# Approach, Ability, Aftermath:

# A Psychological Process Framework of Unethical Behavior at Work

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# **Abstract**

Many of the scandalous organizational practices to have come to light in the last decade—rigging LIBOR, misselling payment protection insurance, rampant Wall Street insider trading, large-scale bribery of foreign officials, the packaging and sale of toxic securities to naïve investors—require ethically problematic judgments and behaviors. However, dominant models of workplace unethical behavior fail to account for what we have learned from moral psychology and cognitive neuroscience in the past two decades about how and why people make the moral decisions they do. In this review, we explain how intuition, affect, physiology and identity support and inform more deliberative reasoning process in the construction and enactment of moral behavior. We then describe how these processes play into how individuals approach a potential moral choice, whether they have the *ability* in the moment to enact it, and how it is encoded in the action' his aftermath, feeding back into future approaches. Throughout, we attend to the role of organizational context in influencing these processes. By reviewing this large body of research and presenting a new framework that attempts to integrate these new findings, our hope is to motivate new research about how to support more moral workplace behavior that starts from what we know now.

In the past few decades, organizational scholars have increasingly turned their attention to the question of why employees and their managers engage in costly unethical behaviors (Moore & Gino, 2013; Palmer, 2008; Robinson & Bennett, 1997; Treviño, 1986; Treviño, Weaver, & Reynolds, 2006; Vardi & Weitz, 2004). Alongside this burgeoning body of knowledge from the management literature, the fields of moral psychology (e.g., Doris & Cushman, 2010), experimental philosophy (e.g., Knobe & Nichols, 2008), behavioral economics (e.g., Gintis, Bowles, Boyd, & Fehr, 2005), cognitive neuroscience (e.g., Greene & Paxton, 2009), evolutionary biology (e.g., de Waal, Macedo, Ober, & Wright, 2006) and behavioral endocrinology (e.g., Carney & Mason, 2010; Carney et al., 2014) have concurrently addressed questions about when and why people behave in morally problematic ways.

Unfortunately, much of the knowledge from disciplines outside the management literature has not been integrated with what we know about unethical behavior in organizations. True interdisciplinary learning faces many obstacles (Knights & Willmott, 1997), even though leading scholars in the area of ethical decision making have noted the importance of taking more cross-disciplinary approaches, integrating across constructs, topics and issues that span academic fields (Bazerman & Gino, 2012; Tenbrunsel & Smith-Crowe, 2008; Treviño et al., 2006). As Tenbrunsel and Smith-Crowe note, researchers "need to engage in the difficult and frustrating work of breaking down old assumptions, building new theories, and utilizing new technologies" to truly expand our understanding (2008: 593).

There are some important reasons why this integration has not occurred. The management literature has mainly focused on aspects of organizational or institutional context as antecedents of ethically problematic behavior. These include factors such as leadership (Brown & Treviño, 2006; Messick & Bazerman, 1996), organizational policies and procedures (Ashforth & Anand, 2003; Brief, Buttram, & Dukerich, 2001), compensation practices (Harris & Bromiley, 2007).

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goals and incentives (Ordóñez, Schweitzer, Galinsky, & Bazerman, 2009), mistreatment (Skarlicki, van Jaarsveld, & Walker, 2008), and the organizational culture and context (Mayer, Kuenzi, & Greenbaum, 2009). In terms of outcomes, organizational researchers have focused on counter-normative behavior (e.g. deviance, antisocial behavior, misbehavior, counterproductive behavior, misconduct, corruption, sabotage) that harms the organization or its stakeholders (O'Leary-Kelly, Duffy, & Griffin, 2000), measured most commonly using self-, supervisor- or peer-reports of undesirable workplace behavior. Researchers have been able to tap actual employee behavior only rarely, and often have to use archival data to access it (e.g., Baker & Faulkner, 1993; MacLean, 2001; Mohliver, 2012; Pierce & Snyder, 2008). This work has been useful in identifying sources of risk and levers of change about which managers should know to protect their organizations from the problematic acts of their employees and improve their organizations in the future. However, this work has focused mainly on identifying conditions under which undesirable outcomes are more likely, rather than understanding *how* these factors raise the likelihood of negative behaviors.

In contrast, moral psychology—including contributions from cognitive neuroscience and behavioral endocrinology—has focused on the more basic processes underlying how and why individuals react the way they do to morally charged situations, make the ethical judgments they do, whether they follow through on those judgments with action, and how they understand those behaviors once undertaken. Stripped of organizational context, this research provides important insights about the processes underlying our moral choices rather than the organizational factors that affect them. Using different paradigms and research designs to test their hypotheses, often in controlled experimental settings or using highly sophisticated methods (such as fMRI scans, heart rate monitoring and saliva samples), this work allows us to draw generalizable conclusions about

human nature. While some of the key insights from these bodies of work have wound their way into our understanding of unethical organizational behavior, many more have yet to be.

We review the most important contributions from moral psychology of the past quarter century and discuss the ways in which they can enrich and inform research on unethical workplace behavior. We begin by circumscribing the domain that we address: what do we consider the domain of unethical or immoral behavior? We then describe three challenges that, together, toppled long held beliefs that ethical behavior was driven primarily by controlled, deliberative, and rational cognitive processes. These challenges are commonly grouped together under the rubric of the dual-system revolution (Cushman, 2013; Greene, 2013), which shifted how we understand moral behavior in a fundamental way. We then explicate in greater detail the role that four non-conscious processes (intuitive, affective, physiological, and identity-based) play in determining our moral behavior, complementing and sometimes competing with our deliberative reasoning processes. We see our primary contribution as integrating the research that has remained entrenched in rationalistic traditions with research that has focused on non-deliberative processes, and then demonstrating how this integration can inform what we know about ethical behavior in organizations.

Our discussion culminates in offering an alternative to the framework for ethical behavior that has structured much of the work in organizational scholarship: Rest's four component model (1986). Our model is based in the behavioral ethics tradition, and outlines a process-based approach of understanding how and why we make the moral choices we do. We do not dispute the validity of Rest's model. Rather, our model draws upon it and extends it in important ways. In particular, our framework (depicted in Figure 1), integrates the new knowledge from the dual-process revolution about the role of non-conscious processes in moral behavior, encompassing (1) how individuals approach potential moral choices, (2) what affects their ability to make and

manifest moral action and (3) what happens psychologically in its aftermath. One can think of our framework as offering a systematic way of thinking about how rationalist approaches such as Rest's can be disrupted by non-deliberative processes.

In Rest's model, the first step is moral awareness. Once people are aware of the moral dilemma, they form a judgment about its moral status, from which stems an intention to act, leading to moral action. This model rests upon foundational assumptions that our behavior is consciously determined and that these steps follow rationally from one another. However, as we will argue, common psychological biases as well as the way our attention is directed intervenes when people face ethical dilemmas or choices, and influence whether people are even aware that they are facing an ethical challenge. Even when such awareness is present, the way individuals construe decisions often interferes with appropriate or accurate moral judgments. In addition, the research we draw on complicates the pathway from judgment to intention: even if we form an appropriate judgment about the moral status of an act, we can rationalize our way out of doing it. or simply be compromised in our ability to act on the good intentions we have. Importantly, our model also includes a step that is not part of Rest's original model, to include what happens after we act (appropriately, inappropriately, or not at all), as our past behavior will influence how we approach our subsequent ethical choices. After discussing our integrative framework, we derive implications for future research, with a view to highlighting the central unanswered questions in our field, and offering ideas for how to address them.

The field has not offered a new model of the process of ethical behavior in three decades. In this contribution we hope to prove a framework that allows us to account for what we have learned from the burgeoning literature from moral and cognitive psychology, as well as address the effects of organizational context on ethical behavior. By reviewing this large body of research

and presenting a new framework that integrates these new findings, our hope is to drive new research that starts from what we know now.

## I DEFINING THE DOMAIN

Business ethics crosses many fields, and many commentators have voiced concern about how the boundaries of the field are muddy, and that integration across the disciplinary boundaries that comprise it is lacking. One common criticism is that normative and behavioral approaches to the study of ethics in business remain siloed (Schminke & Priesemuth, 2010). Normative claims (thinking about what *ought* to be) are normally left to philosophers, while social scientists describe the types of choices that people actually make and why (thinking about what *is*). Routes through which normative (prescriptive) and social scientific (descriptive) approaches might be better integrated have been proposed (Fleming, 1987; Robertson, 1993; Weaver & Trevino, 1994). However, our view is more aligned with Donaldson, who argued that any effort to integrate such radically different approaches to knowledge creation is like "combining triangularity and circularity" (1994, p. 157). While both approaches have much to contribute to our understanding of moral behavior, our focus is firmly in the behavioral ethics tradition, which represents a social scientific, descriptive approach.

That said, there is one aspect of normative ethics that is impossible to avoid, even if one takes a behavioral ethics approach: we need some common understanding of what counts as ethical or unethical behavior. As Tenbrunsel and Smith-Crowe write, "without a universal understanding of the core dependent variable, research will remain inconsistent, incoherent and atheoretical" (2008, p. 548). This aspect of a social scientific approach requires making normative claims about what ethical means. Though no definition of ethical behavior will ever settle these longstanding debates (and it would be hubristic for us to think we could offer one),

there are some areas of both coherence and consensus within the larger normative conversation that deserve to be highlighted.

Moral and ethical refer to the same domain. One potential point of confusion is easy to settle. Though some commentators differentiate between what counts as moral and what counts as ethical (see Gioia, 1992), most employ the terms synonymously (e.g., Tenbrunsel & Smith-Crowe, 2008; Treviño et al., 2006). As we have noted elsewhere (Moore & Gino, 2013), this is entirely appropriate, given Cicero coined the Latin term moralis (proper behavior of a person in society) as a direct translation of the Greek ethicus. This is important to clarify, as disciplinary psychologists tend to use the term "moral" (Doris & Cushman, 2010; Haidt, 2007), while organizational researchers seem more comfortable with the term "ethical" (Jones, 1991; Tenbrunsel & Smith-Crowe, 2008; Treviño, 1986). However, recognizing that these terms are synonymous at least places us in the same conversation.

