.rockefeller.edu/pubinfo/Pasteur/Kornberg_essay.html (2009).
- ⁶⁹² Zeltner, Brie – “Case Western Reserve University researchers use skin cancer drug to reverse Alzheimer’s symptoms in mice”, *Cleveland Plain Dealer* (February 9, 2012), available at http://www.cleveland.com/healthfit/index.ssf/2012/02/case_western_reserve_universit_5.html.
- ⁶⁹³ Rakić, Tamara, Maja Lazarević, Živko S. Jovanović, Svetlana Radović, Sonja Siljak-Yakovlev, Branka Stevanović, Vladimir Stevanović – “Resurrection plants of the genus *Ramonda*: prospective survival strategies – unlock further capacity of adaptation, or embark on the path of evolution?”, *Frontiers in Plant Science* 4, 550 (2014).
- ⁶⁹⁴ Yamanaka, Shinya – “New Era of Medicine with iPS Cells”, Lecture at the 2013 World Alliance Forum: Future of Stem Cells, Golden Gate Club, San Francisco, CA (November 15, 2013).
- ⁶⁹⁵ Chesterton, Gilbert Keith – “The Everlasting Man”, Hodder & Stoughton, London, UK (1925).

-
- ⁶⁹⁶ Kuhn, Thomas – “The Structure of Scientific Revolutions”, Nolit, Belgrade (1969).
- ⁶⁹⁷ Schrödinger, Erwin – “Mind and Matter”, Cambridge University Press, Cambridge, UK (1944), pp. 100 - 101.
- ⁶⁹⁸ Solnit, Rebecca – “A Field Guide to Getting Lost”, Penguin, London (2005).
- ⁶⁹⁹ “Prava istina o poreklu HIV-a”, B92 News (October 4, 2014), retrieved from http://www.b92.net/zdravlje/vesti.php?yyyy=2014&mm=10&nav_id=907594.
- ⁷⁰⁰ Rumi, Jalaluddin – “Signs of the Unseen: the Discourses of Jalaluddin Rumi”, Introduction and Translation by W. M. Thackston, Jr., Shambhala, Boston, MA (1994), pp. 79.
- ⁷⁰¹ Nilsson, A., Lars G. M. Petersson – “The structural origin of anomalous properties of liquid water”, Nature Communications 6, 8998 (2015).
- ⁷⁰² Ferguson, Donald Nivison – “The Why of Music: Dialogues in an Unexplored Region of Appreciation”, University of Minnesota Press, Minneapolis, MN (1969), pp. 195 – 196.
- ⁷⁰³ Wagner, Richard – “My Life” (1870), retrieved from <http://www.the-wagnerian.com/2011/07/download-my-life-richard-wagner-in.html>.
- ⁷⁰⁴ “My Dinner with Andre”, a movie directed by Louis Malle (1981)
- ⁷⁰⁵ Benjamin, Walter – “Illuminations”, Schocken, New York (1969), pp. 256.
- ⁷⁰⁶ Uskoković, Sandra – “Destruction and Oblivion as Critical (Motivating) Factors in Heritage: Monuments as Places of Absence”, Ars Adriatica 10, 241 – 258 (2020).
- ⁷⁰⁷ Vivekananda, Swami – “Gjana Yoga”, Om, Belgrade (1988).
- ⁷⁰⁸ Sweet, Leonard – “Quantum Spirituality: A Postmodern Apologetic”, United Theological Seminary, Trotwood, OH (1991).
- ⁷⁰⁹ Thoreau, Henry David – “Walden”, Penguin, New York, NY (1986).
- ⁷¹⁰ Murry, Paul, Bob Ogle – “Super Goof”, Whitman Publishing, Atlanta, GA (1965 – 1984), retrievable from <https://readcomiconline.to/Comic/Super-Goof>.
- ⁷¹¹ Yang, Gene Luen – “The Eternal Smile”, First Second Books, New York, NY (2009).
