INTRODUCTION

Beginnings

It was a simple question: Could she explain what she had written in her paper? The professor was complimenting her on an insightful reflection paper on the assigned readings. But, as if struck by lightning, her brain was paralyzed with a burning electroshock. Encased in uncontrolled panic, she was struck dumb. As she mutely turned several colors, unable to think or move, the professor waited patiently but then finally spoke for her. She left the classroom in shame, a feeling that had become all too familiar over her many years in many classrooms. She was nearly 30 years old.

Since late childhood, she had been haunted by her “frozen brain,” her incapacity to speak without a script. Nevertheless, as she moved through encounters, she measured herself in terms of smartness—was she as bright as this person, or that person? Even though she could hardly express herself in conversation, she used this to reassure herself that she wasn’t dumb—or a moron, idiot, imbecile, or nincompoop—the words her father often used to criticize people he did not agree with or who did not do as he expected, like his children. She also had been bullied by a relative a few years older who approached her with aggressive gestures and repeated at every opportunity that her middle initial (F) stood for failure. Those comments extended well into adulthood. Frozen brain and self-doubt became part of her person, like a hidden mill stone that pulled her down with unconscious memory.

Does such childhood baggage influence morality? Not according to dominant traditions in Western philosophy. Emotional reactions do not matter so long as reasoning and will are intact. So when I started my work in moral psychology I did not think my childhood burdens would matter. Like many, I considered morality to be a matter of reasoning and will. In this Kantian view, it doesn’t much matter what you feel or who you have become as long as you reason well, make a good decision, and have a strong will to carry it out. As long as one chooses the right action with moral intent, one fails only if the will is not successful at carrying one through the action. The view that reason controls action is
still common among philosophers and economists (e.g., “rational choice theory”). The field of moral psychology, impressed by moral philosophy, has had a bent toward explicit reasoning as well, although its founder, Jean Piaget, also measured the development of implicit mental structures (schemas) upon which explicit reasoning relies.

When I joined the field of moral developmental psychology, there was still an emphasis on measuring reasoning, although my work addressed implicit processes. In recent decades, psychology has been undergoing a type of paradigm shift to understanding that most of human behavior is governed by implicit processes (although integration with prior theories of implicit cognition—for example, Freud’s—has yet to be accomplished). This book is about how implicit processes rely on our neurobiological capacities and govern our moral behavior.

The impetus for these ideas was the U.S. invasion of Iraq in 2003. I puzzled over how it could be so easy for a society, or for its leaders, to feel little compunction about destroying innocent civilians (for whatever reason). The rationale for war seemed flawed. Where did war fever come from, and how was it “moral”? Around this time, I stumbled upon books that led me to delve into evolutionary theory (H. Bloom, 1995; Konner, 2002). Although I questioned the notion of original sin in my religious (Christian fundamentalist) upbringing, it did seem to match up with evolutionary theory, providing an appropriate explanation for going to war: Violence and selfishness are part of human nature.

But as I began to go deeper into anthropological and related research, more questions arose. I found James Prescott’s work online (e.g., 1975). He pointed to the physiological effects of early care on mental health. Citing the work of Harry Harlow, Steve Suomi, and William Mason, he led me to realize that attachment theory was not only about psychological mental models, but also about the sculpting of neurobiological structures. I discovered the eye-opening book Hunter-Gatherer Childhoods by Barry Hewlett and Michael Lamb (2005), in which a chapter by Melvin Konner summarizes childrearing practices across small-band hunter-gatherers, the type of society that anthropologists assume represents 99 percent of human genus history. Their childrearing practices are quite different from those in the United States. I wondered, could that matter for adult outcomes?

Why were humans, unlike other organisms, so consistently pathological, so destructive as a matter of course? Aggression and killing are costly to aggressor and victim and thus are necessarily rare among animals (Bernstein, 2011). Why were humans so different? Other anthropological accounts indicated that aggression was not universal among humans. In fact, adult personalities were different in small-band hunter-gatherer societies (SBHG) (Fry, 2006; Ingold 1999). Emerging independently around the world, SBHG culture and values even sounded like those of the early Christians (generosity, sharing, egalitarianism). Striking was how peaceful the SBHG tended to be. For example, the Ifaluk of Micronesia were shocked, terrified, and made ill by watching a Hollywood movie depicting a murder (provided by the United States on a goodwill mission) (C. Lutz, 1988).
When asked why they ran away instead of defending themselves against attackers, the Semai of Malaysia said that, if they had retaliated, the attackers might have gotten hurt (Dentan, 1968). The view that humans are naturally selfish and violent because of their evolutionary heritage did not fit anthropological accounts of these and other SBHG peoples. Then why were people in developed nations seemingly so different? Why did they accept violence and selfishness as normal human behavior? How could human nature in people of the United States vary so widely compared to that of the SBHG?