Is a precise definition required to advance a coherent body of research? We differ from Tenbrunsel and Smith-Crowe in thinking that a precise definition is required in order for our understanding of organizational ethics to advance in a coherent way. Even Aristotle, for whom the definition of terms was paramount, writes in the *Nicomachean Ethics*, "[P]recision is not to be sought for alike in all discussions... It is the mark of the educated man to look for precision in each class of things just so far as the nature of the subject admits" (Book I, Ch. 3, 1094b). Ethics is not the type of subject matter that admits a great deal of precision. In this brief section, we explain why a precise definition of "ethical" may not be required for coherence, and enumerate the uncontested (or at least, less contested) outcomes that are commonly considered to be representative of unethical organizational behavior. Though the boundaries of the domain may be fuzzy, the points of agreement are instructive, and allow our field to move forward without

becoming too lost in the quagmire of two thousand years of philosophical debate about the ultimate definitional boundaries of ethical behavior.

For Aristotle, ethical behavior was about living a virtuous life. For Kant, it was about living in accordance with principles that one could universalize. For Utilitarians, like John Stuart Mill, it was about acting such that the greatest number could experience the greatest good. The common thread across these various approaches is that to be ethical requires a perspective on what behaviors that are desirable (to act in accordance with them), and behaviors that are undesirable (to avoid them). There are varying degrees of consensus about whether a particular behavior counts as morally desirable or not, and sometimes the context of an action changes its moral status (lying may be generally undesirable, but lying to an SS officer about whether you are hiding a Jew in your attic is likely a defensible lie). However, anthropologists and psychologists have identified a number of ethical domains that can help circumscribe what behaviors may count as morally desirable and undesirable.

Ethical domains. Moral foundations theory outlines five, and more recently six, domains that represent "building blocks" of morality (Graham, Haidt, & Nosek, 2009; Haidt & Graham, 2007; Haidt & Joseph, 2004; Shweder, Much, Mahapatra, & Park, 1997). These domains are (1) harm, (2) fairness, (3) liberty, (4) loyalty, (5) authority, and (6) sanctity. The majority of research in behavioral ethics focuses on the domains of harm and fairness in one way or another. The domains of harm and fairness include concerns about hurting others (Milgram, 1974), giving oneself unfair advantages (Batson, Kobrynowicz, Dinnerstein, Kampf, & Wilson, 1997), being dishonest (Farrington, 1979), and theft (Diener, Fraser, & Beaman, 1976). Failing to act prosocially is often construed in moral terms in psychology as well, such as the work on the bystander effect or the failure to help others in distress (Darley & Latané, 1968; Latané & Rodin,

1969; Staub, 1974). Harm and fairness even have roots in primate behavior, as they are fundamental to our survival as a species (de Waal, 2006).

In comparison, organizational research has focused more on behaviors that concern managers. Often these also speak to apprehensions about harm and fairness violations, such as deviance that harms the organization (Bennett & Robinson, 2003; Robinson & O'Leary-Kelly, 1998), abusive supervision (Tepper, 2000), discrimination (Davison & Burke, 2000), and organizational justice (Colquitt, Conlon, Wesson, Porter, & Ng, 2001). There are even some areas of direct agreement and overlap: organizations are concerned about theft, whether the employees are stealing money (Greenberg, 2002; Mars, 1982) or time, in the form of social loafing (Kidwell & Bennett, 1993; Price, Harrison, & Gavin, 2006). Negotiations research in particular has often focused on lying, a type of harm (Aquino & Becker, 2005; Lewicki, 1983).

Beyond the domains of harm and fairness, morality also often involves questions about to whom one should be loyal, the extent to which individuals should have freedom or respect authority, and whether or not an action represents an affront to a religious belief (Haidt & Graham, 2007; Shweder et al., 1997). There is less consensus about the ethicality of behaviors that fall into these domains (Graham et al., 2009), in part because they require prioritizing conflicting values: being loyal often inherently contradicts what it would mean to be fair (for an example of how these values conflict, see Jackall, 1988), and valuing authority often inherently contradicts with the exercise of liberty (for an example of how these values conflict, see Arendt, 1963/1994). In addition, whether these actions are considered morally beneficial or detrimental depends on whose perspective is taken. For example, loyalty will be viewed positively by the person to whom one is being loyal, but may not be by others if they perceive the action as undermining fairness (e.g., nepotism).

What this means in practice is that moral psychology and research in organizational ethics tend to overlap when it comes to concerns about harm and fairness, and may diverge more when it comes to concerns about liberty, loyalty, authority, or sanctity. Both normative theorists and organizational scholars tend to agree that behavioral manifestations of harm (e.g., theft, dishonesty, abuse) and behavioral manifestations of unfairness (discrimination, injustice) are morally undesirable. It doesn't mean that the other domains are unimportant to organizational ethics, only that they represent more contested domains within it. Thus, even in the absence of a universal understanding of "ethical behavior" (or, more accurately, with the acknowledgement that we should only seek a definition "so far as the nature of the subject admits") a coherent research agenda remains possible.

## II MORAL BEHAVIOR: NOT BY REASON ALONE

Putting aside definitional concerns, our primary interest here is to amend our understanding of the process that needs to morally problematic outcomes. When it comes to explaining the process by which unethical behavior occurs—however "unethical" is defined—the literature has been dominated by a limited number of models. By far the most prominent is the four-component model developed by Rest (1986). With close to 3000 citations on Google scholar, this model postulates that ethical behavior is the outcome of four steps. First, (1) *moral awareness* requires that the individual consciously interpret the situation as one with moral import. Once aware of the ethical stakes, the individual then needs to make (2) an accurate moral *judgment* about the appropriate action to take in that situation. The person must then (3) develop the *intention* to enact the morally right course of action, and (4) follow through on this intention with *action*. Rest's model—awareness, judgment, motivation/intention, and action—is intuitive and compelling, and easily adaptable to different theoretical needs. As a result, it provides the

foundation for a number of other frameworks that have been developed to explain unethical behavior in organizations, including Treviño's person-situation interactionist model (1986) and Jones' issue-contingent model (1991), as well as providing the organizing framework for prior reviews of the literature (O'Fallon & Butterfield, 2005; Treviño et al., 2006).

Rest's model is attractive. We like to believe we are in control of our actions (Burger & Cooper, 1979; Langer, 1975), and his model insinuates that we are. Early theories of moral behavior grew directly from philosophical traditions that were strongly rationalist in nature, heavily influenced by the work of Immanuel Kant (1785/1993). Kantian tradition, with its stress on the power of conscious deliberation and careful reasoning in determining correct moral action, then inspired Kohlberg's cognitive moral development theory (Kohlberg, 1969, 1984), from which Rest's framework emerged. In this tradition, failures to behave ethically are a result of flaws in an individual's moral awareness, judgment, motivation or follow through, which can be improved through moral education about how to deliberate appropriately about moral issues (Kohlberg, 1975; Rest, 1986). The suggestion seems to be that *if only* our awareness could be properly directed, and our skills in moral reasoning appropriately developed, then much unethical behavior could be avoided. But could it?

Rest's model makes some serious assumptions about the nature of human behavior that have been widely challenged, and largely contradicted, by work in moral psychology and cognitive neuroscience in the last two decades. First, his highly rationalist model of moral behavior means that the individual actor is credited with conscious control over his or her ultimate moral choices and behavior (conditioned on the individual's awareness of the act including moral implications). However, much work in moral psychology since the ascendance of Rest's model has focused on the challenges with remaining consistent in one's conviction about what the morally correct choice is in a given situation, even when we are aware that there is

a moral issue at stake (Bazerman & Gino, 2012; Tenbrunsel, Diekmann, Wade-Benzoni, & Bazerman, 2010), and the challenges in following through with what we believe to be the morally optimal outcome (Moore & Gino, 2013).

Rest's rationalism also assumes a stability about human behavior questioned by recent research in moral psychology (Miller & Effron, 2010; Monin & Jordan, 2009). While Rest's model allows for change in how we enact our moral agency over time, it describes these changes as the result of long-term investments in developing our moral skills—such as from one's upbringing or education. However, research shows that human behavior is substantially more capricious than that, and that our decisions and behaviors depend on a wide range of situational factors that interfere with even the best childhood or educational inputs. In other words, a realistic theory of moral decision-making needs to take into account the challenges humans have in developing or maintaining a clear view about what the morally optimal course of action is in a given situation, and the ability to enact that course in a consistent way. We now begin to develop this account by describing three related challenges to the assumptions made by Rest and other theorists focusing on conscious and rational processes that have emerged in recent decades.

Reasoning requires emotion. The first of these challenges involves a revolution in our understanding of how the brain works. Twenty years ago, the neuroscientist Antonio Damasio published a landmark book which made the case that reason and emotion act in "partnership" in making our decisions and committing to courses of action (1994, p. 175). He described how our decisions and our behavior worsen when our emotional abilities have been compromised by illness or injury. His story begins with an account of railroad worker Phineas Gage, who survived an accident in which a 13-pound tamping iron skewered his cerebral cortex. After the accident, Gage retained his physical and cognitive functions, but, in his physician's account, "the equilibrium...between his intellectual faculties and animal propensities, seems to have been

destroyed" (Harlow, 1868/1993, p. 277). The damage to his cerebral cortex impaired his ability to feel emotion. As a result, Gage was now profane when he had been polite, impulsive when he had been sensible, undisciplined when he had been responsible.

Since this extreme case study, research into the neurophysiology of decision-making has explored the dramatic ways in which our capacity to reason *depends on* the ability to generate appropriate emotional responses to stimuli. As Damasio puts it, "the strengthening of rationality requires that greater consideration be given to the vulnerability of the world within" (1994, p. 247). As others with similar compromised brain function, Gage had the capacity to exercise reason. However, his injury left him without effective "somatic markers"—that is, emotion that help signal danger or benefit, and allow us to predict the potential future consequences of our actions. Without access to his vulnerable inner world, Gage was unable to marshal his capacities for reason to make more appropriate choices.

Non-deliberative processes are primary. Jonathan Haidt published his social intuitionist model of moral behavior (2001) a few years after Damasio's book came out. This work expanded the theoretical conversation in moral psychology to take the role of non-deliberative processes in moral judgment more seriously. He highlighted how we often arrive at moral judgments automatically, and that, typically, these non-deliberated preferences direct our behavior, even if we employ conscious reasoning in their aftermath. He also stressed the motivated nature of much moral reasoning. Work on motivated reasoning generally (Kunda, 1990), and motivated moral reasoning in particular, also supported the idea that intuitive judgments precede reasoning (Ditto, Pizarro, & Tannenbaum, 2009; Uhlmann, Pizarro, Tannenbaum, & Ditto, 2009).

