

Ethics, Justice, Violation, and the Biology of Emotion (Part 2)

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Introduction

In “Human Values, the Biology of Emotion, and Spirituality,” (part one of this series), we explored a new picture of our humanity based upon the new science of emotion. We offered an evolutionary account of how our emotional experience came to be, from the early glimmers of pleasure and pain in the first living creatures to the common pallet of human feelings we know so well (joy, sadness, trust, fear, admiration, envy, love, hate, etc.) A key insight was that - like sounds or colors - feelings are actually informative *sensory signals*, part of an innate *evaluative guidance system* long overlooked by science. We discussed how emotions drive our thought and learning processes, how they integrate all aspects of our identity, and how our everyday feelings can now be mined for not one but three levels of guidance information. The exploration took us deeper still, to the physical substrates and the self-organizing dynamics undergirding the emotional sense, to how lawful forces, thermodynamically “favored” states, and dynamic “attractors” in fitness landscapes can give rise to hedonic feelings, even examining the open question about mind, will, and “self-actualizing” desire as part of the creative dynamics of the universe itself. In fact, human feelings are the biophysical mechanism that provides the vital functions – animation and guidance - once attributed to spirit or soul.

But whether preexisting or emergent, the pleasurable (feel good) and the painful (feel-bad) categories of feeling clearly work together both moving and informing living creatures in ways that support optimal physical health and mindful development as individuals and as co-evolving species. For they encode a deeply universal evaluative logic, a logic central to both our most fundamental evolution and our most complex spiritual impulses – an evaluative logic that we have historically ignored – and to our peril.

Indeed, we learned in part one that all our evaluative constructs must be re-evaluated within this biological context - and that good and evil is a false dichotomy. We complete that introductory journey here, noting that emotion is the sole source of any higher level cognitive or linguistic evaluation, that words such as good, bad, right and wrong must be grounded in its ancient logic. We will examine the implications for ethics, and what emotion – the wisdom of the heart - has to tell us about universally “right” (reactive and proactive) ways of being and becoming. We will then explore the myriad implications of this new paradigm for justice, the concept of violation, and the social systems that we continue to co-create. This will show that if we see ourselves as self-aware, sentient co-creators in a living universe, we move from a materialistic, reductionist world-view to an expanded spiritually alive existence. Drawing on the need for positive emotions to balance out negative emotions (also needed) in a significant ratio, it shows how violation, a source of destructive emotional behavior, needs systemic balancing. When it comes to formal justice systems, the retributive elements need to be relatively low in relation to the restorative justice elements. This offers the possibility of envisaging justice in terms of blessing, leading to enhanced well-being of victims of violence and the perpetrators of such violence.

THE NEW SCIENCE – THE NEW STORY

To quickly contextualize these insights, we draw upon polymath economist David Korten (2015). David suggests that changing the future of humanity for the better requires updating our *sacred story* - the *I AM* story that lies at the center of our human identity, as he put it, “the story in our hearts.” Our story embodies the powerful self-fulfilling beliefs that directly impact our thoughts, actions and our personal and sociocultural trajectories – beliefs that elicit the most powerful feelings.

David points out that “[w]e currently organize ourselves as if we are money-seeking robots inhabiting a dead Earth in a dead universe—a potentially fatal error that explains why we are in deep trouble” (2015a). His project has been “to frame a story that reflects the depth and breadth of human knowledge and points the way to an essential cultural and institutional transformation of our human relationships with one another and Earth” (ibid).

He offers:

“A simple self-evident truth with deep roots in traditional wisdom cultures: That we humans are living beings birthed and nurtured by a living Earth in a living universe. To survive and thrive, we must learn to live as responsible contributing members of the whole of Earth’s community of life. The wisdom of traditional peoples, the lessons of religious prophets, and current findings of science together confirm the true story that lives in each human heart and defines our authentic nature. To find our way to a vibrant future, we must acknowledge and share with one another that which we already know.”
(Korten, 2015a).

With this new story all humans can boldly claim: “*I am an intelligent, self-directing, participant in a conscious, interconnected, self-organizing cosmos, on a journey of self-discovery, toward ever greater complexity, beauty, awareness and possibility*” (Korten, 2015).

With elegant simplicity, Korten’s new story does indeed synthesize the best science and philosophy presently on offer, shifting our understanding of ourselves to honor our capacities as actively creative agents in a living universe. It emphasizes our accountability and responsibility, a shift away from the idea that we are deterministic machines devoid of legitimate free will, or that our free will defines us as helplessly fallen – “selfish” - children, devoid of any moral compass, and in need a distant supernatural creator to control or guide us.

Game changing additions to the story

But “Human Values, the Biology of Emotion, and Spirituality” (part one), elaborated upon my added caveat: As is true of our finest, most complete, big-picture understandings of the human condition, *the functional role of human emotion remains absent* (Peil 2012; Peil 2014; Kauffman, 2015). To complete this new story is to understand the biological function of emotion, and its relationship with free will, hardwired behavior, and biological values. Without these crucial yet missing pieces of the human puzzle, we cannot fully understand the nature of violation, of justice or moral value, or even human conscience. We must also insure that our new story is laundered of any outdated and inaccurate assumptions about what emotion is and what emotion does. For instance, in religions from both East and West, emotion is offered up as the ultimate source of all human suffering, of the “sin” or “evil” in

our nature—the powerful, irrational, hedonistic forces of craving and aversion that drive selfish, antisocial and violent behavior.

This stands in stark contrast with “that which we already know” of the truth and wisdom of the heart; the heart—our emotional system—as the organ of moral conscience, the symbolic center of compassionate care, nonviolence and cooperative grace, and the fount of spiritual revelation—the loving generous, caring, compassionate, and empathic heart that is evidence of moral virtue. Our new story must reconcile these dramatically opposing views of emotion and honor its vital offerings. For all feelings—especially the most complex pains and pleasures—are delivering biologically crucial, non-negotiable, information. So I offer these few minor additions to complete David’s new story:

*I am an intelligent, **emotionally sentient, self-regulating** participant in a conscious, interconnected, self-organizing cosmos, on a **self-actualizing** journey of **Self-discovery**, toward ever greater complexity, beauty, awareness, possibility and **joy**.*

These seemingly minor tweaks change the whole game. For they explicitly define the heart as our emotional system, and declare that where there is life, there is *emotional sentience*. As the first “proto” sense to have emerged (well before other sense organs and even brains), emotion serves the primal function of *self-regulation* – an ancient biological blending of sensorimotor control and adaptive immunity, a self-regulatory sense still evident in the chemical circuitry of the simple bacterium. Emotional perceptions (also known as “affective computations” (LeDoux, 1989) are different from regular thoughts (cognitive computations) in two ways: They are elicited by stimulus that is “self-relevant” (ibid.) – meaningful to the self, body, mind, even spirit or soul - and they move us to take corrective actions that rebalance us within our “not-self” environment. In terms of the motor components, good and bad feelings trigger approach or avoid behaviors (respectively), yielding “hedonic” behavior (toward that which is beneficial and away from that which is harmful) – a pattern observable all the way up the evolutionary ladder. The ingenious *self-regulatory logic* encoded within rudimentary pain and pleasure integrates and unites several biological yin/yang complementarities. These include the foundational evolutionary imperatives of *self-preservation of body* (mediated largely by pain and avoidant behavior) and *self-development* of “mind” (mediated largely by pleasure and approach behavior). These are dual evolutionary *purposes*, if you will, those that offer a subjective reflection of the criteria for natural selection: survival (bodily self-preservation) and “adaptation” (mindful self-development, rather than random mutations), a logic that affords the organism direct participation in the evolutionary process. In sum, the phase “self-regulation” packs a meaningful wallop, and once we begin to unpack its logic, we can see how our old, limited –often mistaken -- stories have helped perpetuate plenty of self-destructive human folly.

These additions to the story also suggest that the biophysically meaningful self-regulatory information delivered by our emotional sense may emerge from a deep *self-actualizing* impulse within living systems. When we consistently invoke the right responses suggested by our feelings, over time our self-developmental trajectory extends to the self-actualization of all our innate genetic (if not quantum) potentials, what Abraham Maslow (1954) noted as one of the highest, most meaningful, of human needs – emotion being how all living systems feel their needs (as Lamarck once suggested). Indeed, self-actualization seems to be a third self-regulatory imperative, beyond the psychosocial and moral development of mind, extending to a spiritual developmental path – meaning on the most broad and sweeping scales of time. Indeed, while we remain largely unaware of it, the emotional system provides an ongoing stream of evaluative sensory information—three levels of explicit guidance -

encoded in such complex feeling perceptions as trust, mistrust, courage, worry, gratitude, contempt, admiration, envy, compassion, resentment, love, and hate. Although our outdated stories render us relatively tone-deaf to this divine biological gift, the ever-available flow of emotional messages is actually informing us when, where and how we can—and that we must—use our creative gifts optimally and wisely. To the degree that our habitual beliefs and sociocultural strategies disengage our emotional awareness, we lose the instinctive endowments of our organism; and to the degree that they *violate* the primary non-negotiable bio-values encoded in hedonic pleasure and pain, we are unwittingly (but actively) self-destructive in the most literal sense.