- ⁷¹² Heidegger, Martin – “Poetry, Language, Thought”, Harper Perennial, New York, NY (1971).
- ⁷¹³ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁷¹⁴ Collins, Francis – “Exceptional Opportunities for Biomedical Research”, Lecture at the National Postdoctoral Association Conference, Philadelphia, March 13, 2010.
- ⁷¹⁵ Radić, Antonio – “‘The Applause’: Fischer vs Spassky (1972) Game 6”, Agadmator’s Chess Channel, <https://www.youtube.com/watch?v=dv52uwNfFZg&t=525s> (2018).
- ⁷¹⁶ Jurodivost on Wikipedia in Serbian, retrieved from <https://sr.m.wikipedia.org/wiki/Јуродивост> (2018).
- ⁷¹⁷ Pop, Iggy – “Turn Blue”, In: Lust for Life, RCA (1977).

-
- ⁷¹⁸ Tolokonnikova, Nadezhda – “The Closing Statements at the Trial of Pussy Riot”, Moscow, Russia (August 8, 2012); the translation to Serbian available at <http://pescanik.net/2012/08/zavrсна-rec-nadezde-tolokonikove-na-sudenju-pussy-riot/>.
- ⁷¹⁹ Dubliminal – “I’m Getting Old and This is Why a Lot (Not All!) of Contemporary Music Leaves Me Dry”, *Reddit* (September 15, 2016), retrieved from https://www.reddit.com/r/Music/comments/52ux14/im_getting_old_and_this_is_why_a_lot_not_all_of/.
- ⁷²⁰ Farley, Joshua C. – “The Economics of Sustainability”, In: *Sustainability: Multi-Disciplinary Perspectives*, edited by Heriberto Cabezas and Urmila Diwekar, Bentham Science Publishers, Oak Park, IL (2012).
- ⁷²¹ Boyle, R. A., T. M. Lenton, H. T. P. Williams - "Neoproterozoic 'snowball Earth' glaciations and the evolution of altruism", *Geobiology* 5 (4) 337 – 349 (2007).
- ⁷²² Pulliam, H. R. – “On the Advantages of Flocking”, *Journal of Theoretical Biology* 38, 419 – 422 (1973).
- ⁷²³ “Science of Flirting”, available at http://www.b92.net/zivot/ljubav.php?yyyy=2011&mm=02&dd=04&nav_id=490587 (2011).
- ⁷²⁴ Nyegosh, Petar Petrovich – “The Mountain Wreath”, rendered into English by James. W. Wiles, George Allen & Unwin, London, UK (1846).
- ⁷²⁵ The Smiths – “Frankly, Mr. Shankly”, In: *The Queen is Dead*, Rough Trade (1985).
- ⁷²⁶ Bird, Andrew – “Fiery Crash”, In: *Armchair Apocrypha*, Fat Possum Records, Oxford, MS (2007).
- ⁷²⁷ Dubin, Nina L. – “Futures & Ruins: Eighteenth-Century Paris and the Art of Hubert Robert”, Getty Research Institute, Los Angeles, CA (2010), pp. 72.
- ⁷²⁸ Vauchez, André – “Francis of Assisi: The Life and Afterlife of a Medieval Saint”, Yale University Press, New Haven, CN (2009), pp. 133, 338-339.
- ⁷²⁹ Wigglesworth, Mark – “Love and Death: Mark’s Notes on Shostakovich Symphony No.14”, retrieved from <https://www.markwigglesworth.com/notes/marks-notes-on-shostakovich-symphony-no-14/> (1999).
- ⁷³⁰ Liang, Shona – “Soviet Snow”, In: *South*, TVT Records (1987).
- ⁷³¹ Ross, Steve, Olivia Rosewood – “Happy Yoga: 7 Reasons Why There’s Nothing to Worry About”, Harper Collins, New York (2003), pp. 197.