In addition, harkening back to both emotivist philosopher David Hume (1739-1740/2007, 1751/1957) as well as Damasio (1994), Haidt reiterated the importance of moral emotions in these intuitive judgments. Depending on reasoning alone to direct our moral behavior is

problematic, as reason does not dictate our preferences. Our emotions indicate to us what outcomes we value. As Hume wrote three centuries ago, "'tis not contrary to reason to prefer the destruction of the whole world to the scratching of my little finger" (1739-1740/2007, Part 3.3.6). Reason may be required in order to evaluate the ends we set for ourselves, but our emotions determine which ends we prefer. Haidt's challenge to rationalist models tipped the balance back towards thinking about non-deliberative processes in understanding our moral behavior.

Different types of moral choices marshal different types of processing. Finally, cognitive scientist Joshua Greene and his collaborators began to empirically examine the conditions under which moral choices made more automatically, compared to conditions which enlist controlled cognitive processing in arriving at moral decisions (Cushman, Young, & Greene, 2010; Greene & Haidt, 2002). Using fMRI technology, they discovered that the way emotion participates in moral decision making systematically varies as a function of the type of decision it is, and one's preferred outcome for it (Greene, Morelli, Lowenberg, Nystrom, & Cohen, 2008; Greene, Nystrom, Engell, Darley, & Cohen, 2004; Greene, Sommerville, Nystrom, Darley, & Cohen, 2001). Most simply, emotion and automatic processing is more central in arriving at decisions that are "personal" (that is, where an agent's direct action may result in serious bodily harm to a specific individual or group) (Greene et al., 2001), as well as decisions where one arrives at a deontological or principle-based conclusion rather than a consequentialist one (Greene et al., 2008; Greene et al., 2004).

Together, these three bodies of work have cemented agreement that moral judgment is made via a dual-process model accommodating processes both rational (cognitive, controlled, deliberative) and non-rational (intuitive, automatic, emotional) (Cushman et al., 2010; Evans, 2008; Haidt & Kesebir, 2010). In the intervening years, different scholars have hotly contested the relative influence of each side of this dual process in controlling ethical behavior (Cushman,

2013). We certainly have no ambition here to settle the debate of which type of processing is more important. Instead, we focus on how it may be more accurate to call the model "synthetic" (Greene et al., 2004) rather than dual-process, since rational and non-deliberative processes appear to be co-dependent and work cooperatively as often as they compete. More importantly, we use the new knowledge this work generated as a springboard from which to develop an amended framework for ethical behavior that accounts more completely for how we actually behave.

## III THE ROLE OF NON-DELIBERATIVE PROCESSES IN OUR MORAL BEHAVIOR

In this section we overview four non-deliberative processes that each play a significant role in moral behavior. Our aim is to highlight research, primarily from outside the management literature, which fleshes out how these non-deliberative processes—intuition, affect, physiology, and identity—influence our moral behavior. We acknowledge that these processes can co-occur, making sharp distinctions between them difficult to draw, and perhaps even inappropriate. However, for the sake of expositional clarity, the distinctions remain useful.

# **III.A INTUITION**

Haidt's social intuitionist model focused on how moral judgment often "appears suddenly and effortlessly in consciousness, without any awareness by the person of the mental processes that led to the outcome" (Haidt, 2001, p. 818). Of course, the notion that many of our judgments are made rapidly and prior to any conscious cognitive processing was not new (Bargh & Chartrand, 1999; Zajonc, 1980). The idea can be traced back at least to Freud, who felt that intuition was a way of describing how our unconscious mind communicates to us (1900/1955). However, Haidt was the first to comprehensively document the ways in which moral judgments

specifically often fit a common pattern: a judgment appears immediately to mind upon being confronted with a decision, after which we may or may not search for reasons or confirming evidence to support this intuitively-generated position (cf., Nisbett & Wilson, 1977).

*Moral dumbfounding.* Some of the most original work on intuition and moral judgment describes what Haidt and his colleagues term "moral dumbfounding" (Haidt, Björklund, & Murphy, 2000). Moral dumbfounding refers to the phenomenon where, upon being asked to provide reasons for judgments which have arrived to consciousness intuitively, individuals have a "stubborn and puzzled maintenance of [the] judgment without supporting reasons [for it]" (Haidt et al., 2000, p. 2). One of the main scenarios used in the literature on moral dumfounding involves safe and consensual sex between siblings (Feinberg, Willer, Antonenko, & John, 2012; Haidt et al., 2000; Haidt, Koller, & Dias, 1993). In the first empirical study of on this topic, eighty percent of participants reported that safe and consensual incest was morally wrong. When an experimenter probed them for reasons to support this judgment, participants tended to offer reasons that the scenario had been carefully written to make irrelevant (for example, concerns about genetically compromised offspring were irrelevant to a judgment of this scenario, since it explicitly stated that the siblings used multiple forms of reliable birth control). On average, participants made and dropped six arguments to support their intuition that the act was wrong, without, for the most part, changing their judgment. At the end of the study, seventy percent of participants maintained their original position, without a single articulable reason for it (Haidt et al., 2000).

What this work helped elucidate was the way in which we arrive at rapid, automatic and intransigent judgments about subset of moral decisions, particularly those that elicit strong negative emotions such as disgust (Feinberg et al., 2012), without any awareness of the reasons behind them (Haidt et al., 1993; Shweder & Haidt, 1993). Upon being asked to explain our

intuitions, we then search for reasons, often drawing on implicit theories about what a plausible cause could be for our given response (see Nisbett & Wilson, 1977). However, the reasons provided are completely post hoc, and have nothing to do with the genesis of the intuition. In other words, our moral intuitions are "introspectively opaque" (Shweder & Haidt, 1993, p. 364).

Theorists have posited a number of plausible explanations for these strong moral intuitions in the absence of reasons for them. Cognitive intuitionism advances that moral intuitions represent a direct line to a certain type of moral truth, one so simple and obvious—
"Causing direct harm to others is wrong!"—that it becomes accessible to us without reflection or argumentation (Huemer, 2005; Ross, 1930; Shweder & Haidt, 1993). These deep-seated moral imperatives are difficult to ignore even though we can't explain them. Like our disavowal of sibling incest, our discomfort with contravening strong moral intuitions seems to come from deeper sources. We now understand these sources better, in part because we have a better understanding of how the brain arrives at judgments, and in part because we have advanced our understanding of the ways in which we are hardwired through evolution towards morality.

*Trolleyology*. While Haidt's work on intuition focused on a specific type of moral judgment that he and his colleagues felt would elicit strong intuitive judgments, Greene's research explored how different types of moral judgments were differentially likely to elicit intuitive or deliberative responses. This work was useful in explaining the connections and disconnections between intuitive and deliberative cognitive processing of potential choices. Much of his work uses a classic thought experiment called the Trolley problem (Foot, 1967; Thomson, 1976), the study of which Greene calls Trolleyology (2013). This thought experiment presents a situation in which a trolley is hurtling out of control, and without intervention will hit and kill five people. However, the individual considering the dilemma has the power to interfere with the trolley's trajectory, and doing so will kill one person while saving the original five. This

stylized dilemma is important not because anyone will actually face this particular choice in real life. Rather, the Trolley problem is useful in that allows us to "efficiently dissociate between processes of moral judgment" (Cushman, 2013, p. 274). [Interestingly, it is not hard to think of real life Trolley-type decisions. For example, during 9/11, government officials may have debated whether to shoot down Flight 93 killing those on board while saving the lives of others whom the plane might have hit had it reached the Pentagon (see Muth, 2014).]

Neuroscientists have focused mainly on how two different versions of the Trolley problem elicit different intuitive responses. In the Switch dilemma, the trolley can be redirected by flipping a switch, killing one to save five. In the Footbridge dilemma, the trolley can only be stopped by pushing a man from a bridge onto the tracks, killing him in the process of saving the five. Objectively, the outcomes of both of these versions of the Trolley problem are identical: either one is killed to save five, or five are left to die. However, multiple studies confirm that people's intuitions tell them very different things about the acceptability of these alternatives in the two different scenarios—about 80% of people approve of flipping the switch, while only 20% of people approve of pushing the man, killing him to save the five (Greene, 2013).

The first studies that tried to disentangle the reasons behind these different intuitions used fMRI imaging to explore which areas of the brain were activated when considering the two variations of the dilemma. These studies showed that the Footbridge dilemma increased activity in parts of the brain associated with vigilance to external threats and emotional responses (the same part of the brain compromised by Phineas Gage's injury), while the Switch dilemma increased activity in parts of the brain associated with cognitive control and working memory capacity (Greene et al., 2004; Greene et al., 2001). The Switch dilemma appeared to trigger conscious deliberation ("Is it morally acceptable to kill one to save five?"), while the Footbridge

dilemma appeared to trigger intuitive access to a hardwired preference ("Stop! Do not kill another!").

Related work then showed approval rates in the Footbridge dilemma increase in populations with medical conditions (Mendez, Anderson, & Shapira, 2005) or brain injuries (Koenigs et al., 2007) that impair emotional ability (such as frontotemporal dementia or damage to the prefrontal cortex). They also increase among those primed with positive emotion, as being manipulated to feel happy interferes with the "aversion signal" we typically experience when confronted with this type of dilemma (Valdesolo & DeSteno, 2006). Relatedly, individuals decrease their measured responses to the Switch dilemma when under cognitive load, which uses up the capacity to deliberate about the moral acceptability of the act in a controlled way (Greene et al., 2008).

It appears that different types of dilemmas elicit diverse intuitions by activating different parts of our brain: dilemmas associated with heightened emotional arousal or "fight or flight" responses, such as the Footbridge dilemma, elicit more automatic and intuitive responses, while dilemmas that require balancing multiple parties' interests elicit more controlled and deliberative responses. These results are consistent with the notion that our brains may be hardwired to recoil from certain types of immoral acts, such as causing direct harm to others, while also hardwired to think through complicated moral issues in a more conscious and deliberative way when an emotionally laden intuition does not appear immediately to mind.