Yet note also the added capitalization of Self in the “journey of Self-discovery” phrase in our new story. In terms of our complex emotional experience, the self is a many splendored thing. This capitalization emphasizes the multi-dimensional and relational aspects of self when mind-as-consciousness is factored in—the entangled, unified, holographic, or fractal collectives or gestalts of consciousness, and ultimately to any Totality of Being—the ultimate Self. This category of “Self” would enfold any notion of “higher self,” inner psyche, spirit, or soul, collective soul, and anything like the Jungian collective unconscious, as well as any identity construct through which human beings (or other life forms) maintain an immanent connection to a transcendent creator, God, or All That Is. This expanded notion of Self seems to provide a “not-yet-self” dimensional comparison to the ongoing stream of emotional perception, connoting some deeper perhaps unbounded pool of potentials yet to unfold. So the self-regulatory logic may ultimately include a foundational complementary relationship between self and Self, wherein the self is at once both an unfolding part and an enfolded whole – a dynamically balanced interaction that may be part of the self-organizing physics themselves.

The Dual Self-Identity

But even without any of this deeper metaphysical portent, this is another highly relevant, potentially related, and readily observable complementarity that is mediated by binary pleasure and pain, that of a *dual mindful self-identity* – in all living systems. Indeed, first-person emotional feelings are integrating and balancing an autonomous individual agent (a “me” identity) and a social entity (a “we” identity) – one very much like and with the same logic as a self/Self binary. This is the facet of emotional sentience that gives rise to group selection, expanding the approach and avoid behavioral regimes to include social cooperation and competition. This is the aspect of our emotional self-regulatory logic that our old stories have confounded with the moral notion that “selfishness” is bad and martyred “selflessness” is good – when both are biologically unbalanced – wrong – self-states.

We see evidence of this dual self-identity and its self-regulatory logic in the sensorimotor chemistry, emotion processing neural structures, and overt behaviors of animals all the way up the evolutionary ladder: From quorum sensing in bacteria, to the dual identity of the slime mold; to the hive mentality of insects (where brains enter the picture), to the territorial and hierarchical behavior of reptiles with “me” taking top priority until the “we” is cooperatively accommodated in the social structure. Indeed, the reptilian brain is associated with the limbic system and the emergence of the basic emotions. Four out of five of which are painful, the distress signals of sadness, fear, disgust, and anger. For nature offers us four times as much information about external environmental conditions that we *must reduce* in order to preserve the body proper – represented within the “selfish” me identity. The avoidant behaviors show up in territoriality, and competitive fight or flight emotional responses, until a long-term cooperative social structure emerges: the dominance hierarchy. With

optimal social structures in place, those four basic distress signals will be elicited to further refine them, always reducing the conditions that elicit them. In short, the me-self must come first and remain protected within the social structure, for the individual agent always remains the unit of evolution, and emotional information is always relevant to the individual that has “the feeling of what is happening” (Damasio, 1999) - they are messages to the self, from the self and about the Self. Nonetheless, with optimal self-regulation the basic pains will be experienced less and less, serving only as corrective signals when universal biologically non-negotiable needs remain unmet. The upside is that the creature’s behavior is then oriented toward more pleasurable pursuits such as feeding, mating, and niche building.

Indeed, perhaps the most important addition to the new story is the final word: *joy*. Joy is the one positive basic emotion – and the grandmother of all complex positive human feelings. For the evaluative logic in pleasure and pain has an evolutionary end game of ongoing adaptive self-development that is both inspired and rewarded by joy and its complex relatives. Joy is its own intrinsic reward for adaptive learning, ongoing mindful development, and optimal self-regulatory responses. While the basic pains shout “no!”, joy sings “yes!”. Joy calls our attention to new benefits, affordances, resources, ideas, and social others, and it rewardingly reinforces the best ways to think and act. Joy not only helps us create, protect and nurture our bodies, it broadens and builds (Fredrickson, 1998), “inspires and rewires” (Haidt, 2003) our individual and social minds – moving us to “mend, tend and befriend” (Taylor et al, 2000).

Joy and the evolutionary end goal of self-development

In terms of evolution, joy and her complex relatives are our rewards for healthy development of the mindful we-self, increasing biological fitness via a broadening empathic expansion to include social others, a trajectory that naturally enlarges the boundaries of one’s adaptive ecological niche. It yields cooperation, communication, creative social synergy, and ongoing personal growth—the naturally divine True North goal states of self-regulating life forms within a vitally self-organizing universe. Accordingly, with the emergence of mammals we can readily observe much more joy in animal behavior and even nonverbal expressions of some of the complex positive emotions. Indeed neuroscientist Jaak Panksepp (2005) has mapped the complex and bi-directional emotion processing circuitry of the triune brain, rooting complex emotions much deeper in our evolutionary history than our more anthropocentric old stories suggest. We see playful bonding, loving parental care, empathy, morality (fair play is required or social punishment ensues), and altruism (from food sharing to self-sacrificing alarm calls). We also see evidence of an optimal neural and psychosocial developmental trajectory tied to physical health, an epigenetic developmental trajectory influenced physiologically by the care and parental nurturance provided within the foster environment (Jašarević, Rogers & Bale, 2015; Weaver, et al; 2004). In primates the complex bi-directional emotional neural circuitry extends in the prefrontal cortex, the executive control center of the brain, where most complex human feelings are integrated. In monkeys and gorillas we see evermore complex morality, cooperative social structures, and empathic emotional expressions including grief. In humans, basic joy gives rise to the most desirable hallmarks of human experience: trust, curiosity, confidence, authentic pride, gratitude, admiration, hope, loyalty, wonder, compassion, delight, reverence, faith, authentic happiness, and agape love.

Note also that, like colors or sounds, all feelings bear a unique informational tone (known as the appraisal theme), one uniting the feel good/feel bad polar opposites into meaningful unit: Sadness

partners with joy to inform us of losses and gains, asking us to reduce the former and increase the latter whenever possible. Fear partners with courage educating us about danger, threat, challenge and opportunity, moving us to consciously—mindfully—take note of our immediate circumstances and respond accordingly. Anger partners with gratitude, moving us to mediate obstacles and honor resources (“affordances”), social or otherwise, in our environment. Envy partners with admiration to inform us of our level of self-esteem, personal development, and how we think we stack up against others in the social order; mistrust with trust to keep track of how well we are treated and help decide whom with which to bond, cooperate, commune, and rely upon over the long term. With optimal self-regulation over time the flourishing human will experience about an 80 – 20 ratio of complex pleasures and mostly basic pains.

A NATURALISTIC ETHICAL APPROACH

Emotional sentience and ethics

This new story puts *human health* and *optimal self-regulation* center stage in our understanding “right” or “wrong” behavior. But our new story also weaves religious, moral, ethical, political, and legal notions of human rights and wrongs into the singular context of our common emotional biology. It harkens back to ancient theories of natural law (See *Delicata*, Volume 1), to Plato’s unchanging ethical order, to Aristotelian virtue ethics, to the Epicurean pleasure garden, and the Stoic calm – attaining intellectual perfection by transcending false judgement and emotional volatility. transcending false judgment and emotional volatility. It echoes and enhances the “moral sentiments” ethical position advocated by the great Scottish enlightenment philosophers— David Hume, Frances Hutcheson, Adam Smith (Tronto, 1993); uniting also the rationalist, rule and reason-driven, approaches of the Kantian tradition (i.e. the Lockean, justice-as-liberty; and the Rawlsian justice-as-fairness approaches; (Rawls, 1958) and even the feminist “ethics of care” (Gilligan, 1982). As mentioned, the bidirectional emotional processing paths in the brain (as set forth in “dual-process” models of moral cognition (Cannon, Schnall, & White 2011; Greene, 2007) suggest that the utilitarian approach (the weighing of specific costs and benefits (Berns et al 2012) is mediated by the top down pathway and complex emotions, while the deontological (global rights and wrongs), serves from the (global rights and wrongs), serves from the bottom-up—via raw pleasure and pain and basic emotion. All of this rich ethical history reflects the many facets of our common emotional biology, “that which we already know” (Korten, 2005) through the experience and wisdom of the heart.

Our universal rights and responsibilities as human beings are central to this innate spiritual wisdom, with the ultimate foundational human right being the True-North pursuit of happiness. As John Locke (1690) originally put it: “The necessity of pursuing happiness is the foundation of liberty”... “the unalterable pursuit of happiness, which is our greatest good, and which, as such, our desire also follows.” Likewise, the ultimate foundational human responsibility is offered in a singular moral commandment worthy of the Kantian categorical imperative: “*Hurt not others with that which pains thyself*” - the negative version of the familiar Golden Rule. This fundamental biophysical directive honors the non-negotiable primacy and universality of pain as compared to the more personally relative, flexible, and developmentally determined nature of the complex pleasures. It avoids the error of assuming or legislating “the good” for others with different sociocultural values, or at different points on the self-developmental spectrum, while also holding up compassion and forgiveness - the common

moral strand across every great religion (Armstrong, 2004, 2009). Yet this single moral commandment is also implicit within the Western Abrahamic traditions of Judaism, Christianity and Islam, and explicitly stated in Eastern Hinduism, Buddhism, Jainism, and Confucianism (Rune 1972).