- ⁷³² Njegoš, Petar Petrović – “The Ray of the Microcosm”, Nolit, Belgrade (1845).
- ⁷³³ Morris, Desmond – “The Lives of Surrealists”, Thames & Hudson, New York, NY (2018), pp. 110.
- ⁷³⁴ Sivananda, Swami – “Thought Power”, 11th Edition, A Divine Life Society, Uttar Pradesh, The Himalayas, India (1996), pp. 4.
- ⁷³⁵ Mills, Paul J., Laura Redwine, Kathleen Wilson, Meredith A. Pung, Kelly Chinh, Barry H. Greenberg, Ottar Lunde, Alan Maisel, Ajit Raisinghani, Alex Wood, Deepak Chopra – “The Role of Gratitude in Spiritual Well-Being in Asymptomatic Heart Failure Patients”, *Spirituality in Clinical Practice* 2 (1) 5 (2015).
- ⁷³⁶ Oasis – “Whatever”, Creation (1994).

-
- ⁷³⁷ Curtin, Deane W. (ed.) – “The Aesthetic Dimension of Science”, Philosophical Library, New York, NY (1980).
- ⁷³⁸ Moritz, R. E. (director) – “Collections in Vienna: Jacob van Ruisdael, 1000 Masterpieces from the Great Museums of the World”, Arthaus Musik, Halle, Germany (1984).
- ⁷³⁹ Dubin, Nina L. – “Futures & Ruins: Eighteenth-Century Paris and the Art of Hubert Robert”, Getty Research Institute, Los Angeles, CA (2010), pp. 12-13.
- ⁷⁴⁰ Whitehead, Alfred North – “Science and the Modern World”, Nolit, Belgrade (1925).
- ⁷⁴¹ Spinoza, Benedict de – “The Ethics (Ethica Ordine Geometrico Demonstrata)”, translated by R. H. M. Elwes, retrieved from frank.mtsu.edu/~rbombard/RB/Spinoza/ethica-front.html (1677).
- ⁷⁴² Gioia, Ted – “Healing Songs”, Duke University Press, Durham, NC (2006), pp. 18.
- ⁷⁴³ Njegoš, Petar Petrović – “The Ray of the Microcosm”, Nolit, Belgrade (1845).
- ⁷⁴⁴ Epigraph to Mikhail Bulgakov’s *The Master and Margarita*, Ardis Publishers, Dana Point, CA (1940).
- ⁷⁴⁵ Cash, Johnny – “A Boy Named Sue”, Columbia Records (1969).
- ⁷⁴⁶ Kinney, Harry Alexander – “Tennessee Williams and the Fugitive Kind”, University of California Berkeley, Berkeley, CA (1983), pp. 124.
- ⁷⁴⁷ Paterson, Mary – “The Monks and Me: How 40 Days at Thich Nhat Hanh’s French Monastery Guided Me Home”, Hampton Roads, Charlottesville, VA (2012), pp. 4.
- ⁷⁴⁸ Bryson, Lucy – “Why Brazilians are Always Late”, BBC Travel (July 29, 2018), retrieved from <http://www.bbc.com/travel/story/20180729-why-brazilians-are-always-late>.
- ⁷⁴⁹ Pease, Barbara, Allen Pease – “The Definitive Book of Body Language”, Bantam, New York, NY (2006), pp. 117 - 118.
- ⁷⁵⁰ Miller, Michael E. – “No More Baby: Sorority Sister Gets Life Term for Tossing Newborn into Trash to Die”, *The Washington Post* (June 28, 2016), retrieved from https://www.washingtonpost.com/news/morning-mix/wp/2016/06/28/no-more-baby-sorority-sister-gets-life-term-for-tossing-newborn-into-trash-to-die/?hpid=hp_no-name_no-name%3Ahomepage%2Fstory.