Evolutionary ethics. The moral intuitions that appear immediately to mind are likely tied to our evolutionary survival and advancement as a species. Some of the most eloquent arguments in support of this notion come from primatologist Frans de Waal (de Waal et al., 2006). In collaboration with others, de Waal has demonstrated a number of fundamental moral drives (again, mostly in the domains of harm and fairness) that manifest consistently in a number of

primate and mammalian animals. For example, rhesus moneys refuse to operate a device that dispenses food to them if doing so causes an electric shock to another monkey (Masserman, Wechkin, & Terris, 1964). Capuchin moneys are sensitive to fairness violations (Brosnan & de Waal, 2003). Chimpanzees will intentionally help other chimpanzees, even those they haven't met before, and from whom they receive no reciprocal benefit (Horner, Carter, Suchak, & de Waal, 2011). And after fighting, primate species demonstrate forgiveness, offer comfort, and reconcile (Waal, 1989).

All of these instincts serve evolutionarily valuable ends: supporting kin or community members, engaging in reciprocal altruism, or building positive reputations in one's group (Flack & de Waal, 2000). It makes sense that the instincts driving to engage in such behaviors become so deeply embedded in our wiring that judgments that support them surface in our consciousness without active cognition. Building from this, psychologists have examined how evolutionarily valuable imperatives affect our responses to the Trolley problem. It turns out that the general preference to sacrifice the life of one to save the five can be reversed if the one that was sacrificed was vulnerable (young), genetically related (kin), or offered reproductive opportunities (a mate) (Bleske-Rechek, Nelson, Baker, Remiker, & Brandt, 2010). Conversely, the acceptability of sacrificing a life can be amplified if the life sacrificed is from a different species or is a member of an abhorrent group (such as a Nazi) (Petrinovich, O'Neill, & Jorgensen, 1993). These contextual additions shift preferences away from the dominant responses to the Trolley problem because each of these shifts serve a specific evolutionary purpose: protecting one's community, ensuring reproduction, or maintaining one's genetic inheritance.

In summary, intuition plays a key role in our moral judgments. While we may not always be able to explain why we have the intuitions we do, and are often unlikely to change them once they arise, they (1) do seem to be derived from deep-seated needs related to the survival of our

species, and (2) can lead to appropriate moral responses, even in the absence of conscious deliberation. In addition, this work highlighted how slight changes to the context surrounding a moral choice leads to very different types of cognitive processing, and potentially very different outcomes. This is critical when thinking about organizational ethics, as one's professional context includes many varied elements that will push intuitive human responses in specific directions.

#### III.B AFFECT

What is clear from the literature on intuition is that its relationship with affect is extremely close (Cushman et al., 2010). In addition, as we discussed in the first section, emotion and reasoning are highly co-dependent (Damasio, 1994). Yet the specific contribution of affect to moral behavior deserves separate consideration, as our experience of emotion can play uniquely into it, unrelated to intuitive judgment or conscious deliberation.

Feelings are similar to intuitions in that they arrive prior to our opportunity to deliberate about them. Robert Zajonc's seminal paper on affective primacy opens with a quote from an E. E. Cummings poem: "since feeling is first/ who pays any attention / to the syntax of things/ will never wholly kiss you" (cited in Zajonc, 1980, p. 151). The poem underscores how emotion precedes judgment ("feeling is first"), and hints at how our experience of the world is incomplete without it (those who attend overly to syntax will "never wholly kiss you"). Three particular ways in which emotions play an important role in moral behavior are particularly relevant here.

*Emotions function as a signaling device.* Earlier in this chapter, we described how our ability to reason effectively depends on whether we experience emotions completely and appropriately. Emotions provide an efficient and effective signal, without having to engage in cognitive effort, that a potential action is to be pursued or avoided (Nichols, 2002; Scherer, 1984). Perhaps the clearest emotional signal of moral relevance is disgust. Though the

evolutionary function of disgust was primarily related to food (ingestion) or physical contact (contamination) that might be dangerous to our health, it was an easy emotion to translate to more social realms, indicating inappropriate uses of our bodies (such as cannibalism or pedophilia) (Schnall, Haidt, Clore, & Jordan, 2008). In part because the experience of disgust is so aversive, and felt at such a visceral level (associated with nausea), we recoil from situations or objects that are associated with this emotion (Schnall et al., 2008; Wheatley & Haidt, 2005).

Other emotions signal morally relevant concerns as well. Anger can be a signal of unfairness or injustice (Pillutla & Murnighan, 1996), contempt is a often a signal of disapproval (Fischer & Roseman, 2007), and guilt regularly signals a need for us to make amends (Ketelaar & Tung Au, 2003). Positive moral emotions, such as gratitude and elevation, induce individuals to behave in more morally optimal ways through inspiration (Algoe & Haidt, 2009), while empathy motivates moral behavior through compassion for others (Clark, 1980; Eisenberg & Miller, 1987; Jackson, Brunet, Meltzoff, & Decety, 2006). The key here is that emotions point us in specific behavioral directions, and amplify the strength of our moral judgments (Horberg, Oveis, & Keltner, 2011).

*Emotional muting as a danger.* If the presence of emotions is a signaling device that directs us towards ethical behavior and away from unethical behavior, the converse of this suggests that emotional muting is ethically dangerous. When emotions are muted, the signals that we are encountering potentially morally problematic decisions may not be received. Emotional muting was one of Phineas Gage's impaired ability to feel emotions was one of his primary challenges after his accident, undermining his ability to make appropriate moral choices.

Research into clinically diagnosed psychopaths confirms the connection between emotional muting and unethical behavior. Neuroscientist James Blair argues that psychopathy is an outcome of a dysfunctional amygdala, the brain region critical to emotional processing (Blair,

Mitchell, & Blair, 2005). The psychopath's amygdala differs from normal people's in terms of how it triggers physiological responses to distress cues (Blair, 1999), particularly to expressions of others' fear or sadness (Blair, Colledge, Murray, & Mitchell, 2001), leading to one of the common understandings of psychopathy as the inability to feel empathy (Hare, 1993).

Psychopaths' neurological deficiencies mean that they cannot discriminate between moral transgressions (such as behaving violently) and conventional transgressions (such as wearing inappropriate clothing to an event). In fact, psychopaths are more likely to evaluate conventional transgressions as worse than moral ones, partly due to their inability to understand at an emotional level how these types of transgressions differ (Blair, 1995). While psychopaths can identify happiness, sadness and embarrassment in others, they are unable to identify the emotion of guilt in others (Blair et al., 1995). This emotional muting—their limited personal response to distress cues as well as their compromised ability to make appropriate attributions about others' moral emotions—is what allows psychopaths to commit moral violations without experiencing psychological consequences for them.

Being able to appropriately identify others' emotions and empathize with what they are experiencing appears to be a necessary condition of avoiding unethical behavior. This prerequisite is worrisome, considering that many jobs and professions are designed to intentionally mute emotional responses. Dennis Gioia, the Coordinator at Ford who declined to initiate a recall of the Pinto car, writes specifically about how the job was designed to mute his emotional responses to the safety reports that crossed his desk, which in turn compromised his ability to react appropriately to evidence that the car would burst into flames even under low speed rear impact collisions (Gioia, 1992).

*Incidental emotions as interference.* One of the consequences of our moral system being designed to use emotions as critical signals that direct and constrain our behavior is that

incidental emotions—ones that we experience but are unrelated to the situation at hand—will influence what we do, even if the signal of the incidental emotion provides is wrongheaded (Andrade & Ariely, 2009). As we mentioned above, if people experience incidental happiness, they will be more likely to endorse pushing the man in the Footbridge dilemma, as the emotion interfered with the "aversion signal" the dilemma typically elicits (Valdesolo & DeSteno, 2006). Incidental experiences of happiness also increase trust (Dunn & Schweitzer, 2005). In contrast, incidental negative emotions can undermine moral outcomes. The incidental experience of anger decreases trust (Dunn & Schweitzer, 2005), and can increase deception (Yip & Schweitzer, 2014). The effect of incidental emotions on moral outcomes is not limited to discrete emotions either. Generalized positive affect can inspire positive moral behaviors such as helping (Carlson, Charlin, & Miller, 1988), and generalized negative affect can impede our ability to self-regulate and increase morally detrimental behaviors (Leith & Baumeister, 1996).

Though debate about the importance of emotion to appropriate moral judgment continues (see Huebner, Dwyer, & Hauser, 2009), it is difficult to argue with the idea that emotions signal something important about a potential moral issue at hand, and, when working properly, will direct us towards ethical behavior and constrain unethical behavior. Returning again to the role of organizational context, it is easy to think of a number of ways in which our daily professional routines may trigger emotions that will direct us towards different courses of action: fear triggered at the thought of speaking up about potential wrongdoing may hider the exercise of voice (Kish-Gephart, Detert, Treviño, & Edmondson, 2009), the thrill associated with a potential windfall such as a large bonus may trigger morally problematic risk-taking (Mano, 1994), or the anger of being socially excluded or overlooked may trigger retaliation (Fischer & Roseman, 2007).

# **III.C PHYSIOLOGY**

Researchers have also begun to explore how our internal physical systems and outward physical interaction with the world affect our behavior. Behavioral endocrinology and research on embodied cognition offer many insights into our moral behavior from this perspective.

**Behavioral endocrinology.** Racing heartbeats, sweaty palms. Driven by the hormonal reactions of our endocrine system, these automatic physiological responses to the information our sensory or perceptual processes receive from our environments, and affect our behavior in turn (Nelson, 2005). Hormones help to regulate our behavior by sending signals about what type of situation we are encountering: cortisol is released in response to stress, adrenaline as a function of excitement, testosterone is associated with aggression and competition, and oxytocin with trust and affiliation. Each direct our behavior in several ways beyond our conscious awareness.

Of the hormones we list above, testosterone has been studied most thoroughly as an antecedent to potentially worrisome behaviors. Testosterone levels are associated with status (Mehta & Josephs, 2006) and dominance (Mazur & Booth, 1998), and high levels of testosterone are associated with criminal behavior (Dabbs, Carr, Frady, & Riad, 1995; Dabbs & Morris, 1990). This dangerous consequence of high base rates of testosterone appears to be a function of how this hormone affects how we perceive others. Testosterone lowers our ability to perceive others' thoughts and feelings accurately (Ronay & Carney, 2013), and is associated with an increased likelihood of perceiving others as a mean to an end—perhaps as a function of the diminished emotional responsiveness associated with high testosterone levels (Carney & Mason, 2010). Testosterone also varies over the course of the day and in response to one's contexts. In a study of financial traders, earning more profits over the course of the day immediately increased the bankers' testosterone levels (Coates & Herbert, 2008). Winning in competitions also increases testosterone levels (Mazur & Booth, 1998), particularly for individuals who are

motivated towards the exercise of power for personal gain rather than for prosocial ends (Schultheiss, Campbell, & McClelland, 1999). If testosterone increases as a function of earning more money over the course of a day, and higher rates of testosterone lead one to perceive others as a means to an end, one can easily speculate about a vicious cycle wherein success achieved through morally problematic means leads to higher testosterone levels, which makes one more effective in using the morally problematic means to achieve greater success.