A new evaluative lexicon

But this new science also allows us to go back, revisit and update our previous assumptions, fill in historical gaps and correct any inconsistencies. So let's pause here for a moment, and step back to the bigger picture of *values in nature*. The discovery of the emotional sensory function has indeed been a game changer, offering the first historical justification for science to even address the concept of values. As mentioned, science has consciously avoided saying anything about values, with all such questions relegated to the "nonoverlapping magisteria" of religion (Gould 1997). Indeed, committing the "naturalistic fallacy" (Moore, 1903)—deriving an ought from an is (Hume, 1975)—has been as methodologically forbidden as violating Occam's Razor. So it should be no surprise that we need to follow the evaluative strand through our old stories, to examine and rethink our traditional assumptions in light of this new science. As we do so, religion can be laundered of limited and unsupportable judgments about human nature, and science can be enlightened and enhanced by the common wisdom offered by religion—the universal wisdom of the heart.

Our first task is to examine all *evaluative* terms in our lexicon, common words like *good*, *bad*, *right*, and *wrong*, to ensure they are genuinely rooted in our shared biology. All of these words can be clarified by the first—and most important—level of information contained in emotional sensory messages, the values encoded in simple pleasure and pain. Indeed, without our emotional sensory tether to the body's core physical values (the lawfully "favored" chemical and physical states that undergird our biological processes), the intellect—the rational, linguistic, mind of the prefrontal cortex—*has no capacity for evaluation whatsoever* (Peil, 2012). Hence, many of our old stories may well contain empty (and relative) social constructions at best, and destructive (and absolutist) misassumptions at worst.

Foundational to our new paradigm then, is that the most biologically legitimate usage of the words "good" and "bad" honors pleasure and pain as meaningful *feedback signals* indicating that something is "good for me" or "bad for me." Good and bad are *relative* terms born of the immediate circumstances of the external environment and the adaptive flexibility of the experiencing, subjective self. Pleasure and pain are wholly *self-relevant*—meaningful only to the person experiencing them and relating directly to the specific context in which they are experienced. Hence, sweeping generalized third party judgments of good or bad circumstances, actions, behaviors or people, are neither meaningful (nor advisable). This has been the lesson of limited economic approaches that attempt to define "the good" via the rational choice model, to combine a diversity of external values into single scale of "utility," in denial of the emotional complexity of human motivation and personal identity. Indeed, offering unsolicited advice of what is "good for you"—as well as mandating or legislating morality that frustrates or usurps our self-regulatory biology—is bound to create conflict and ultimately fail.

On the other hand, the terms "right" and "wrong" can be grounded more generally and more objectively, and in the realm of *public health*. This is the conceptual tether to the post-modern reinvigoration of natural law (See Delicata, Volume 1). Indeed, the evaluative logic of the emotional sense defines certain ideologies, actions, behaviors, and environmental conditions as objectively "right" to the degree that they are *biophysically life-giving*—that they are *healthy*. While there will be other

layers of ethical “righteousness” to discuss, to offer *life itself* as a foundational natural value offers the broadest context in which to frame the inevitable conflicts within and between living systems, as well as to fully embrace the information offered by our emotional sensory signals. Secondly, specific actions are “right” to the degree that they accountably, consistently, and effectively *correctively respond* to emotional signals. (Recall that the prime self-regulatory directive—for all living systems—is to take actions that *reduce the conditions that elicit basic pain* and *increase those that elicit the most complex forms of pleasure*.) Thirdly, over time, these “right responses” forge *optimal developmental trajectories*, a general “right track” of being and becoming (Peil, 2012, 2014)—the natural rewards of a well self-regulated life. To ignore corrective signals, or fail to optimally self-regulate is “wrong” in that it is life-draining, it invites developmental insult, long-term suffering, and is ultimately self-destructive.

Indeed, as mentioned in part one of this series, the “good and evil” dichotomy is a false – humanly constructed – moral dimension, with “evil” in our new story connoting nothing more than the personal suffering born of long-term, self-destructive (“wrong”) behavior. It is a misuse of our emotional biology to align the concept of evil with inflammatory religious dogma such as “original sin”, or to declare it as a dehumanizing quality of “the other” in any way.

Right responses: Learning and creation as alternatives to “fight and flight”

With this linguistic grounding, I now clarify the *right responses* (RRs) suggested by our universal emotional dynamics. By definition, right responses are conscious, intentional behavioral choices— soft-wired deliberate, mindfully directed actions— that should resolve most emotional dissonance without invoking our hardwired fight and flight responses. Relatively new tools in the human self-regulatory tool-kit, they are associated with the complex *positive emotions*, and they create corrective change while staying in *approach mode* (Peil, 2012) and they contribute to ongoing, optimal, self-development. Nonetheless, they also define the context and circumstances for optimal application fight and flight avoidance. In short, we now have a choice between, *right, fight, and flight* responses to any emotion-invoking situation.

If one aspires to optimal behavioral virtue, these right responses are the first-choice self-corrections for every sort of feeling (pleasurable or painful), and they should resolve the lion’s share of any form of emotional dissonance. They include: *learning* (righting oneself – like a captain would right his sailboat to changing winds), *communication* (righting the social situation by sharing facts, generating resonance, coherence and social synergy) and *creativity* (righting the environment by working - adding and replenishing need-meeting resources, commodities, and opportunities). For optimal self-regulation, think 80% right responses, 20% fight and flight – advisable only when all previous right responses have been exhausted. There is also an *optimal order* of their application that begins with two types of right responses, those that will effectively restore self-balance by altering either the *internal or external environment*.

Righting the Mindscape: To Learn

The first right response is to *learn, to right the internal mindscape*. The general idea is that any emotional event offers a *learning experience*, whether it be a challenge or opportunity (Mendez, Blascovich, Major, & Seery 2001), and to honorably answer one’s corrective signals is to first and foremost “right oneself,” as a captain would right his sailboat in response to winds of change. The RR1 is

to deliberately *learn*, to consciously assess the specific information contained in the feeling, and accommodate it into the mindscape—to “broaden and build” cognitive resources (Fredrickson 1998), to “inspire and rewire” (Haidt 2003) new habits and neural connections that enhance the self and expand one’s ecological niche. Most importantly, the RR1 accommodates the feedback information in a way that will elicit a positive *emotional response in the future*. The RR1 stands in contrast to the default fight or flight reactions to the *external* circumstances, or habitually maintaining the internal status quo. The RR1 is where human creativity and ingenuity play out, in the invention of new knowledge, cognitive frames, or ideological beliefs that can bring a personal rebalancing as well as a cultural innovation. A large percent of all human emotional signals can now be resolved by this internal learning response—righting the mindscape, and it should always be the first corrective choice. (Our parenting strategies, our educational institutions, and all agents of personal or spiritual growth all support the first priority of cumulative, life-long, learning—and our punitive regulatory authorities will hold us accountable for our ignorant, uninformed or mindless actions.)

Righting the Landscape: To Create

The second right response, the RR2, is to alter the *environment*—to *right one’s external landscape*; to *creatively express* in ways that export an innovative idea, an optimal cognitive frame, a solution to a commonly distressing problem, etc. or *produce* a need-meeting commodity—creative expressions of ideas and strategies born of RR#1. This creative external change also includes actions that *communicate and cooperate with our social others*, expressions that expand our empathic identity boundaries, and enhance our sociocultural environment—cooperative, approach mode, social behaviors that “mend, tend and befriend” (Taylor et al, 2000) and well as create and replenish scarce resources. “Work” is a common manifestation of this type of corrective change, and our economy is driven by exchanges of these optimal ideas, goods and services.

While learning and creating are hardly new, they are now the optimal first and second responses to all emotional signals in the modern human world. Nonetheless, fight and flight responses still have their place in our behavioral regime, for we all learn through trial and error and conflicts between individual selves in time and space are inevitable, both of which will continue to elicit basic distress until adequately resolved in both the mindscape and the sociocultural landscape. To fight optimally, however, need not involve force or fisticuffs. To fight is the passionate yet nonviolent effort to reduce the external circumstances that elicit the universal pains. So the optimal order of corrective responses is: 1) **to learn**, to *right oneself*, to *right the internal environment*; 2) **to create**, to *right the external environment*, to effect positive creative change to one’s physical and sociocultural world; then if emotional dissonance still continues, 3) to **fight** for beneficial external change for all; then if all else fails 4) **take flight** – move to more life-sustaining environments. In this context, avoidant defenses and autopilot fight and flight reactions are wrong unless the first two options have been exhausted. This order of behavioral responses is “right” in the moral sense given its universal biological underpinnings; because it embraces personal accountability for all feelings and behaviors; because it honors both aspects of self-identity and our common human needs; because it is cooperative in nature, and because it keeps us in approach mode and socially connected. Over time, it yields a “right track” trajectory of optimal human flourishing all of which means that natural righteousness is consonance with the suite of *complex positive emotions*.

Herein lies the *directionality*—the ultimate *value system*—inherent in nature and in the traditional wisdom of the heart. For *joy*—our most basic positive emotion—and a term loosely capturing

pleasurable experiences of attraction, positive resonance, peaceful balance, empathic and cooperative social connection, and long-term happiness, serves as the True North beacon of this directionality. Our emotional compass points to joy because our good feelings tell us how to move in the best directions, how to attain and stay upon the most healthy and fulfilling right track of life. The South Pole of Pain serves this same regulatory master, as it tells us when we have deviated from that optimal trajectory and exactly how to get back on.