- ⁷⁵¹ Doyle, Carrie – “Donna Tartt on *The Goldfinch*, Inspiration, and the Perils of Literary Fame”, *Town & Country Magazine* (September 12, 2019), retrieved from <https://www.townandcountrymag.com/leisure/arts-and-culture/a29022016/donna-tartt-goldfinch-interview/>.
- ⁷⁵² Gadamer, Hans-Georg – “Truth and Method”, Continuum, New York, NY (1997).
- ⁷⁵³ Winograd, Terry, Fernando Flores – “Understanding Computers and Cognition: A New Foundations for Design”, Ablex Publishing Corporation, Norwood, NJ (1987).
- ⁷⁵⁴ “10 Strange Facts about Einstein”, *Neatorama* (March 26, 2007), retrieved from <https://www.neatorama.com/2007/03/26/10-strange-facts-about-einstein/>.
- ⁷⁵⁵ “Innocent When You Dream: The Tom Waits Reader”, edited by Mac Montandon, Thunder’s Mouth Press, New York, NY (2005), pp. 134.

-
- ⁷⁵⁶ Wittgenstein, Ludwig – “Tractatus Logico-Philosophicus” (1918), Routledge, London, UK.
- ⁷⁵⁷ Kristensen, Stefan – “Touching the Virgin. On the Politics of Intimacy in Jean-Luc Godard’s *Hail Mary*”, *Emotion, Space and Society* 13, 134 – 139 (2014).
- ⁷⁵⁸ “Challenges at the Frontiers of Matter and Energy: Transformative Opportunities for Discovery Science: A Report from the Basic Energy Sciences Advisory Committee”, U.S. Department of Energy (November 2015), pp. vi, retrieved from https://science.energy.gov/~media/bes/besac/pdf/Reports/Challenges_at_the_Frontiers_of_Matter_and_Energy_rpt.pdf.
- ⁷⁵⁹ Cuddy, Amy – “Your Body Language Shapes Who You Are”, TED talk (June 2012), available at http://www.ted.com/talks/amy_cuddy_your_body_language_shapes_who_you_are.html.
- ⁷⁶⁰ Yesudian, Selvarajan, Elisabeth Haich – “Yoga and Sport”, Saznanja, Belgrade (1956).
- ⁷⁶¹ Burton, Robert A. – “A Skeptic’s Guide to the Mind: What Neuroscience Can and Cannot Tell Us about Ourselves”, St. Martin’s Press, New York, NY (2013).
- ⁷⁶² Schwartz, Jeffrey M., Sharon Begley – “The Mind & the Brain: Neuroplasticity and the Power of Mental Force”, V. B. Z., Zagreb, Croatia (2002), pp. 211.
- ⁷⁶³ Murad, Ferid – “Application of Nitric Oxide Research to Drug Development”, Lecture given at the 7th World Congress on Preventive & Regenerative Medicine, Taipei, Taiwan (2014).
- ⁷⁶⁴ Blakeslee, Sandra – “Cells that Read Minds”, *New York Times* (January 10, 2006).
- ⁷⁶⁵ Welsh, Irvine – “Trainspotting”, Secker & Warburg, London, UK (1993).
- ⁷⁶⁶ Radiohead – “Lift”, retrieved from <https://www.youtube.com/watch?v=QBGaO89cBMI> (2017)
- ⁷⁶⁷ Radiohead – “How to Disappear Completely”, In: Kid A, Parlophone (2000).
- ⁷⁶⁸ Raković, Dejan – “Sećanja, snovi, razmišljanja: O prošlom i budućem”, Internacionalni anti-stres centar, Belgrade (2008).
- ⁷⁶⁹ Frankl, Viktor – “Why to Believe in Others” (May 1972), available at http://www.ted.com/talks/viktor_frankl_youth_in_search_of_meaning.html.
- ⁷⁷⁰ Shmecho, E., J. Hull – “A very short film about Kristin Hersh”, retrieved from <https://youtu.be/rfjDDKyKv3U> (2011).