Cortisol, a hormone released in response to stress, is associated with the fight or flight response, and is associated with the experience of risk (Coates, Gurnell, & Sarnyai, 2010). Cortisol can usefully direct our behavior, as it helps focus attention in the short term, to ensure we manage the immediate risks in our environment, but chronic high levels of cortisol distort our perception of risk and can lead to generalized risk-aversion (McEwen, 1998). Relatedly, psychopaths have a depressed response to cortisol: they do not feel the stress of risk-taking the same way as others (Blair et al., 2005).

Physiological responses can affect our ethical behavior even when they are manipulated. Gu and his colleagues found that providing participants with false heart rate feedback could affect both prosocial and unethical behavior: when individuals listened to a fast heart beat (thinking it was their own), they were more likely to volunteer for a good cause and less likely to deceive another (Gu, Zhong, & Page-Gould, 2013). The authors argue that being made aware of physiological stress responses—even false ones—improves individuals' behavior as they make an effort to decrease their presumed stress levels.

However, it would be premature to conclude that responses to physiological experiences of stress are universally beneficial for moral behavior. The experience of anxiety and threat is stressful, and both have been linked to increases in unethical behavior (Fast & Chen, 2009; Kouchaki & Desai, in press). It may be that the relationship between stress responses and

unethical behavior depends on whether the potential behavior would alleviate or exacerbate the stress response. Lying is stressful (Wang, Spezio, & Camerer, 2010; Zuckerman, DePaulo, & Rosenthal, 1981), so physiological experiences of stress may decrease lying, but failure is stressful as well, and thus experiencing failure may lead to unethical behavior to help one avoid experiencing the stress of another failure (Kouchaki & Desai, in press; Wakeman, Moore, & Gino, 2014).

The common thread across these studies is that our behavioral reactions to stress will lead to actions designed to reduce the stress, regardless of whether those actions are moral or immoral. Similarly, high levels of risk tolerance (associated with high testosterone levels or dampened responses to cortisol) does not mean that a person *will* engage in unethical behavior, but behaving unethically often involves risk of some sort—risks associated with getting caught, penalized, or embarrassed or shamed by others. Thus, hormones associated with increased risk-tolerance, even if they haven't been linked with ethical behavior directly, will likely play a role in regulating our moral behavior.

In contrast to stress-related physiological reactions, oxytocin—released during labor, lactation, and sexual intimacy—is a hormone associated with decreased anxiety and fear, as well as increased trust (Kosfeld, Heinrichs, Zak, Fischbacher, & Fehr, 2005; Mikolajczak et al., 2010; Van Ijzendoorn & Bakermans-Kranenburg, 2012). Oxytocin's positive effects on social interaction lead it to be described as the "love hormone" (Alleyne, 2010), though its positive effects appear limited to in-groups (Van Ijzendoorn & Bakermans-Kranenburg, 2012). In fact, experimentally administered oxytocin decreases dishonesty in the service of one's group, suggesting that our bodies' natural response to oxytocin has prepared us to support the people we care about, even if that means lying to protect their interests (Shalvi & De Dreu, 2014). Its positive effects appear to be due in part to its effect on how well we recognize emotions in others,

demonstrating a connection between affect and physiology (Bartz, Zaki, Bolger, & Ochsner, 2011; Guastella et al., 2010).

*Embodied cognition.* A second line of research has explored how our physical presence in the world affects our behavior. Our actions are all mediated by our bodies' interactions with our environments, and as such, the way in which we physically interact with the world may affect our behavior. Expansive postures, such as standing tall with arms outstretched, are associated with power (Carney, Hall, & LeBeau, 2005), and enacting these postures lead to heightened action tendencies, commensurate with feeling more powerful (Huang, Galinsky, Gruenfeld, & Guillory, 2011). Though enacting physically powerful postures can have positive outcomes (such as in advance of a job interview, Cuddy, Wilmuth, & Carney, 2012), there is also evidence that the experience of power triggered by expansive postures can lead to rule-breaking and dishonest behavior (Yap, Wazlawek, Lucas, Cuddy, & Carney, 2013).

Another line of work that supports the ideas that our physical interaction with the world influences our ethical behavior is research on meditation. Meditation is a practice that requires physical expression: stillness, bodily awareness, and attention to and slowing of one's breathing. Though meditation has not been linked empirically to ethical behavior, mindfulness—a state meditation induces—is associated with lower levels of unethical behavior (Ruedy & Schweitzer, 2010). Relatedly, Caruso and Gino (2011) found that the physical act of closing one's eyes, a common element of meditation practices, facilitates mental simulation (a cognitive response), which heightens emotional responses to the prospective event (an affective response), in turn decreasing self-interested behaviors. These results underscore the synthetic nature of moral decision-making and behavior, with physical, cognitive, and emotional processes acting in tandem to determine behavioral outcomes.

The findings reviewed in this section point to how our unethical behavior is "rooted in evolved neurobiological circuitries" (Shalvi & De Dreu, 2014, p. 5503), heightening the importance of understanding how we respond somatically to the events around us. Together, these results propose that hormonal and physiological responses to our situations—whether automatic, instinctive, or manipulated, are key to understanding how and when we take risks, deceive others, or break rules. In addition, though some of these behaviors seem to be driven by basal hormone levels, our context can also elevate or dampen these hormonal levels or trigger physiological responses, leading to more or less adaptive responses to these cues.

As Hume famously claimed, each of us is a slave to our passions. Each of us is similarly a slave to our physiological responses. Though the organizational implications of this research may seem a stretch, one only needs think about the stress associated with highly pressured or competitive environments (Baumeister, 1984) to realize that the hormones that our contexts elicit will have important organizational consequences.

## II.D IDENTITY

Identity also represents an important element of how we approach moral choices. In a series of qualitative studies, political scientist Kristen Monroe explored the role that identity played in making decisions about how rescuers (versus bystanders) decided to participate (or avoid participating) in efforts to help Jews and other targeted groups escape the Holocaust. Her work describes how individuals' identities "short-circuit choice by limiting the options perceived as available, not just morally but empirically" (Monroe, 2001, p. 496). Identity acted as an equal constraint on behavioral choice for both rescuers and bystanders: rescuers saw themselves as having no option but to help ("But what else could I do? They were human beings in need.").

do? I was one person against the Nazis."). Both groups saw their decision set as being constrained, but rescuers' identities included an ability to exercise agency, and their categorization processes joined themselves with Jews under a common rubric of humanity, while bystanders' identities included an inability to exercise agency, and their categorization processes excluded Jews from the categories to which they saw themselves belonging. These different identity processes then led to opposite responses to the potential decision about whether or not to help, but they both allow individuals to feel that they are (1) behaving as morally as the situation permits, and (2) consistently with who they are.

The key difference between these two ways identity was exercised, besides the obvious differences in outcomes, involved the boundaries the rescuers and bystanders drew around their social groups. Once people see themselves as a member of a social category, they are more likely to believe that other individuals who fall within that category deserve equal treatment (Monroe, 2001). Thus, individuals attuned to their belonging in the category of "humanity" were more likely to view Jews as deserving as the same human rights as themselves, where individuals attuned to their belonging to the category of "German" could more easily justify excluding Jews from moral consideration.

Another way to think about identity is in terms of what we bring to each potential moral choice in terms of our character. A large body of research has examined the role of individual differences and how they influence our moral choices, including moral identity (Aquino & Reed, 2002), Machiavellianism (Fehr & Samsom, 1992), moral disengagement (Moore, Detert, Treviño, Baker, & Mayer, 2012), social value orientation (Reinders Folmer & De Cremer, 2012; van Dijk & De Cremer, 2006), and more recently, moral character—a more global understanding of a set of moral traits referring to "an individual's characteristic patterns of thought, emotion, and behavior associated with moral/ethical and immoral/unethical behavior" (Cohen, Panter,

Turan, Morse, & Kim, in press). Each of these individual differences account for some of the variance in our moral behavior, because they represent important aspects of who we are and how we interact with the world. These individual differences also often moderate our behaviors, so that individuals who are high on "moral traits" (moral identity, moral character, pro-socially oriented individuals) are more susceptible to positive moral influences (Aquino, McFerran, & Laven, 2011) and more immune to more immoral ones (Gino, Schweitzer, Mead, & Ariely, 2011), while the opposite is true for those high on "immoral" ones (moral disengagement, Machiavellianism).

However, in order for these aspects of our identity to influence our behavior, they need to be present in our working self-concept (Markus & Kunda, 1986; Perugini, Conner, & O'Gorman, 2011). When identities are extremely important to us, they can be chronically active in our self-concept; other identities are made more or less salient as a function of our context. Research has shown that activating moral aspects of one's self-concept will increase the likelihood that we will act morally (Aquino, Freeman, Reed, Lim, & Felps, 2009). Yet, using a sample of financial industry professionals, another recent paper has shown that making one's identity as a banker salient will increase the extent to which one is dishonest in order to secure personal gains (Cohn, Fehr, & Marechal, 2014). In sum, our identities also play an important role in our moral behavior, in a way that does not require conscious deliberation. How they affect our moral behavior depends on what those identities are, how important they are to us, and whether our context has made them salient (activated in our working self-concept).

#### **II.E WHAT PLACE DELIBERATION?**

Is there any place left for rational deliberation in this array of non-conscious influences?

Certainly. In fact, even Hume, the poster child for the supremacy of our passions in morality.

writes that "reason must enter for a considerable share in all decisions" about "justice", or which require an evaluation of "their beneficial consequences to society and their possessor" (1751/1957, Appendix I). From a neurological perspective, Damasio's ultimate insight is not that non-conscious processes are in control of our decision making and choices, but that non-conscious processes provide the basis for effective rational thought (1994). Indeed, emotional and cognitive processes cannot be cleanly divided, as cognition is clearly involved in the experience of affect and affect in the experience of cognition (Cushman et al., 2010; Damasio, 1994).