Further, indigenous peoples, especially those raised in small-band hunter-gatherer societies, show remarkable sensory and intellectual capacities that are virtually unknown in developed nations (e.g., J. Diamond, 1997; Everett, 2009). They typically live modestly and sustainably, demonstrating sensibilities for their impact on other lives and future generations (Gowdy, 1999; Ingold, 1999). They also show high social well-being and a sense of connection to all of life. These characteristics typify indigenous cultures generally, including the settled ones of North America (Martin, 1999).

As I was making forays into anthropology, I started into neuroscience. Jaak Panksepp’s work led me to understand our mammalian heritages and the neurobiology of emotions. The SBHG seemed to be more mammalian than people in civilized nations. What did that mean, and did it matter? Then I found Allan Schore’s work demonstrating that early-life experience has neurobiological effects on right hemisphere and executive functions that can last a lifetime. The work of Michael Meaney and colleagues showed life-lasting epigenetic mechanisms of early care. Anthropologist Douglas Fry (2006) noted cultural differences between peaceful and violent cultures—and they seem to have something to do with early life.

As I delved deeper, I grew more and more disturbed. It seemed that in their structures and institutions, civilized societies had moved away from many of the types of support that humans had received in the past. The effects of ignoring such heritages seemed to have ramifications for well-being, not only in children but in the adults they become. There was a large chance that these heritages mattered for moral functioning.

I remembered Paul MacLean’s (1973, 1990) triune brain theory and read about its revisions and interpretations (Cory & Gardner, 2002). The three brain strata had their own independent orientations that could compete with one another. The most primitive stratum was oriented to safety and survival, and could impair the rest of the brain when active. In many ways, that sounded like my problem: my freezing and brain-fainting in the face of threat. It seemed that the reasoning-is-enough view of morality was wrong. How could reason be enough for morality when other parts of the brain could strangle it? And what happened to compassion?

In my late adolescence, I had noticed I was lacking in compassion (even though I often cried for unfortunate children). I began to wonder again about my deficiencies. Though I had seemingly always been concerned about moral...
issues, truly how full were my moral capacities? Did I have only a partial morality? If so, then what kind of morality did I have?

Ancient philosophers like Aristotle had a fuller view of morality beyond reasoning. *Habitus*, or the disposition to act, was a key part of being a virtuous moral agent (Aristotle, trans. 1988). Reasoning and will were among a host of virtues that interacted with situations. Emotions had to be well trained or virtue could not develop. All virtues fit into a larger worldview of human flourishing (*eudaimonia*) and excellence (*arête*).

This book takes up a similarly larger view of morality that includes an emphasis on flourishing in terms of not only psychology but also biology and ecology. If human flourishing is our aim, we must consider that “the activity of explaining why things are as they are . . . is intrinsically like the activity of determining what the good is, and in particular how human beings should live” (C. Taylor, 1993, p. 217). The modern world has parsed life into separate domains and practices. However, in the pre-agrarian (i.e., SBHG) mind, it is taken for granted that these activities should be integrated: practical reason with explanation; grasping the nature of the world with determining how humans should situate themselves in it; understanding the cosmos with becoming attuned to it. In other words, facts are used to determine what the good life is. “Practical reason . . . uses facts to approach values” (Chisholm, 1999, p. 2). If we take our animal nature seriously, facts and values are only artificially separated. Ideals infuse nature, from the spider that repairs a broken web to the primates that reconcile after a fight (de Waal, 1996). Cooperative purpose and mutualism occupy every species, every ecosystem, and even our own bodies, which rely on vast numbers of bacteria to digest our food and keep us alive.

To approach *eudaimonia* or human flourishing, one must have a concept of human nature, a realization of what constitutes a normal baseline, and an understanding of where humans are—embedded in a cooperating natural world. Apprehending flourishing requires an understanding of human development (in the broad sense) and how emotional systems have evolved to guide actions in response to the facts of the world. Longstanding assumptions in the West—that is, that emotions and desire are “nonrational, arbitrary, and subjective” (Johnson, 1993, p. 132)—have led theorizing in the direction of fallacious reasoning and practice that undermines humanity’s essence. In contrast, understanding human evolution through the mammalian branch, with an appreciation of the vital and powerful nature of social and emotional development, can help humanity retrieve self-understanding. The fluidity of human development and the many systems it comprises fits into the interdependently interactive nature of Nature.

How does ontogeny (an individual’s development) fulfill or undermine phylogenetic (species-level) heritage? What does species-typical development look like? Over the course of human genus existence, what was provided to optimize development? As developmental systems theory points out (e.g., Oyama, 2000), evolution provides extensive roots for our moral sensibilities—but they are not packaged traits like eye color that pass from one generation to the next. Instead,
evolution provided a system for early development, a nurturing environment that shapes capacities (an evolved developmental niche). I examine moral development through the lens of early childrearing effects on psychosocial development. The roots of social capacities, self-regulation, compassionate morality, and creative moral imagination may be under critical construction in early life, requiring appropriate caregiving for proper development. Moral functioning can be undermined by early experience, resulting in adults who emphasize narrow intellect and/or reactive self-protection, as my own experience shows.