- ⁷⁷¹ Pirsig, Robert M. – “Zen and the Art of Motorcycle Maintenance”, Vintage, London, UK (1974).
- ⁷⁷² Moritz, R. E. (director) – “Stedelijk Museum – Amsterdam: In The Wing-Beat of the Swans, 1000 Masterpieces from the Great Museums of the World”, Arthaus Musik, Halle, Germany (1984).
- ⁷⁷³ Yesudian, Selvarajan, Elisabeth Haich – “Hatha-yoga: Übungsbuch. Fortsetzung von Sport und Yoga”, Saznanja, Belgrade (1971).
- ⁷⁷⁴ Nakaya, Naoki, Y. Tsubono, T. Hosokawa, Y. Nishino, T. Ohkubo, A. Hozawa, D. Shibuya, S. Fukudo, A. Fukao, I. Tsuji, S. Hisamichi – “Personality and the Risk of Cancer”, *Journal of the National Cancer Institute* 95 (11) 799 – 805 (2003).

-
- ⁷⁷⁵ “Строитель здорового образа жизни”, documentary movie directed by Svetlana Ershova (2008), retrieved from https://www.youtube.com/watch?v=uguzf_thd3Q#t=110.
- ⁷⁷⁶ Editorial – “It is Healthy Being Kind”, *Ana - Politika*, Belgrade (October 30, 2007).
- ⁷⁷⁷ Y. Huang, T. Hamana, J. Liu, C. Wang, L. An, P. You, J. Y. F. Chang, J. Xu, C. Jin, Z. Zhang, W. L. McKeenan, F. Wang – “Type 2 Fibroblast Growth Factor Receptor Signaling Preserves Stemness and Prevents Differentiation of Prostate Stem Cells from the Basal Compartment”, *Journal of Biological Chemistry* 290, 17753 – 17761 (2015).
- ⁷⁷⁸ Evans, D.J., D.J. Searles – “The Fluctuation Theorem”, *Advances in Physics* 51, 1529-1585 (2002).
- ⁷⁷⁹ Bustamante, Carlos, Jan Liphardt, Felix Ritort – “The Nonequilibrium Thermodynamics of Small Systems”, *Physics Today* 43 – 48 (July 2005).
- ⁷⁸⁰ Hamvas, Béla – “Anthologia humana”, Dereta, Belgrade (1947).
- ⁷⁸¹ Nietzsche, Friedrich – “Thus Spake Zarathustra: A Book For All and None”, translated by Thomas Common, retrieved from eserver.org/philosophy/nietzsche-zarathustra.txt (1883).
- ⁷⁸² Milošević, Saša – “United States: Serbian Couple Struggles to Get Children Back”, Global Voices (January 4, 2011), retrieved from <http://globalvoicesonline.org/2011/01/04/united-states-serbian-couple-struggles-to-get-children-back/>.
- ⁷⁸³ Muth, Jon J. – “Zen Shorts”, Scholastic Press, New York, NY (2005).
- ⁷⁸⁴ Gonzalez-Balado, Jose Luis – “Mother Teresa: In My Own Words”, Liguori Publications, Liguori, MO (1997).
- ⁷⁸⁵ Shaftel, David – “Novak Djokovic is No.1, Like It or Not”, *The New York Times* (September 7, 2015), retrieved from http://www.nytimes.com/2015/09/11/fashion/mens-style/novak-djokovic-how-to-be-a-champion.html?_r=0.
- ⁷⁸⁶ Kramer, Kenneth – “World Scriptures: An Introduction to Comparative Religions”, Paulist Press, Mahwah, NJ (1986), pp. 90.
- ⁷⁸⁷ Zhang, Nanyin, Department of Biomedical Engineering, Pennsylvania State University, Personal Correspondence, State College, PA (October 15, 2014).
- ⁷⁸⁸ Oasis – “Whatever”, Creation (1994).