The research on deliberation in moral judgment offers mixed conclusions. One line of work highlights how deliberation can be dangerous to ethical decision-making. Zhong and his colleagues conducted a series of experiments documenting that individuals make more selfinterested decisions when asked to think deliberatively compared to intuitively (2011), or primed with a calculative rather than a non-calculative (i.e. verbal) mindset (Wang, Zhong, & Murnighan, 2014). However, these results are somewhat contradicted by another line of work that argues that asking people to contemplate or converse with others in advance of making a moral decision improves it (Gunia, Wang, Huang, Wang, & Murnighan, 2012). Even simply providing participants with more time in advance of making a moral decision appears to improve it, an effect that the authors associate with the higher likelihood that the participants consciously deliberated about their choices prior to acting (Shalvi, Eldar, & Bereby-Meyer, 2012). A third contribution suggests that both too little and too much deliberation may undermine moral decision-making. After both measuring and manipulating the level of cognitive complexity participants applied while deliberating about a moral decision, these authors found self-interested behavior was lowest when individuals deliberated at moderate levels of complexity about it, neither too much (which could pave the way for rationalizations) nor too little (which could facilitate knee-jerk self-interested choices) (Moore & Tenbrunsel, 2014).

This work all used different manipulations of deliberation, which would, of course, affect the outcomes. However, even taking this factor into account, this work does permit the following conclusions: (1) deliberation is, at least under certain circumstances, used actively in advance of making a moral decision, and (2) can influence how moral the outcome is. Whether deliberation is used in moral judgments is, in part, a function of the novelty of the circumstance one is called upon to evaluate. As Pizarro and Bloom (2003) discuss, deliberation will be more likely the first time a person is asked about the morality of stem cell research than the tenth time they are asked about it. By the tenth time, one's learned response to having thought about the issue previously means that one's judgment about it will surface more intuitively.

Whether deliberation helps or harms moral outcomes may also be a function of the content of the decision at hand. There is decent evidence that some types of decisions explicitly trigger deliberation. For example, the original study on moral dumbfounding (Haidt et al., 2000) found that individuals *did* use reason before deciding on their response to the Heinz dilemma—a story originally developed by Kohlberg (1969) that requires respondents to evaluate the whether a man should steal a drug to save his dying wife. Deciding on the appropriate action in this case demands that we explicitly balance the needs of the wife with the property rights of the pharmacist. This dilemma elicits a much different response than evaluating incest between siblings, which triggers an immediate morally repugnant reaction (Borg, Lieberman, & Kiehl, 2008), or evaluating whether you deserve more than an equal share of a bonus or endowment, which elicit strong self-serving biases that one rarely reasons against (Epley & Caruso, 2004).

It is perhaps most accurate to say that deliberation plays a larger role in moral judgment when intuitive, affective, physiological, or identity-based concerns do not immediately form an un-deliberated but strongly held view for us. The best way to explain this is to refer back to the key findings from the research that uses the trolley problem. Iterations of the trolley dilemma that

trigger heightened emotional responses, such as the footbridge dilemma, tend to elicit immediate, principle-based judgments (Greene et al., 2008; Greene et al., 2004). In contrast, iterations of the trolley dilemma where saving the five people can be accomplished more indirectly, such as the switch dilemma, do not activate affective responses as immediately, and do appear to activate more cognitive processing and more consequentialist judgments (Greene et al., 2001).

One of the ultimate ironies of contemporary neuroscience is the revelation that Kantian or deontological (principle-based) approaches to moral decision making occur more automatically than do utilitarian (consequentialist) ones. It seems that forecasting potential consequences and weighing the costs and benefits of those alternatives require more advanced cognitive processing than applying a universal value to a particular context. It turns out that arriving at Kantian solutions is more intuitive than deliberative. It makes one wonder if Kant himself may be turning over in his grave. Regardless, this work also confirms an important role for deliberation in moral behavior, at least for certain types of decisions or dilemmas.

#### III A NEW FRAMEWORK

We now offer a framework for understanding moral behavior that focuses on how individuals *approach* the decision, whether they have the *ability* to enact their intention in the moment, and how the behavior is understood in its immediate *aftermath*. This framework builds on what we know about the synthetic role of both deliberative and non-deliberative processes in moral choice, and represents a different take on the stage-based rationalist frameworks that have dominated ethical decision-making models to date, such as Rest's (1986), in ways that we have already discussed.

Our framework also differs from the one offered by Tenbrunsel and colleagues (2010), which is focused on more temporally distant elements of behavior, including forecasting

or prediction (which potentially happens a good deal in advance of the behavior) and recollection (which potentially happens a good deal after the behavior). Tenbrunsel and colleagues focus on how a perspective that takes temporality into account links nicely with the want/should theoretical framework (Bazerman, Tenbrunsel, & Wade-Benzoni, 1998) to explain why we predict and recollect that we are so much more ethical than we, in fact, are. We tap in a similar way what happens in advance of, during, and after an agent acts, but our model is more temporally constrained, explaining how we construe a decision immediately prior to acting, whether we can behave consistently with our intent, and how we then encode our behavior in our memory, which then affects how we will approach a similar decision in future.

#### III.A APPROACH

The model begins with considering how individuals construe a potential choice. We call this the *approach* to an ethical decision. While this approach includes an individual's awareness of the moral content of the decision, it is broader than awareness per se. Awareness is often treated as binary: if an individual is aware that the potential choice has moral implications, then one set of processes follow, but if they lack this awareness, than a different future awaits. Whether individual is aware of a decision's moral implications is often treated as an individual difference, in that individuals can be more or less attuned to the moral implications of their behavior (Reynolds, 2008). Though we concede that individuals differ in the extent to which they are sensitive to the moral implications of the choices they make, the process of approaching a potential moral decision is also substantially affected by all the ways in which our capacity for rational decision making is bounded (Kahneman, 2003a, 2003b; Simon, 1982), as well as the ways in which our attention is directed by our contexts (Ocasio, 2010; Simon, 1947). It is this aspect of our approach to a decision that we focus on here.

Imagine you are a banker involved in the sale of a toxic asset to unwitting clients, as was Goldman Sachs Vice President Fabrice Tourre in 2007 (Securities and Exchange Commission, 2012). At the request of hedge fund investor John Paulson (a major client), you have structured an investment, written marketing materials, and developed an offering memorandum for a collateralized debt obligation that Paulson is explicitly betting against. In fact, specific investments that are expected to fail have been included in the portfolio, to ensure that Paulson profits from the transaction. This aspect of the deal is kept intentionally opaque from potential investors, and you have worked with third parties to create the appearance that reputable experts had vetted the portfolio's contents. When the deal closes, Goldman Sachs earns \$15 million for its efforts, Tourre earns \$2 million, and Paulson profits to the tune of \$1 billion, the same amount lost by the investors in the toxic asset.

Was Tourre tortured by his involvement in this deal, which required intentional misrepresentation of the fiscal health of the security to every party considering investing in it? In one email, Tourre describes his involvement in these terms:

"Anyway, not feeling too guilty about this, the real purpose of my job is to make capital markets more efficient and ultimately provide the US consumer with more efficient ways to leverage and finance himself, so there is a humble, noble and ethical reason for my job;) amazing how good I am in convincing myself!!!" (email from Fabrice Tourre, dated January 23, 2007, reprinted in Goldman Sachs, 2013).

One explanation for this email is that Tourre is profoundly cynical. However, one can also see motivated reasoning on his part to construct a narrative about his involvement that supported his ability to successfully market this fund, construing his involvement as a positive contribution, not only to the firm, but to society as well. Approaching his involvement in this way allowed him to participate in the deal with a clearer conscience.

It would be simple to construe Tourre's involvement as a blanket absence of moral awareness, but such a construal would neglect two key factors. First, the professional context within which Tourre was operating supported positive interpretations of his actions and constrained his attention to only those elements of the situation that would reinforce the legitimacy of those actions. Second, identity-based concerns—the deeply embedded need to believe that he is moral—motivated Tourre to articlate his role in the Abacus deal as useful and constructive. Yes, his awareness of the ethical implications of designing and marketing Abacus was limited, perhaps even nonexistent. However, his negligible moral awareness was not a generalized orientation to the world. Rather, his professional context and personal motivations directed and constrained the way he approached these decisions, such that any other course of action would have seemed less appropriate and certainly less viable.

Our context can direct our attention away from moral concerns. We have long known that attention drives much of human decision making (Ocasio, 2010; Simon, 1947). Due to our bounded cognitive capacities, it is necessary to limit the number of factors of a decision we focus on, and what about those aspects are particularly important. Though we approach most decisions thinking we understand the entire landscape of options, we actually approach decisions as if we are looking through a cardboard tube—seeing only what's visible down the pipe. Aspects of a decision that are peripheral to our primary objectives in a situation are easily neglected, and often not noticed at all. This phenomenon, termed "inattentional blindness" (Mack & Rock, 1998), was originally demonstrated in a series of studies that focused participants on how many times a ball is passed among a group of people. When focused on the ball-passing, participants typically fail to notice seemingly obvious intruders walking through the action—a woman carrying an umbrella (Neisser & Becklen, 1975), or a person in a gorilla suit (Simons & Chabris, 1999).

As an example of how our professional context can constrain our attention, Gioia writes about how Ford Motors based recall decisions on two criteria: whether the potential safety issue was occurring with high frequency, or whether it had a traceable cause. Focusing attention on these two criteria, as he was directed to do, Gioia missed the fact that the Pinto's safety concerns were serious, and often fatal. Though the field reports he was scanning clearly communicated that the car was likely to burst into flames upon low speed rear impact collisions, the "information they contained, which did not convey enough prototypical features *to capture my attention*, never got past my screening script" (Gioia, 1992, p. 386).

The amount we have on our plate also affects the attention we can direct towards moral decisions. When our bandwidth is subsumed by other activities, our attention to potential moral implications may be lost. For example, Chugh and her colleagues demonstrated that when individuals are cognitively busy, they are more likely to respond to situations using a dominant response (Chugh, Kern, & Kim, 2014), one's most strongly learned or practiced behavior (Zajonc & Sales, 1966). They test their hypotheses using a personality measure of honesty as an indicator of what an individual's dominant response would be, and found that consuming an individual's mental bandwidth by requiring them to attend to the number of times a recorded tone changed while participating in the experiment increased the likelihood that individuals who had scored low on the honesty measure would steal, and decreased the likelihood that individuals who had scored high on the honesty measure would do the same (Chugh, Kern, & Kim, 2014).