It appears that the common early experiences of our ancestors (and cousins, the small-band hunter-gatherers) provide a social commons for the development of human nature—the essence of being human (rather than being inhumane or nonhuman). I will argue that early experience plays a vital role in how moral sensibilities are tailored, shaping systems when the maturational schedule brings them online. When childhood experience does not support evolved needs, it creates species-atypical outcomes. Physiological deficits from early experience—including stress hyperreactivity—influence perceptive, social, and cognitive capacities, pushing moral preferences toward self-protective imagination. Based on our own experience, we adults often re-create (in our own image) cultures that mimic our more limited capacities and preferences, shifting baselines for normality. Understanding what aspects of neurobiology are foundational and how they are effected and affected at the time of construction and subsequently will allow us to learn how we might alter unhelpful individual and social mindscapes. How much control do we have over our moral mindscapes? Can we shift ourselves toward greater relational attunement and communal imagination? These are questions I address. Culture and self-authorship have a lot to do with the answers.

The overall goal of this book is to show that there are reasons that perhaps have not been considered as to why many humans can become oriented to self-focused values and behaviors such as tribalism and hierarchy, hoarding and ecological mindlessness. At the same time, we are at a turning point where humans are yearning for change and demonstrating capacity to shift perceptions towards an empathic, cooperative world. This book contributes to that movement.

There are three main contributions of this book to the field of moral development. One is to point out and explain the vital importance of early experience. I use an evolutionary framing that is not based in genes but grounded in developmental systems theory, which encompasses an array of inherited components beyond genes. A second contribution is to propose a neurobiological developmental theory of moral motivation. An individual’s neurobiology emerges from early experience to shape long-term well-being and moral orientations. But on a moment-to-moment basis, an individual’s morality is a shifting landscape. We move in and out of different ethics based on the social context, our mood, filters, stress response, ideals, goals of the moment, and so on. A multiple-ethics theory can help explain the variability in moral functioning that we see in ourselves, and interdisciplinary insights can guide us in determining how to reshape our-
selves. The trick for most wise behavior is to maintain emotional presence-in-the-moment. Our capacity to spend more time in a prosocial-egalitarian mindset is reliant on well-functioning emotion systems. Third, I move outside the usual frames and propose a revisioning of moral possibility, using the primal wisdom of our foraging (SBHG) cousins. As mentioned above, small-band hunter-gatherers represent a lifestyle presumed to account for 99 percent of human history (as documented by anthropologists and others). Although universal until about 10,000 years ago, such societies have continued to coexist with settled societies to the present day, and I use the data collected in recent centuries.4 I explore the life of the SBHG and use them as a baseline model because they offer us a glimpse into a strikingly cooperative social world in the face of a difficult and sometimes unpredictable physical world.5 How do they do that? Their practices offer us insight into how to live not only with more happiness but also sustainably. I suggest ways that we can learn from them, integrating what and how they know with modern sensibilities. Again, the goal is to move us toward greater flourishing for All.

This brings me to the other impetus for this book. Humans in the modern world and unlike any other animal, are destroying their habitat and committing speciescide on a daily basis. For example, areas of the oceans that were once teeming with fish are now filled with plastic (National Oceanic and Atmospheric Administration, 2013). Formerly ecologically rich areas of the world are poisoned with toxins from the search for energy resources (e.g., the Niger Delta) or unsustainable farming and gardening (e.g., Mississippi Delta). Nearly every ecosystem on the earth is under duress from human activity (Millennium Ecosystem Assessment, 2005). Kolbert (2014) documents how, like a slow-motion asteroid, up to 50 percent of all species may soon be extinct from human activity bringing about a sixth mass extinction on the planet. Although for several centuries, Westerners have enjoyed exuberant exploration, we now are coming up against the limits of the planet. Insights from indigenous societies show us an alternative pathway. Combining modern tools with ancient wisdom and ways of being may lead us toward the transformation we need for the next phase of evolution. If humanity is to survive, it may need to restore its human essence as a partner with the natural world instead of its dominator.

This book is a wide-ranging exploration of the insights I gained in response to my questions about moral development, including my own. This book gardens among the seedlings, orchards, and harvests of multiple fields, including history and anthropology, philosophy and ethics, the developmental and clinical sciences, neurobiology, and educational intervention and prevention. All of these fields have rich resources that contribute to the understanding of morality and its development, so I sample them all.6

This is a book about ethics—the ethics of caring for the natural world, for children, for self and for each other. The book is intended to contribute to the conversation about how to live more ethical lives that correspond to our human essence, where we fit within the larger context of Life. When I try to take into
account humanity’s fullest capacities, it leads me to an alternate view of the current human condition, and it reveals a pathway out of our predicament. We can learn to restore our balance when we find ourselves falling into a bracing self-protection yet again. We can re-enter a circle of inclusion with one another and with our companions in the natural world. Humanity’s *telos* or fulfillment is in companionship with the natural world. It is our nature to be engaged and communally imaginative with Life. How we set ourselves up to support our human essence is vital. How we transform ourselves is the story to tell.7