Indeed, the carrot of pleasure and the stick of pain push and pull us all in specific directions for important reasons. In the context of Taoism, “the way” of the self-organizing universe, pleasure and pain inform us of the ongoing Yin/Yang dance between creation and destruction, likely driven by the polar dimensions of the fundamental fields and forces, the aforementioned stuff of regulatory biofields (Kafatos et al, 2015). In terms of complex adaptive systems, pleasure and pain are the subjective manifestations of the attractors and repellers on fitness landscapes, quite literally homeodynamic feedback signals; and our self-corrective responses to them altering the boundaries of our local biofield, keeping us poised creatively on the “edge-of-chaos” (Langton, 1990), between runaway chaotic change and overly rigid stability. When we listen to and respond correctively to both the lure of pleasure and sting of pain, living systems are adding an adaptive dimension to an otherwise blind and random walk—tipping our long-term trajectory away from entropic destruction and toward creative complexity.

Stage Models: Right Tracks of Being and Becoming

Once we understand the biological imperatives encoded in the basement level pleasure and pain, the new science of emotion can inform the social sciences, uniting needs theory, motivational theory, the various stage theories, and biological self-regulation (including epigenetic regulation) within the developmental context. This new integration can help us examine the specifics of the right and wrong tracks of being and becoming. Indeed, these evolutionary imperatives and emotional dynamics are loosely reflected in the emotional milestones of Erickson’s (1968) stage model of psychosocial development, within Kohlberg’s (1967) stages of moral reasoning (Maclean, Walker, & Matsuba, 2004), and within the development of humanitarian empathy and “emotional intelligence” (Salovey & Mayer, 1990; Goleman 1995). In fact, the evolutionary complexification of emotional sensory perceptions is echoed in their pattern of developmental emergence in human infants; with primal distress and eustress deeply hardwired, and the basic emotions unfolding in the first six months of life (Izard, 1971). Then, context and experience dependent (Greenough, 1986), entangled with semantic associations (Bower, 1981), assisted by the “deliberate persuasion” of others (Bloom, 2010), these primary emotions take on personally tailored blends and shades forging and honing the complex emotions over the first decade of life (Campos & Campos, & Barrett, 1989). This pattern reflects the original developmental structuring and pruning of the neural circuitry, the emergence of primary self-regulatory agency, as well as the formation of fundamental complex human capabilities (Heckman, 2007) and personalized psychological capacities. Furthermore, with the revelations about epigenetic regulatory processes, there may also be critical opportunistic windows in the process, which, if stymied, can yield compromised or detrimental developmental outcomes (Nelson, Furtado, Fox, & Zeanah, 2009).

Through this lens, the right track will be reflected in the early engagement of emotional sensory self-regulation, as well as the expedient emergence of the suite of *complex positive emotions* and the optimal adaptive learning, creative actions, and cooperative social interactions (right responses) they engender. Indeed, although bad may be stronger in terms of sensory urgency, *good is stronger in terms*

of behavior (Batson et al, 1991; Pizzaro, Uhlmann, & Salovey, 2003; Wang, Galinsky, & Murnighan, 2009), including even good intentions (Gray, 2012).

For example, in Erickson's stage model, the first stage is marked by either *trust* versus *mistrust* in the first year of life; the second by "autonomy" (to which I add: *confidence* in one's self-regulatory agency, *curiosity*, *delight*, *zeal*, and *hope* for life) versus *shame* (self-doubt, *anxiety*, *worry*); and the third stage by "initiative" (*courage* to tackle challenges, *faith* in oneself, *mirth*, *affection* for peers, and *admiration* of inspiring others, *gratitude* for caring support and mentorship, and *compassion* for suffering) versus *guilt* (to which I add *boredom*, *envy*, *greed*, *contempt* and *rage*). Successful development of the right-track positive emotions all contribute to an integrated and meaningful sense of identity and a passionate humanitarian conscience by adolescence, as well as loving intimacy, generosity, and compassion in adulthood (Leary, Tate, Adams, Allen, & Hancock, 2007).

In sum, the universal right track of human development delivers an optimal suite of complex emotional perceptions and a fully functional emotional compass, perhaps even at surprisingly young ages. With this optimal right-track neural and psychosocial development, the average daily human emotional experience hovers around an 8/1 ratio of good to bad feelings, largely driven by the complex positive emotions, and punctuated by the inevitable basic growing pains (Peil, 2012)—yet with very little ongoing suffering. For the complex negative emotional signals have been minimized by the development of optimal cognitive frames, flexible ideologies, and broadened identity boundaries. In short, life feels far better, much more engaging, meaningful and rewarding when we are aligned with our innate biological value system. Furthermore, the moral wisdom delivered by this optimal trajectory is also echoed in common religious mores, the virtues and values identified by the Institute of Global Ethics (Loges & Kidder 1996), the positive psychology Values-in-Action taxonomy of human strengths (Peterson & Seligman 2004), and it resonates from within well-being advice across the mental and physical health sciences.

Indeed, with optimal human development not only are the me-self and the we-self integrated and balanced, but as Peter Singer suggests, the we-self expands empathically in an ever-wider circle, ultimately to include all members of the human family - even extending to all living systems. This optimal empathic expansion is a meaningfully pragmatic, developmental, unfolding of "self-actualization" and "Self-discovery" in our new story, regardless of any deeper metaphysical implications. Unfortunately, humans have largely missed the boat on our emotional sentience and the many levels of evolutionary logic encoded in pleasure and pain, most particularly on how emotion mediates our dual identity structures. We view the self through an outdated Cartesian lens, trying to eclipse emotion with "reason", and fail to see the we/me I/Thou (Buber, 1970) within ourselves, we have gone to town carving up the human family into encampments rigid dominance castes, and allow our fight and flight responses to run the show.

For example, witness the US political arena, and the ongoing entrenched conflict between "left wing liberals" and "right wing conservatives." While limited and self-defeating to the degree that they oppose one another, they are both half right. For when stripped to the biological bones, at their best the so-called conservatives are upholding and prioritizing the *body* and the *autonomous* aspects of the self-identity, the individual agency that is biologically required for optimal self-regulation. They are *prioritizing the messages of pain*, honoring the *me-self*, and the self-regulatory imperative of *self-preservation*. They advocate independence, freedom, liberty, spiritual virtue, and personal responsibility for one's actions, as well as conservative use of scarce resources. They emphasize the

safety, security, and protection of the individual and the family unit, and demand freedom from excessive or undue regulatory invention.

On the other hand, the so-called liberals uphold the *relational/social* aspects of the human identity, honoring our interdependent nature as well as the collective social mind. Their top-priority is the long-term well-being of the group, whether it be a community, a nation, or the entire planet—extending beyond kin to kith. They value cultural diversity, equitable opportunities for growth, optimal health and development, and social justice for all. *They are prioritizing the messages of positive emotion, the we-self, and the self-regulatory imperative of self-development.*

In a general sense, the Western versus Eastern leadership approaches also prioritize either our *autonomous* or *collectivist* identity constructs, respectively (Markus & Kitayama, 1991), while our biology and our now global village demand a balance of both.

Implications for Justice and Violation

Herein lies the conceptual foundation for justice and violation – both of which concern the emotional dynamics as they play out at interpersonal and group levels of self-regulation. Ultimately, violations are bi-directional breaches of the *social contract* (Hobbs, 1651) coming from either internal (breaches of human responsibility) or external sources (social, institutional, environmental breaches of human rights). Both types of violation are largely motivated (legitimized or justified) by the basic pains (predominantly anger) and the self-preservationary avoidant fight and flight responses to external environmental conditions. But they are also likely undergirded by misguided or limited assumptions, us/them ideologies, and rigid caste structures that also trigger the complex negative emotions (mistrust, shame, contempt, envy, hate, etc). An external violation is defined as any action (or institution) that unduly interferes with, usurps, or negates one’s rightful human dignity and self-regulatory agency. Likewise, it is an internal violation to deny one’s *rightful spiritual responsibility* to self-regulate as well as possible. Our optimal sociocultural regulatory strategies will be those that *enable* optimal self-regulation as well as *constrain* and discourage ignorance and irresponsibility—in a ratio of about 8/1 enablement over constraint, in alignment with the optimal ratio of positive/negative emotional experiences of a flourishing individual on the right track (Peil, 2012).

Two deeper psychological violations

While violence is often defined by extreme acts of physical harm, it actually begins with these two forms of *psychological violation*, as they violate the imperatives upheld by our emotional system and lead to the deficiencies of the *wrong-track*. This biological fact is not lost on the World Health Organization, who defines violence as: “The intentional use of physical force or power, threatened or actual, *against oneself*, another person, or against a group or community, that either results in, or has a high likelihood of resulting in, injury, death, *psychological harm, maldevelopment or deprivation.*” (Mercy et al.,2003; emphasis mine.) The phrase, force “against oneself” is most telling here, as every violation begins as a within-self conflict and its accompanying unanswered distress signals. In fact, this new science offers a clarifying distinction between the terms *power* and *force*, wherein genuine power concerns the optimal physical energy flow through a living system and its application toward healthy self-regulation, ongoing empathic self-development, and creative self-actualization. Genuine power is associated with cooperative coherence, egalitarian social structures, maximized personal liberty and

opportunity, and authentic happiness. Force, in contrast, is the competitive suppression, interruption or re-direction of the energetic flow to attain superior control. Force (whether it be an individual behavior, or an institutionalized social strategy), is largely driven by misunderstood distress, defensive behaviors and competitive conflict, arguably a vestige of primate dominance hierarchies.