The way a potential course of action is framed determines our responses to it. Once our attention has been directed in a certain way, the way we approach an ethical decision is also affected by how the behavioral options we are considering are framed. There is a vast body of work on framing effects in decision making, and there is no need to repeat findings that have been reviewed extensively elsewhere (Kahneman & Tversky, 2000; Kühberger, 1998). What this

body of work tells us is that how we make decisions is affected by (1) the decision options presented to us, (2) whether the options entail risk or certainty, (3) how the options are characterized (i.e., whether a decision is framed as a personal or business decision), (4) what reference points are used in describing the options, (5) whether positive or negative attributes of the choice are made salient (i.e., labeling beef as 75% lean or 25% fat), (5) whether the outcomes are described in terms of losing or gaining something valued, (6) whether the outcomes are framed in terms of success or failure (i.e., survival vs. death rates) (Kühberger, 1998; Levin, Schneider, & Gaeth, 1998).

Fundamentally, how we construe our choices, in terms of both their attributes and outcomes, matters to the choice we make. Thus, framing effects can be understood more broadly than simple differences in the wording of behavioral options, to refer more globally to how our future behavior is construed (Goffman, 1974). Frames are both created for us by our context (goals, the presence of sanctions), and motivated by our desire to serve our own self-interest (Kramer & Messick, 1996). That is, we may apply different frames as a function of how our context encourages us to do so, or by our own motivated reasoning processes, through which we will impose frames on situations that facilitate the choices we want to make (Ditto et al., 2009; Uhlmann et al., 2009).

A surprisingly limited number of studies have specifically focused on framing effects in the moral domain. In one of the few to apply classic framing effects to the moral domain, Kern and Chugh found that the human tendency to avert losses triggered unethical behavior (2009). Specifically, they found that individuals were more likely to lie to avoid an outcome presented as a potential loss than they were to secure an outcome presented as a potential gain. One can easily think of ways that potential professional outcomes are framed as losses—failing to meet earnings expectations (Bartov, Givoly, & Hayn, 2002), or concerns over losing existing clients (Newberry,

Reckers, & Wyndelts, 1993). This should lead to worries about how situations like these, that are common in organizations, entail ethical risks. Another framing device that is widely used in organizational settings is goal setting. Goals create reference points (anchors) for actors that determine how they approach upcoming decisions. These anchors can inspire unethical behavior when they are unmet. In a now-classic study of the ethical consequences of goal-setting, Schweitzer and his colleagues found that when participants failed to meet a goal by a small margin, they were significantly more likely to lie about their performance to appear as if they had met it (Schweitzer, Ordóñez, & Douma, 2004). These two studies offer initial insight about how the framing of prospective actions can shift how we approach those choices, affecting the likelihood that we will respond unethically.

There are also clear findings that suggest we make more self-interested choices when choices are framed in terms of being an economic or business decision, compared to being framed as a different type of (non-business) decision. The first study to demonstrate this effect found that individuals cooperate less often in a social dilemma when their contribution was framed in terms of "investing in a joint investment fund" compared to when it was framed in terms of "contributing to a social event" (Pillutla & Chen, 1999). When we approach a decision framed in economic terms, alternative factors are shielded from view, and we project the costs and benefits of the imagined outcomes in financial terms. Alternatively, when we approach a decision framed in non-economic terms—as a social, personal, or ethical decision—then the projected costs and benefits will include other types of consequences more easily.

Later studies have examined contextual triggers of economic versus non-economic frames as a mechanism to explain unethical behavior. For example, Tenbrunsel and Messick (1999) found that the adding a weak sanction for non-compliance with an environmental regulation led to perceiving the choice to not comply as a purely business decision: if the potential fine was less

than the projected financial benefit of non-compliance, people would choose it. However, when there was no sanction for non-compliance, individuals instead viewed failing to comply with the regulation as a broken personal promise, making it a less attractive option. Similarly, Kouchaki and colleagues demonstrated that being primed to think about money leads individuals to adopt a business frame for decision making, leading to less ethical behavior (Kouchaki, Smith-Crowe, Brief, & Sousa, 2013)

We are driven by the narratives we create. Like frames, narratives are "socially negotiated constructs that organize people's thoughts and actions" (Quinn & Worline, 2008, p. 508; Ricœur, 1984), and the narratives that we construct then affect how we later behave. In their analysis of United Airlines Flight 93 on 9/11, Quinn and Worline (2008) describe the importance of the narrative that developed on the commandeered plane to the passengers' decision to try to take down the hijackers. Particularly in novel or stressful circumstances, constructing a narrative helps individuals understand (1) what is happening, (2) their role within the developing story, and (3) the appropriate action for them to take in that story. In the case of Flight 93, the resources that individuals were able to draw on—phoning loved ones for affirmation and emotional support, for example—allowed the passengers to construct a shared narrative directing them towards courageous collective action: attempting to take down the hijackers before the plane could cause any more serious harm to others.

However, one can also see how Fabrice Tourre's narrative was constructed, leading to a much more morally problematic outcome. He saw himself as an agent matching buyers and sellers a market. His narrative required him to close the Abacus deal, which it did on April 26, 2007. Everything else was secondary to this narrative playing out. This narrative did not encourage him to think about whether the rules of this game were fair, or the part he was playing in causing massive financial losses for the fund's investors. In a context where every transaction

has a winner and a loser, that there are losers becomes part of the narrative. The specifics of any particular winner or loser fade to the background, even for those, like Tourre, who intentionally facilitated losses among "investors [who had] neither the analytical tools nor the institutional framework to take action before [suffering the] losses" (Securities and Exchange Commission, 2012). These two disparate examples showcase how the way we construct the narratives that organize our thoughts and actions shape and constrain our later actions. Once in a plot, we will drive it to the end of the story. It is easier for us to remain consistent with the narrative we have developed than to switch it midgear. This leads Kramer and Messick to call individual decision makers "intuitive lawyers, passionately advancing and defending the claims of their client, the self" (1996, p. 60).

In advance of ethical behavior, both our context and our own self-interested biases affect how we approach that decision. When that approach facilitates neglect of the ethical components of the decision, allows us to ignore them, or over-focuses us on other aspects of the choice, we become much more likely to enact the wrong behavior. However, while we often allow our circumstances to create our narratives for us, we also can play an active role in creating our own. Framing effects can be thought of as scaffolding that structure and constrain how we see the choices in front of us (forming our narratives for us). However, as Quinn and Worline's work suggests (2008), we also have the potential to actively construct new narrative for our situations, paving the way for more morally honorable action.

In sum, the ways that we approach our decisions with moral import will determine our ultimate behavioral responses. First, the way our attention is directed in advance of making a decision will affect how we perceive the options available to us. Second, the way in which the options that we are deciding between are construed will affect our ultimate choices. Finally, we

will approach situations that we have encountered previously similarly to how we responded during those previous encounters.

## **III.B ABILITY**

The second part of the model involves whether the individual actually enacts the moral choice in the moment. Even with the best approach to a prospective behavior, we are all susceptible to behaving badly on occasion. When actually confronting the need to enact ethical behavior, are we able to follow through? Our knowledge of what happens at this point in the process has expanded more in the last decade than any other. Failing to behave ethically in the moment has a number of triggers, many of which involve the non-deliberative processes that can dominate our behavior. Specifically, we can fail to behave ethically because (1) our inherent drive towards self-serving behavior overwhelms us, (2) our ability to resist temptations has been exhausted, (3) visceral responses misdirect us, away from consciously preferred courses of action.

We are driven to serve our own interests without conscious awareness we are doing so.

Ultimately, we all want what's best for us. Though we may show restraint because we realize an action we would prefer to enact is not what we ought to do, ultimately, we'd prefer to act in a self-interested way. Robust results confirm many ways in which we are drawn to treat ourselves favorably, even though, when asked about what would be fair, we report much different behavior. People will pay themselves more for the same amount of work (Messick & Sentis, 1983), and divide bonus pools favorably for themselves (Diekmann, Samuels, Ross, & Bazerman, 1997). Moreover, as they make these self-interested choices, they feel completely justified, and report afterwards that their decisions were completely fair. A number of other studies confirm that we will exploit opportunities to behave self-interestedly, particularly when circumstances allow the

objective nature of these outcomes to be hidden from ourselves as well as from others (Dana, Weber, & Kuang, 2007; Shalvi, Dana, Handgraaf, & De Dreu, 2011).

One way to think about this tendency is as a human predisposition towards moral hypocrisy: the desire to appear moral without being so. In a series of studies examining this phenomenon, Batson and his colleagues showed that individuals consistently assign themselves the more appealing of two tasks (Batson et al., 1997). This natural inclination to treat ourselves preferentially is particularly likely when there are available opportunities to rationalize our selfserving behavior. For example, in Batson's moral hypocrisy studies, individuals became *more* likely to assign themselves a better task after being given a coin and informed that previous subjects had reported that assigning tasks via coin toss was the most moral way to decide (Batson et al., 1997). Choosing to toss the coin permitted serving one's self-interest in the task allocation while maintaining the appearance of impartiality: 90% of participants who tossed the coin to make their decision allocated themselves the better task, a far cry from the 50% that would have been the result of honest reporting of the coin tosses. While it is unclear whether the participants were consciously aware that they were manipulating the outcome of the coin toss (say, by deciding what heads and tails meant after they saw the coin), it is clear that the presence of an available justification increased self-serving outcomes.

Our ability to resist temptations is exhaustible. One of the most robust findings to emerge from the past decade is that our ability to resist temptations to behave unethically is an limited resource. Consistent with other findings that we are less able to self-regulate when our decision making capacities have been exhausted by prior tasks (Schmeichel, 2007), our ability to be ethical also seems to be a finite capacity. Our exercise of self-control is partly determined by the extent to which it has been undermined or bolstered by immediately preceding activities. It is relatively easy to exhaust executive control after individuals have focused on a task, inhibited a

natural response, or used up working memory by having to keep multiple other things in mind (Schmeichel, 2007). In one of the first studies to specifically examine the role of limited self-regulatory resources on our ability to behave ethically, Mead and colleagues showed that individuals who had been cognitively depleted by prior challenging tasks were more likely to cheat, as well as more likely to expose themselves to cheating opportunities (Mead, Baumeister, Gino, Schweitzer, & Ariely, 2009). A growing body of work now supports, from different perspectives, this fundamental proposition: despite our approach to a moral decision, our ability to actually behave ethically when we are called to can be compromised through mental, physical, or emotional exhaustion.