- ⁷⁸⁹ Frost, Anthony, Ralph Yarow – “Improvisation in Drama”, 2nd Edition, Palgrave Macmillan, New York, NY (2007), pp. 170.
- ⁷⁹⁰ Spolin, Viola – “Improvisation for the Theater”, Northwestern University Press, Evanston, IL (1963).
- ⁷⁹¹ Polanyi, Michael – “The Structure of Consciousness”, *Brain* 86, 799 – 810 (1965).
- ⁷⁹² Polanyi, Michael – “Life's Irreducible Structure”, *Science* 160, 1308 – 1312 (1968).
- ⁷⁹³ Čermelj, Lavo – “Josip Stefan: Life and Work of a Great Physicist”, Slovenski knjižni zavod, Ljubljana (1950).
- ⁷⁹⁴ Jaspers, Karl – “Reason and Existenz”, Translated by William Earle, Johns. Storm Verlag, Bremen, Germany (1935), pp. 23.

-
- ⁷⁹⁵ Hafiz – “Two Puddles Chatting”. In: *The Gift: The Poems by Hafiz*, Translated by Daniel Ladinsky, Penguin Compass, New York, NY (14th Century), pp. 171.
- ⁷⁹⁶ Carroll, Lewis – “Alice's Adventures in Wonderland”, Penguin Books, London (1865).
- ⁷⁹⁷ Polanyi, Michael – “Life's Irreducible Structure”, *Science* 160, 1308 – 1312 (1968).
- ⁷⁹⁸ Collingwood, Robin George – “Language and Languages” (1938), In: *What is Dance?* Edited by Roger Copeland and Marshall Cohen, Oxford University Press, New York, NY (1983), pp. 374.
- ⁷⁹⁹ Westside Toastmasters – “Say What – Managing Accents”, available at http://westsidetoastmasters.com/article_reference/physical_technique.shtml#bodylang (2012).
- ⁸⁰⁰ Shins – “Mine’s Not a High Horse”, In: *Chutes Too Narrow*, Sub Pop (2003).
- ⁸⁰¹ Herrigel, Eugen – “Zen in the Art of Archery”, Vintage, London, UK (1953).
- ⁸⁰² Dostoyevsky, Fyodor Mikhailovich – “The Brothers Karamazov”, Prosveta, Belgrade, pp. 723 (1880).
- ⁸⁰³ Martel, Yann – “Life of Pi”, Harcourt, Orlando, FL (2001).
- ⁸⁰⁴ Byrne, Rhonda – “The Secret”, Atria, New York, NY (2006).
- ⁸⁰⁵ McKibben, Bill – “The Christian Paradox: How a Faithful Nation Gets Jesus Wrong”, *Harper’s Magazine* (August 2005), available at <http://harpers.org/archive/2005/08/0080695>.
- ⁸⁰⁶ Russell, Peter – “The Real Secret”, *Ode* 74 – 75 (October 2007).
- ⁸⁰⁷ Hill, Lauryn – “Doo-Wop (That Thing)”, In: *The Miseducation of Lauryn Hill*, Ruffhouse (1998).
- ⁸⁰⁸ Wood, Joanne V., W. Q. E. Perunović, J. W. Lee – “Positive Self-Statements: Power for Some, Peril for Others”, *Psychological Science* 20 (7) 860 – 866 (2009).
- ⁸⁰⁹ Schuller, Gunther – “Form and Aesthetics in Twentieth Century Music”, In: *The Aesthetic Dimension of Science*, edited by D. W. Curtin, Philosophical Library, New York, NY (1980).
- ⁸¹⁰ Mehnert, Klaus – “Twilight of the Young”, Hoover Institution Press, Stanford, CA (1976), pp. 206.
- ⁸¹¹ Eliot, Thomas Stearns – “Little Gidding”, In: *Four Quartets*, Harcourt, San Diego, CA (1943).