But historically, top-down force has been our tactic of choice. For in lieu of using our emotional signals to regulate our own behavior, the ethical strategy of our old understandings has been to *suppressively regulate the behavior of one another* by deliberately inflicting emotional pain. For example, as moral psychologist Paul Rozin has noted, ethical codes are routinely enforced by third party expressions of the negative emotions (Rozin, Lowery, Imada, & Haidt 1999). Known as the CAD model, they noted how *contempt* enforces codes of *community* (local sociocultural mores); and how *anger* upholds codes of *autonomy* (equal justice, human rights, etc.); and how *disgust* mediates codes of *divinity* (religious mores). Our new story suggests, however, that these third party expressions likely operate by instilling *first person* emotions such as shame, embarrassment, guilt, sadness, or fear, and succeed only to the degree that they harness the “flight”, submissive, mode of hardwired emotional response (Tangney, Stuewig, & Mashek 2007). This strategy directly violating the prime directive of reducing the basic pains, constructing an entire sphere of man-made suffering that we believe to be normal.

Worse, this strategy can backfire. For it also predicts competitive conflicts between the various ethical codes should they prompt first person disgust or anger instead, and its naturally aggressive “fight” mode of self-preservationary avoidance (Mullen & Nadler, 2008) or elicit such hostile complex emotions as contempt, rage, or hate and “getting even” (the self-regulatory rebalancing) via revenge (DiGiuseppe & Froh 2002). In fact, punitive authoritarian parenting that relies upon shame and humiliation negates the self, invites anger, promotes rage (Scheff, Retzinger, & Suzanne, 1991) and self-destructive activity (Milligan & Andrews, 2005); and it can lead directly to violent criminal behavior (Athens, 1992; Gilligan, 1996). In short, while social feedback, punishment and reward have their time and place, the general social strategy of behavioral constraint upon one another through expressions of negative emotion is violent and biologically self-destructive. It is wrong in every conceivable way.

Implications for Social Systems

The new story metaphor of the Body Politic

For a more vivid illustration of this external, forceful, form of violation, a word on the logic of self-organizing structure of the evolved organism will be helpful here. The emotional information processing of the human organism consists of both top-down and bottom-up bi-directional informational flows. In terms of the functional structure of the vertebrates (reptiles, mammals, primates), the brain serves as the central, top-down, control center, serving the primary imperative of self-preservation, attaining global stability across the self-system (organ systems and cells), as well as maintaining regulatory balance with its outside world. At a deeper level the cell membranes (“branes”) serve this same control function, but in the context of the global whole are individually self-regulating from the bottom up. The brain’s task then is to *enable* optimal bottom up cellular activity and orchestrate cooperativity that serves the whole (via endocrine communication), as well as to and *constrain* any aberrant and chaotic or destructive activity (via immune activity). Dysregulation would

ensue if the brain were in *competitive or oppositional conflict* with the cells of the body, or out of balance with its external biosphere.

We have an analogous self-similar functional organization in terms of the *social body*, wherein our *governmental institutions* (executive, judicial, legislative) are to the *social brain*, as the *citizen* is to the *cell*, and as *biosphere* is to its outside world. Violation in this context concerns social dysregulation and competitive conflict between governmental leaders and its citizens – with violations coming from both top-down (external to internal) and bottom-up (internal to external) directions. While there have been many historical offerings that liken a society to the human body, factoring in our emotional self-regulatory function adds to the biological utility of the analogy. Indeed, at best such offerings were devoid of a common “sensorium” (Spencer 1895) and at worst were plagued by social Darwinism (Ibid).

To extend this metaphor, the body politic (executive and legislative government), functionally analogous to the *endocrine system*, tasked with providing the structural and organizational framework for optimal citizen cooperation. Likewise, the judicial and legal enforcement arm of the social body functions like the *immune function*, rooting out and correcting any “not-self” social activity. Top-down dysregulation between the social body and its citizens, can be likened to the overgrowth or undergrowth of cells that can lead to cancer or atrophy, both implying destruction of the body. In terms of atrophy of the individual, a lingering state of distress (Dickerson & Kemeny 2004), likely fear, sadness (and psychological flight responses), sets the epigenetic stage for compromised immune function, ill health, maladaptive development and psychiatric disorder (Meyer-Lindenberg & Tost 2012; Tsankova, Renthal, Kumar, & Nestler 2007). Indeed, through epigenetic pathways, stressful events become biologically embedded—they get “under the skin”—during developmental windows crucial to forging neural circuitry (Hertzman & Boyce 2010), and our stress hormones are implicated in the DNA damage that accelerates degenerative aging (Hara, et. al., 2011). In terms of cancerous overgrowth of dysregulated cells, the lingering distress (likely more adrenalin driven fight responses to anger and disgust – even the us/them identity zeal behind hate), creates organized – and metastasizing - factions of disenfranchised individuals (like free radicals) in radical competition with the healthy cells of collective – doing quite a bit of damage before either being eclipsed by successful immune regulation or death of the society that sustains them. Examples range from Mafiosos to religious radicals.

A word about economics is also important here, for a good deal of external violation comes in the form of economic injustice – the lack of equal opportunity to self-develop and self-regulate (freely engage in need-meeting behavior). We have experienced global crises to the degree that our economic strategies, regulatory controls, and value systems are neither aligned with the deeper emotional regulatory processes nor the functional logic of the evolved organism. But recent trends in economic theory are finding the utility of systems science, noting the nested “polycentric” systems, the virtues of trust and local cooperative (bottom-up) decision-making, and how citizens “vote with their feet,” moving away from overly constraining jurisdictions (Ostrom, 2009) as their biologically right responses dictate. Likewise, in our functional and structural analogy, as the brain is to our political institutions, *the circulatory system* is to our economic institutions (Merryman, 2014). Hence, our economic approaches should ensure that money, the placeholder of value, the life blood of the free-market economy, is constantly flowing and extending to even the tiniest capillaries throughout the social body, neither pooling nor clotting in any given area, lest some cells starve, organs falter, and the organism may eventually die. (The uncontrolled growth in wealth among the super-rich, for example, is analogous to cancer or aneurysm - growth with no limiting negative feedback loops to limit it).

Likewise, fiat currency will function optimally if it is aligned with “the invisible hand”, the *emotional capital* that actually runs the self-regulatory show. Finally, gross disparities in economic power are very real threats to civil liberty and predict myriad levels of additional emotional distress. Such discrimination functionally isolates certain populations (immunologically rejecting them as not-self), inviting fight and flight responses at every turn. Hence, efforts at *distributive* justice, should empathize the most fluid, free and far-reaching economic need-meeting arena, and the good of *equal opportunity, personal empowerment and accountable freedom* for all citizens to creatively engage within it.

Four Primary Mistakes in Old Story Criminal Justice

Presently, our systems of justice are riddled with assumptions and strategies based on our old stories, most of which are constraint oriented, with little emphasis enablement and genuine empowerment, many of which invite escalating exchanges of righteous anger, ongoing conflict, and reciprocal cycles of violation that are both personally and socially self-destructive. Four primary mistakes in old story criminal justice

Retributive justice

First, is the strategy of *retributive* justice, simple punishment (monetary fines, incarceration, etc.) for misbehavior, is socially violent and does not work. It simply adds an additional layer of distress to the emotional dissonance that already accompanies both types of violation. It is an ineffective social level self-preservationary response that further disempowers the already suffering and disenfranchised. Warehouse incarceration can breed subcultures wherein further criminal relationships and strategies can breed, further limiting one’s life to a self-destructive wrong track trajectory. Our biology suggests instead that strategies of *restorative* justice (education and rehabilitative and reconciliative approaches) align much better with the pursuit of happiness and the self-developmental imperative, enabling the cooperative impulses, and intrinsic motivations.

Public health confounded with criminal justice

Second, the confounding of criminal behavior with emotional and behavioral disorder allows issues of public health challenges to masquerade as criminal justice problems. This can lead to proposed solutions that are socially violent, in that they increase universal distress. For example, the high percentage incarcerated citizens who have been diagnosed with disorders of the DSM V, or children with uncontrollable emotional behavior, derailed from their educational path, often drugged with questionable psychiatric medicines (Whitaker, 2011), even held in solitary confinement, where they are further chemically and developmentally disordered and criminalized, a pattern known as the “school-to-prison pipeline” (Wald & Losen, 2003).

Legislating morality

Third, the practice of legislating morality in denial of free market supply and demand sets the stage for ongoing conflict, again in violation of the *prime biological directive*. When demand exists (for whatever reason), black markets will predictably emerge, oftentimes in impoverished (perhaps minority) communities lacking in more legitimate economic opportunities. Just as any organism will adaptively

exploit changes in its niche, as enforcement approaches evolve, so then do ever more ingenious criminal strategies, if not more desperate and dangerous ways to maintain economic operations. Financial penalties further disempower those already in financial distress, and to the degree that punitive fines become crucial income flows for the regulatory authorities, self-organizing dynamics will ensue with both self-preserving and self-developmental impulses that lead to increases in government intervention and spending. In a dynamics systems sense, this is a self-perpetuating positive feedback dynamic that escalates zero-sum competition and chaotic instability to socially destructive levels.

Use of force and deadly weapons

Fourth, the use of force and deadly weapons is symbolic of the actual *disempowerment* of both individual agency and social authority, the self-destructive gridlock that is the direct result of dysregulation at both individual and social levels of self-organization. Worse, children, adolescents and disturbed adults with little hope for a future of genuine flourishing have begun expressing their rage and depression in suicidal massacres, now horrifyingly commonplace occurrences in America – where firearms are supposed to protect our rights as individuals. Although understanding our primal self-regulatory nature offers a strategic way forward, the proliferation of ever-more technologically effective and readily available weapons is a symptom of rather profound deviance from our biological optimums – as is our short-term view towards the health of our interdependent biosphere.

Prohibition of drugs: An example

For a concrete illustration these myriad levels of interwoven violation, I now offer the longstanding situation between black youths and police officers, and the illegal drug trade in the U.S. While I am not advocating the unhealthy and dangerous use of chemicals in any arena, the ongoing demand for recreational drugs is undeniable. This demand might be due to the simple adult desire to unwind from a busy workweek, the rebellious explorations of youthful curiosity, or even the deeply spiritual investigations of the boundaries of human consciousness. More tellingly, this demand might relate directly to our misunderstood emotional biology. Not only to our misguided social structures, but also to increasing biophysical sensitivity to emotional stressors (how experiences of trauma, abuse, neglect, and even socioeconomic inequality gets “under the skin” (Hertzman & Boyce 2010). Indeed, we continue to evolve and excessive manmade distress stifles neural development and inviting immune disorder (Dickerson & Kemeny 2004; Meyer-Lindenberg & Tost 2012; Tsankova, Renthal, Kumar, & Nestler 2007) and epigenetic dysregulation (Mattik & Makunin 2010; Worthman 2009; Zhang & Meaney 2010). Together our increasing sensitivity and our ineffective but escalating regulatory constraints perpetuate ongoing suffering and long-term spiritual malaise. With all this suffering, indeed “epidemic levels of depression” (Seligman 1990), street drugs offer a cheap and easy way to self-medicate, to gain temporary pain relief or grasp a chemically induced moment of joy or ecstasy in an otherwise miserable, meaningless, and hopeless existence. Of course, this is the wrong way to answer emotional distress, but without genuine self-developmental options, it is predictable.

This problem also highlights the economic disparity between those who can afford prescription medicines for mood and pain (or who can import and consume designer drugs in relative privacy of suburban homes), and those who produce, sell or use bathtub methamphetamine or crack cocaine on the streets. The latter—largely impoverished minority communities - being easier targets for law enforcement, setting up institutionalized incentive structures and enforcement strategies with unforeseeable and unintended legal consequences that can further isolate the have-nots and appear

racist (Devins, Koppl, Kauffman & Felin 2015). Worse, the zero-sum competition between the drug dealers and the police, both of which arm themselves with deadly weapons to retain their personal power, creates very real danger and basic fear as well as anticipatory anxiety, worry, and even paranoia, rage and hate that is factored into perceptual lenses, strategies and actions on both sides. The headlines of ever-more common incidents of fear-driven police assaults against suspected black youths, and the ever-increasing outrage against it should they prove to be innocent—offer examples of the resulting social distress.

This problem of illegal drug markets demonstrates that we have yet to fully learn the lesson of the prohibition of alcohol—a spectacular failure for the same reasons. While drug use can surely be problematic, a good deal of it is essentially the free-market behavior of healthy suppliers and consumers, and (like prostitution, the world’s oldest profession), it is not going away anytime soon. To look instead upon the drug problem as a public health issue (as some enlightened governments do), and to provide the structural enablement of legal, equitable access to clean, relatively safe, competitively priced and taxable designer drugs, would reduce a good deal of the predictable conflict. Coupled with adequate education concerning the emotional system, emphasizing the universal physical manifestations as well as the spiritual portent of uncorrected emotional distress, there would be far less of the unhealthy, escapist, and addictive variety of demand we witness with illegal drug use. Furthermore, with adequate mobility, educational opportunities, apprenticing experiences, and job opportunities that help identity, develop and actualize individual potentials, the right-track pursuit of happiness can become the dominant motivation, further reducing any unhealthy demand and need for black market employment. Indeed, our common biology suggests that no one truly desires a life motivated predominantly by the simple reduction of pain.

An enlightened safety-first approach

But even with ongoing legal prohibition, such biologically based strategies would emphasize if not prioritize learning and communication—the first choice right responses – in regulatory approaches. They could openly acknowledge that black markets do provide economic opportunities and fulfill human desires; as well as honestly confront the fact that prohibitive laws predict zero-sum conflict between authorities and dealers, and drive escalating cycles of reciprocal fear and fight and flight reactions on both sides. They could, however, elevate the cooperative goal of *public safety* during the enforcement process above that of prohibition itself via community dialog. In community policing, for example, public educational forums held in “safe spaces” could invite open dialog between local black market agents and police, to forge cooperative agreement upon safety-first interactive strategies in exchange for misdemeanor or reduced charges (Kauffman 2015a). Specific safety-first identifying emblems, hand signals, or verbal exchanges during street encounters could validate such agreements, establishing the mutual community trust that can short-circuit the fear driven cycles of fight and flight defense that ignite us-versus-them violence.

Indeed, such structural enablement would be just the beginning of a social right-track path, where we can begin to harness and influence one another cooperatively and with the complex positive emotions. Moving beyond the negative CAD model of our past to something like *Compassion* for our common human challenges *Awe* for our co-creative gifts along with deep accountability for our autonomous creative agency, and *Devotion* to ourselves as a human family sharing one interdependent biosphere, without the us-versus-them identity boundaries and dominance hierarchies that perpetuate

long-term distress. This is the long-term dream, for deconstructing the myriad dysfunctional social structures from our old stories will take time.

CONCILIATION, RECONCILIATION AND THE JUSTICE AS BLESSING

With this new science can make great strides by honoring, reinforcing and elevating the aspects of our old story that are on the right track. Those that, as David Korten suggests, have been reflected in “that which we know” (Korten 2015a), the common wisdom of the heart. Indeed, these age old emotional dynamics have been captured across our philosophical and religious traditions, standing at the center of the most effective approaches to humanitarian justice and reconciliation.

Successful themes from old story traditions

One example is the practice of *teshuvah* of the Jewish tradition, a strategy of post-violation repentance, to make right a relationship that has gone off track. It works because it honors the trial and error nature of learning, draws upon both human accountability and compassion, it reflects a tacit understanding of the two types of violation, and invokes the appropriate right responses. It relies upon honesty, open communication, accountability, correction, and forgiveness. But its deeper success is because its three-step process is an interpersonal reflection of the first-person cycle of emotional self-correction: The victim of any given violation first approaches the perpetrator to point out the violation (communicating the pain to the other, just as the emotion communicates it to the self). The perpetrator (who is often unaware, unless having already experienced some degree of regret, guilt or shame), then accepts responsibility for the situation (internalizes the message of the pain, openly empathizing and learning rather than protectively denying or justifying the action at issue.) This is also where open communication of perceived violations due to limiting beliefs, attitudes, or ideologies can yield learning or cognitive reframing—optimal growth—on both parts (and roles of victim/perpetrator can reverse). The perpetrator then offers a genuine apology and asks the victim how to make it up to them, or to make them whole (just as the individual would rebalance the self-system with a right response). Then, the perpetrator carries out the agreed upon action, the victim offers genuine forgiveness, and the relationship between them is restored.

The more intrapersonal (first-person) restoration is captured by the Catholic tradition of confession: The perpetrator self-identifies a “sinful” violation through feelings of regret, guilt, or shame—the complex dissonance of a refined moral conscience (themselves the blends and shades of sadness, fear or self-directed anger or disgust). An honest, accountable acknowledgment of such a misstep to an appropriate religious authority, then invokes the forgiveness and grace of a just and faithful God. The authority then recommends some specific actions or declarations appropriate to the violation, and their heartfelt offering restores the inner spiritual connection between self and Self. Indeed, many criminal justice interventions are due to the lack of accountability implied in the personal confession. Hence, the rituals confessional atonement are a component of most religions, but in the cases of Buddhism or Islam the confessions require no authoritative intermediary, are kept complete and private, perhaps more more in keeping with the personal nature of emotional sensory guidance.

Together, the intra and interpersonal cycles of corrective self-regulation underlie the successful conciliation and reconciliation strategies following even the worst of human on human atrocity, most of

which rely on some acknowledgment of our common human bonds, if not our interdependence as living creatures sharing one biosphere. The concept of *Ahimsa*, for example, the strategy of non-violence toward all living things, central to the Hindu, Buddhist and Jain traditions. Or the African *Ubuntu*, tapping the innate human kindness born of our universal connective bond, following Apartheid or genocidal holocaust.

The Justice of Blessing model

Placing our traditional religious, social, and political practices in the context of the complexity sciences, offers still further evaluative and pragmatic utility. One example is the *justice as blessing* model (Redekop, 2002), which incorporates the concepts of emergent creativity, edge-of-chaos criticality, and the enduring motive power of positive emotion in an enlightened approach to post-violence reconciliation. The model captures the interpersonal, social level dynamics, as well as acknowledging many of the individual emotional drivers that perpetuate cycles of violent conflict. It notes the subconscious and low-level default aspects of emotional distress and self-preservationary behaviors, and even how violence-based reconciliation (Girard, 1987) can yield emergent self-developmental social unity. It captures how the right-track of individual development brings the tacit intuitive (bottom-up) wisdom offered by emotion into conscious awareness and delivers mindful focus and top-down control via the cultivation of the complex positive emotions. How establishing community dialog can begin to break down us/them identity barriers and build genuine public trust. How such feelings as compassion, acceptance and forgiveness can allow the letting go of entrenched hatred and resentment, can foster empathic unity and harness the learning and communitive responses to righteous anger – those that undergird successful truth and reconciliation efforts following sweeping historical atrocities (such as Apartheid, genocidal civil war, or even the Holocaust). It honors our innate emotional spirituality as well as borrowing from common religious themes from East and West, wherein a blessing based life is one of “social and personal justice and attention to right relationships” (Redekop, 2013).

It acknowledges that at various points in space and time - despite our best intentions and innate goodness - each of us is both victim and perpetrator of both types of psychological violence. That we are all in the same human boat, and the essence of compassion lies in that universal blanket of forgiveness that we desire for ourselves. It notes the error of “us versus them” thinking and how honoring our common human identity can begin building the mutual trust that feeds back to quiet habitual triggers of fear and anger, even replacing mindsets that breed resentment and revenge. It even implies how taking full accountability can ultimately deliver *gratitude* for the spiritual insights that follow courageous transcendence of our darkest challenges – that from all conflict comes emergent creativity and developmental opportunity should we proceed forward with confidence, courage, agape love and visionary hope.

CONCLUSION

At this hinge of history, we have collectively forged a broadened philosophical and empirical lens through which to envision and understand our humanity, a view that allows us to tell a newly enlightened story of human identity. We can now make a bold declaration that fully honors our innate capacities as human beings, and a declaration that—if truly embraced—can begin to shift many entrenched but dysfunctional ideas, attitudes and self-destructive habits:

“I am an intelligent, emotionally sentient, self-regulating participant in a conscious, interconnected, self-organizing cosmos, on a self-actualizing journey of Self-discovery, toward ever greater complexity, beauty, awareness, possibility and joy.” (Korten, 2015; Kauffman, 2016)

This new story fills a conspicuous void in our scientific self-understanding, fully embracing our ancient emotional self-regulatory sense, the first sense to have emerged, providing ongoing feeling experiences that integrate, stabilize, and balance us on an optimally “right” track of being and becoming. While this profound gift of nature has long remained hidden in the mists of our modern emotional complexity and myriad mistaken presumptions, it is there for the taking offering both universal and personally tailored guidance information, wisdom encoded within our deepest regulatory drives, needs and purposes, and on up to our most culturally flexible mores, choices, and preferences.

This new story honors the fact that values do exist in nature. As James Gibson (1979) put it: “Physics may be value-free, but ecology is not”. Our emotional feelings encode these innate evaluations, originally informing us of the good or bad ecological affordances of the environment – now both physical and sociocultural - such that we can reduce or increase them accordingly. Evaluative pleasure and pain are also known as distress and eustress signals in Hans Selye’s (1957) stress model, for good feelings are associated with strong physical immunity and flourishing health, while unanswered emotional distress will take a destructive physiological toll. Indeed, evaluative pleasure and pain along with their coupled approach and avoid behaviors, serve as the “unconditioned” stimulus-response pair within Pavlovian conditioning, providing the foundation for all higher learning. In short, to honor nature’s values is to actively, creatively, and optimally participate in our own evolution.

Indeed, this new story consciously omits any once-fashionable reliance upon supernatural controlling forces as well as the assumptions that—as law-driven physical machines—we have no legitimately interactive consciousness, purposeful agency, or genuine free will (nor culpability for our actions.) It harnesses the best offerings from objective science, while honoring the fundamental subjectivity that defines human experience, if not life itself. It melds Darwinian and Lamarckian versions of evolution, reframing the pejorative “selfish gene” scenario within the context of an epigenetically self-regulating genome, and replacing the mistaken view that nature is red in tooth and claw with the more apt “nature as green with grace and embrace” (Peil, 2012). At our deepest most functional core we find not good and evil, but two right and good – but potentially conflicting – evolutionary imperatives: self-preservation and self-development mediated by pain and pleasure respectively. Understanding the balancing of the myriad yin/yang complementaries within our self-regulatory logic allows us to see how the positive and negative emotions work together, further enabling us to redefine the concepts of violation and justice accordingly. For while social “harm” is certainly a key criteria of social wrong-doing, our biology suggests that *personal pain* is actually the ground zero for all higher forms of violence. That two, more subtle, but relatively common, *psychological violations* concerning our biologically non-negotiable individual agency trigger such distress – so that those violations can be corrected.

The first is the primary psychological violation of failure to act correctively upon one’s own emotional distress signals (reducing the circumstances that elicit them, first through the adaptive right responses of learning, then creative communication, then passionate nonviolent fighting, or finally taking flight). This is the type-1 “me” violation, neglecting the fundamental nonnegotiable *responsibility to self-regulate* as honorably and consistently as possible. This responsibility is non-negotiable, in that it

comes with its own biologically divine punishment: Confusion, needless suffering, and over time the ultimate breakdown of physical health. Once we gain emotional literacy and align with our emotional guidance (otherwise known as a healthy moral conscience), this violation can be dramatically reduced and we begin reaping the positive rewards of right-track living – confidence, better health, social coherence, creative synergy, serendipity, and meaningful happiness.

The second, type-2 violation concerns the equally non-negotiable *right to freely self-regulate*. Also biologically non-negotiable in that it predicts anger, conflict, disobedience, and revolt – the divine retribution for negating our self-regulatory nature. This is the “we” violation, evident in the forceful, overly constraining social tactics we have created historically, yet they predictably backfire due to our primary self-preservationary imperative. If our social approaches instead begin to educate and set the standards that enable emotional self-awareness and optimal self-regulatory dynamics, and establish minimally required constraints (those that allow individuals as much freedom as they can handle responsibly), we could dramatically reduce this type of violation and eliminate another man-made layer of social distress from the community environment.

Our new vision of humanity can also provide functional validation of the successful aspects of our spiritual political, social and economic approaches – to reinforce and expand upon what we are already doing right. Indeed, there is a deep strand of common collective folk wisdom gleaned from our diverse experiences embodied in many of our religious traditions, political approaches, and reconciliative efforts – the wisdom of the heart, the resonance with our innate spirituality. Personal rituals of contemplation, honest self-reflection, course correction toward spiritual growth, and imaginative creative visualization for actualization of potentials; Social rituals of public confession, corrective atonement, and reconciliative forgiveness; community dialog toward unity and spiritual enlightenment, projects enabling communal safety and a forging diversity of avenues for self-discovery and self-actualization; Governmental and economic approaches that actively honor both aspects of self-identity, that respect universal human dignity (of all races, faces, genders, and ages), that enable equitable opportunity and maximum self-regulatory agency and accountability, that foster local decision-making, just conflict mediation, and public trust; Global efforts that prioritize our common humanity, and honor our unity with other living systems as one biosphere; those that harness our positive motivations, empathic spiritual and cooperative impulses, and foster thoughtful, responsible, deliberate, passionate and compassionate co-creativity—all of which allow the optimal ratio of simple growing pains and complex pleasures to run the human show.

Add to this brave new vision any personal, social and global strategies that identify and root out the self-destructive ideologies, attitudes and habits that elicit the complex negative emotions, yet coming full circle to a healthy curiosity, respect and genuine gratitude for the information they contain. Never defending overly narrow ego-boundaries, blaming so-called “evil” others, or stuffing, denying, or defiling the feelings themselves. For as Pogo put it: “We have met the enemy and he is us” (Kelly, 1953), a revelation that must be met with spiritual fortitude and radical accountability rather than ongoing denial and scapegoating. For we have also met the creator, and it too is us.

References:

- Armstrong, C. 2004. *The Spiral Staircase: My climb out of darkness*. New York, NY: Anchor Books; Random House, Inc., 293-299.
- Armstrong, C. 2009. *A Case for God*. New York, NY: Alfred A Knopf
- Athens, L. 1992. *The Creation of Dangerous Violent Criminals*. Chicago, IL: University of Illinois Press.
- Berns, G. S., Bell, E., Capra, C. M., Prietula, M. J., Moore, S., Anderson, B., Ginges, J., & Atran, S. 2012. The price of your soul: Neural evidence for the non-utilitarian representation of sacred values. *Philosophical Transactions of the Royal Society B*, 367, 754- 762
- Cahill, T., 2010. *Mysteries of the Middle Ages: and the Beginning of the Modern World* (Vol. 5). Anchor.
- Cannon, P. R., Schnall, S., & White, M. 2012. Transgressions and expressions: Affective facial muscle activity predicts moral judgments. *Social Psychology and Personality Science*, 2(3), 325- 331.
- Damasio, A. 1999. *The Feeling of What is Happening*. Orlando, FL: Harcourt.
- Delicata, N. Volume 1
- Devins, C., Koppl, R., Kauffman, S., & Felin, T. 2015. Against design. *Arizona State Law Review*, Volume 47, Issue 3 (Fall, December 14). <http://arizonastatelawjournal.org/against-design/>.
- DiGiuseppe, R., & Froh, J. J. 2002. What cognitions predict state anger? *Journal of Rational-Emotive & Cognitive Behavioral Therapy*, 20 (2), 133-149.
- Dickerson, S. S., & Kemeny, M. E. 2004. Acute stressors and cortisol responses: A theoretical integration and synthesis of laboratory research. *Psychological Bulletin*, 130 (3), 355-
- Gilligan, C. 1982. *In a different voice*. Harvard University Press.
- Fredrickson, B. L. (1998). What good are positive emotions? *Review of general psychology*, 2 (3), 300-319.
- Gibson, J. J. 1979. *The ecological approach to visual perception*. Classis Edition. Psychology Press, 2014.
- Gilligan, J. 1996. *Violence: Our Deadly Epidemic and its Causes*. New York: Grosset/ Putnam. 10.
- Girard, R. 1987. *Things Hidden Since the Foundation of the World* (transl. by S. Bann). Stanford: Stanford University Press.
- Greene, J. D. 2007. The secret joke of Kant's soul. In W. Sinnott-Armstrong (Ed.), *Moral psychology, Vol. 3: The neuroscience of morality: Emotion, brain disorders, and development*. Cambridge, MA: MIT Press. 35–80.
- Greene, J. D., & Paxton, J. M. 2009. Patterns of neural activity associated with honest and dishonest moral decisions. *Proceedings of the National Academy of Sciences* 106, no. 30 (2009): 12506-12511. DOI: 10.1073/pnas.0900152106.
- Haidt, J. (2003). Elevation and the positive psychology of morality. In Keyes, Corey L. M. (Ed); Haidt, Jonathan (Ed), *Flourishing: Positive psychology and the life well-lived*. Washington, DC, US: American Psychological Association. 275-289.
- Hara, M. R., Kovacs, J. J., Whalen, E. J., Rajagopal, S., Strachan, R. T., Grant, W., Towers, A. J., Williams, B., Lam, C. M., Xiao, K., Shenoy, S. K., Gregory, S. G., Ahn, S., Duckett, D. R., & Lefkowitz, R. J. 2011. A stress response pathway regulates DNA damage through β 2-adrenoreceptors and β 1-arrestin-1. *Nature*, doi:10.1038/nature10368.
- Hertzman, C., & Boyce, T. 2010. How experience gets under the skin to create gradients in developmental health. *Annual Review of Public Health*, 31, 329-47.
- Hobbes, T. 1651. *Leviathan*. C.B Macpherson (Editor). London: Penguin Books (1985)
- Hume, D. (1975). *A Treatise of Human Nature*. London: Oxford University Press, (Selby-Bigge).
- James, W. *The varieties of religious experience*. Vol. 13. Harvard University Press, 1985.
- Jašarević, E., Rogers, A. B., & Bale, T. L. 2015. A novel role for maternal stress and microbial transmission in early life programming and neurodevelopment." *Neurobiology of stress* 1: 81-88.

- Kauffman, K. P. 2015. Emotional sentience and the nature of phenomenal experience . *Progress in biophysics and molecular biology* 119, no. 3: 545-562.
- Kauffman, S., 1996. *Origins of Order*. New York, NY: Oxford University Press.
- Kauffman, S., 2008. *Reinventing the Sacred*. New York, NY: Basic Books.
- Kauffman, S. 2015a. Personal communications concerning right response community policing interventions.
- Kauffman, S. 2016. *Humanity in a creative universe*. Oxford University Press.
- Korten, David C. *Change the Story, Change the Future: A Living Economy for a Living Earth*. Berrett-Koehler Publishers, 2015.
- Korten, D. 2015a. (<http://www.yesmagazine.org/happiness/a-new-story-for-a-new-economy>).
- Markus, H.R., & Kitayama, S. 1991. Culture and the self: Implications for cognition, emotion, and motivation. *Psychological review*, 98(2), p.224.
- Mattick, J. S., & Makunin, I. V., 2006. Non-coding RNA. *Human Molecular Genetics*. 15 (Review issue 1), R17-29.
- Maslow, A. 1954. *Motivation and personality*. New York, NY: Harper Row
- Mercy, J. A., Butchart, A., Dahlberg, L.L.; Zwi, A.B., & Krug, E.G. 2003. Violence and Mental Health: Perspectives from the World Health Organization's. *World Report on Violence and Health*." *International Journal of Mental Health*: 20-35.
- Merryman, J. How to hack human history. 2014. <http://fqxi.org/community/forum/topic/1981>
- Meyer-Lindenberg, A., & Tost, H., 2012. Neural mechanisms of social risk for psychiatric disorders. *Nature Neuroscience*. 15, 5 (May), 663-668.
- Milligan, R-J., & Andrews, B. 2005. Suicidal and Other Self- Harming Behaviour in Offender Women: The Role of Shame, Anger and Childhood Abuse. *Legal and Criminological Psychology* 10 (1), 13-25.
- Mullen, E., & Nadler, J. 2008. Moral spillovers: The effect of moral violations on deviant behavior. *Journal of Experimental Social Psychology*, 44, 1239-1245.
- Myss, C. M. 2003. *Sacred contracts: Awakening your divine potential*. Harmony Books.
- Ostrom, Elinor. "Nobel Prize lecture." (2009).
- Peil, K. T. 2014. The self-regulatory sense. *Glob Adv Health Med*. 3(2)80-108. Or PubMed: <http://www.ncbi.nlm.nih.gov/pmc/articles/PMC4010957/>
- Peil, K. T, 2012. Emotion: A Self-regulatory sense? EFS International, downloadable from: http://www.academia.edu/7208004/Emotion_The_Self-regulatory_Sense_For_the_Psych_community_2012
- Rawls, J. 1958. Justice as fairness." *The philosophical review*: 164-194.
- Redekop, V. 2002. *From Violence to Blessing: How an Understanding of Deep-Rooted Conflict Opens Paths to Reconciliation*. Ottawa: Novalis
- Redekop, V. 2013. Reconciliation as emergent creativity. Pub?
- Rozin, P., Lowery, L., Imada, S., & Haidt, J. (1999). The CAD triad hypothesis; A mapping between three moral emotions (contempt, anger, disgust) and three moral codes (community, autonomy divinity). *Journal of personality and social psychology*, 76, 574-586
- Rune, D. D. (1972). *The pictorial history of philosophy*. New York, NY: Bramhill House.
- Scheff, T. J., & Retzinger, S. M. (1991). *Emotions and violence: Shame and rage in destructive conflicts*. Lexington, MA, USA: Lexington Books/D. C. Heath and Company.
- Seligman, Martin EP. "Why is there so much depression today? The waxing of the individual and the waning of the commons." In *Contemporary psychological approaches to depression*, pp. 1-9. Springer US, 1990.
- Selye, H. 1957. *The stress of life*. New York, NY: McGraw Hill. (Rev. 1978).

- Singer, P. 1981. *The expanding circle*. Oxford: Clarendon Press.
- Spencer, H. 1895. *The principles of sociology*. Vol. 6. Appleton. P 449
- Tangney, J. P., Wagner, P. E., Hill-Barlow, D., Marschall, D. E., & Gramzow, R. (1996). Relation of shame and guilt to constructive and destructive responses to anger across the lifespan. *Journal of Personality and Social Psychology*, 70 (4), 797-809.
- Taylor, S. E., Klein, L.C., Lewis, B.P., Gruenewald, T.L., Gurung, R.A., & Updegraff, J.A. 2000. Biobehavioral responses to stress in females: Tend-and-befriend, not fight-or-flight. *Psychological Review*, 107, 441-20.
- Tsankova, N., Renthal, W., Kumar, A., & Nestler, E. J. 2007. Epigenetic regulation in psychiatric disorders. *Nature Reviews, Neuroscience*, 8 (May), 355-367.
- Tronto, J. 1993. *Moral Boundaries*. New York, NY: Routledge, Chapman & Hall. 36-50.
- Von Bertalanffy, L., 1972. The history and status of general systems theory. *Academy of Management Journal*, 15(4), pp.407-426.
- Wald, J., & Losen, D. J. 2003. Defining and redirecting a school-to-prison pipeline." *New directions for youth development* 2003, no. 99: 9-15.
- Weaver, I.C., Cervoni, N., Champagne, F.A., D'Alessio, A.C., Sharma, S., Seckl, J.R., Dymov, S., Szyf, M. and Meaney, M.J., 2004. Epigenetic programming by maternal behavior. *Nature neuroscience*, 7(8), pp.847-854.
- Whitaker, Robert. *Anatomy of an epidemic: Magic bullets, psychiatric drugs, and the astonishing rise of mental illness in America*. Broadway, 2011.
- Worthman, C. M., 2009. Habits of the heart: Life history and the developmental neuroendocrinology of emotion. *American Journal of Human Biology*. 21,772-781.
- Zhang, T-H., & Meaney, M. J., 2010. Epigenetics and the environmental regulation of the genome and its function. *Annual Review Psychology*. 61, 439-66.