For example, lack of sleep compromises our ability to respond effectively to moral dilemmas. This was first studied using volunteers who had not slept for 53 hours, with researchers finding that sleep deprivation undermines our ability to judge the appropriateness of actions, particularly those that depend on effective emotional responding (Killgore et al., 2007). This work provided an interesting test of Damasio's (1994) somatic marker hypothesis: sleep-deprived participants were had less access to the "gut level" feelings that typically guide us towards appropriate responses. Even trivial levels of sleep deprivation seem to compromise our ability to respond effectively to morally charged situations. Low sleep levels (fewer than one's average minutes of sleep in a night), poor sleep quality and poor perceived quality of sleep all compromise our ability to see moral implications in our actions, and our ability to refrain from cheating or unethical workplace behavior (Barnes, Gunia, & Wagner, 2014; Barnes, Schaubroeck, Huth, & Ghumman, 2011).

The role of physical exhaustion in moral decision-making can also involve time of day or hunger. For example, in a study of experienced Israeli judges, parole decisions were favorable to the defendant 65% of the time at the beginning of the day or after lunch, but dropped to almost

zero towards the end of a session, even though the order in which cases were heard was random (Danziger, Levav, & Avnaim-Pesso, 2011). Similarly, Kouchaki and Smith found consistent evidence that individuals were less likely to resist moral temptations in the morning than they were in the afternoon (2013). Another set of studies found that it is harder to resist moral temptations when we are hungry (Gailliot et al., 2007). Even manipulating the perception that we are replenishing ourselves seems to support our ability to self-control (Molden et al., 2012).

These findings are particularly problematic in light of findings that an inability to exercise self-control can be socially contagious (vanDellen, 2008), particularly via others whom we perceive to be socially similar to ourselves (Gino, Gu, & Zhong, 2009). It means that our ability to behave ethically will depend not only on whether we have access to the internal resources we need to manifest desired behavior, but also that we need to be in a social context that does not grant us permission or social license to misbehave. Overall, they identify a contextual factor far removed from our ability to deliberate that has an important effect on whether we can be called on to follow through with moral action when the time arrives to do so.

Visceral responses misdirect us. One model that has been used to describe how visceral responses misdirect us is the want/should framework (Bazerman et al., 1998; Tenbrunsel et al., 2010). Like Odysseus, who knew that he would want to stay with the Sirens even though he knew he shouldn't, the behaviors we want to enact often conflict with those we realize we should. This conflict often translates into a battle between hedonic desires and normatively appropriate and prescribed behaviors. The want self is often reflected in emotional/affective/impulsive preferences, which duke it out with rational/cognitive/thoughtful preferences, which are more likely clear-headed and aware of what we "ought" to do. This distinction between the "want" and "should" selves is consistent with other work arguing that much of human behavior is driven by visceral ("want") responses that contravene our long term self-interest ("should") (Loewenstein,

1996). Enacting a wanted desire over an action we know we should undertake is one way to characterize unethical behavior.

As much research has demonstrated, we tend to act consistently with our "want" self when the action confronting us is temporally proximal, and more likely to claim that we will act consistently with our "should self" when the potential action is temporally distal (Milkman, Rogers, & Bazerman, 2008; Wertenbroch, 1998). It is easier to claim we will be ethical than to actually be ethical at the time, when other priorities can dominate. For example, in a now classic study of whether victims of harassment speak up, Woodzicka and LaFrance (2002) found that while nearly everyone they surveyed reported they *would* take action when confronted with sexual harassment in a job interview, half of participants did nothing when they were actually harassed. They explained their failure to act as driven by fear, a visceral emotional response that was underappreciated when the moment was more distal.

Another way in which different forces overwhelm our better selves in the moment is by triggering a desire to meet instrumental needs. Kivetz and Tyler (2007) write about the temporal triggers of idealistic and instrumental selves. Consistent with the want/should framework, when individuals are considering temporally distal perspectives, they are more likely to activate their ideal self, which "places core ingredients of the self above pragmatic considerations" (2007, p. 196). However, when asked to take a temporally proximal perspective, individuals' pragmatic self—the aspect of one's identity driven by more immediate, instrumental concerns—is activated. While it is attractive to make choices that are consistent with one's ideal self, when the temporal proximity of the choice looms large before us, we can become overwhelmed by the desire to ensure that instrumental needs are met first.

Our predisposition to interpret available evidence egocentrically means that in the middle of unethical acts, we will find a way to make our actions completely defensible. This will likely

be true regardless of whether the morally problematic choice involves action, such as selfishly giving ourselves the best task, or inaction, such as failing to help someone else in distress. Of course, the way in which we make our choices morally innocuous will differ across these different types of behaviors. In both cases, we will find a way to avoid thinking about our role in and responsibility for the outcome. However, in cases where we are actively harming or being unfair, such as in the hypocrisy experiments, we will focus on how we were entitled to do what we did, such as finding a way to believe that the coin toss turned out in our favor.

In the case of inaction, our internal justifications will likely be driven by fear of the consequences of action (Kish-Gephart et al., 2009), or driven by social pressures that drive us to conform to what we perceive the majority doing (as we see in the bystander literature, such as in Latané & Rodin, 1969). Certainly, there are some cases when individuals engage in behavior they believe to be wrong—indeed, sometimes the awareness that the act is wrong may even be part of the appeal (Katz, 1988). However, typically, by the time it actually comes to acting, either we believe that our action is completely justified, or we are simply too depleted or too afraid to do anything else.

## **III.C AFTERMATH**

Finally, our proposed model focuses on the psychological ramifications of our behavior. Since it is so important to most people to think of themselves as highly ethical (Monin, 2007; Tyson, 1990), unethical behavior needs to be coded into memory as consistent with that self-image. This is often less challenging than one might think, as individuals are largely able to construe potential wrongdoing as morally unproblematic before engaging in it, or, in the moment, find ways to use the local context (the presence of a coin for a coin toss, for example) to facilitate self-serving behavior without having to code it as such. Thus, after much unethical behavior, the

action is coded into memory without issue, because it was construed as morally unproblematic by the time that it was undertaken. Unethical behavior that is still conceptualized as such will elicit different psychological consequences, including moral disengagement and motivated forgetting. Both of these reactions to having engaged in unethical behavior will then also play back in a feedback loop into how any future decision with moral import is approached, paving the way for moral deterioration and the normalization of unethical practices in future (Ashforth & Anand, 2003; Gino & Bazerman, 2009).

Individual consequences of unethical behavior. How one cognitively construes unethical behavior in its aftermath depends first on whether the behavior was engaged in with a continued awareness that the behavior was unethical. It is likely that one continues to regard only a minority of unethical behavior as being unethical throughout the whole process, from approach through enactment and aftermath. Typically the behavior would have been reconstrued before it was engaged in, or in the moment we would have found ways to construct a reasonable justification for behaving poorly (thinking the misconduct was a one-off because we were tired or scared, for example). However, without neutralizing the unethical behavior at either one of these stages, other cognitive consequences will ensue.

Since it is important for most of us to think of ourselves as moral individuals (Aquino & Reed, 2002), consciously engaging in unethical behavior will trigger cognitive dissonance (Festinger, 1957), a psychological tension caused when one's beliefs ("I am a moral person") are inconsistent with one's actions (unethical behavior). As countless studies show, this dissonance requires resolution, either through changing one's actions to better align with one's beliefs, or changing one's beliefs to better align with one's actions (see Cooper, 2007, for a review). Having engaged in an unethical act, there are two options for how to reduce the dissonance it will elicit: either we can engage in redemptive behavior, such as seeking forgiveness or making amends,

reducing dissonance through an additional (mitigating) behavior, or we can change our understanding of the act to neutralize its dissonance triggering effects.

Traditionally, the more common view is that engaging in unethical behavior triggers guilt, a moral emotion that often triggers remedial behavioral responses (Baumeister, Stillwell, & Heatherton, 1995; Massi, 2005; Tangney, Wagner, Hill-Barlow, Marschall, & Gramzow, 1996). Even in light of this research, there are surprisingly few studies examining how affective reactions to behavior at one time influences future moral choices. One recent study used a multiround dictator game to look at how individuals affective responses to feedback from subordinates shaped the generosity of their future behavior (Oc, Bashshur, & Moore, in press). The authors found that individuals were less likely to make selfish allocations (take more for themselves) in a later decision, *if* they had received feedback that their prior behavior had been unfair. They also found that this positive shift in behavior was mediated by guilt. Thus, engaging in positive, remedial action after feeling guilt is certainly one route that individuals can take to reduce cognitive dissonance in the aftermath of unethical behavior.

Alternatively, one can also simply avoid thinking of one's actions as immoral, and, consistent with attitude change as a route through which to reduce dissonance, can morally disengage from the behavior. Techniques consistent with moral disengagement—that is, cognitively reconstruing our understanding of our actions, to dampen how serious we understand the act to be or to minimize how harmful we believe it to be—are common after engaging in unethical behavior (Bandura, 1990). For example, denial of responsibility (Gosling, Denizeau, & Oberlé, 2006), trivialization (Simon, Greenberg, & Brehm, 1995), and techniques to neutralize one's understanding of the harm one has caused (Aquino & Becker, 2005; Dabney, 1995) are all consequents of unethical behavior. These techniques help to shift in one's attitudes about a behavior one has engaged in, reducing cognitive dissonance and allowing one to continue to

believe one is moral, without actually having been so. Related to this, an emerging body of work on motivated forgetting focuses on how engaging in unethical actions can trigger specific flaws in memory, so that we can't recall the moral rules that we have just contravened (Shu & Gino, 2012; Shu, Gino, & Bazerman, 2011a, 2011b).

Much of what happens in the aftermath of unethical behavior involves reintegrating how we understand ourselves so that we can maintain a positive self-view. This motivated understanding of ourselves as moral (even in the absence of behavioral evidence to support this self-view) extends to our later recall ability as well. For example, individuals recall more unfair behaviors when part of phrases that begin with the word "they" than unfair behaviors that begin with the word "I" (Liebrand, Messick, & Wolters, 1986). Our fundamental need to maintain a positive self-view as moral individuals is thus implicated in every stage of moral behavior, from how we construct our approach to a potential moral act to how we later encode it in memory. The positive spin that we put on our actions after they occur plays into how our future approaches to new ethical choices are construed. It is not hard to extrapolate from here how easy it is to slide down a slippery slope, shifting our moral barometer to allow for greater moral contraventions over time (Gino & Bazerman, 2007).

## IV DIRECTIONS FOR FUTURE RESEARCH

In this chapter we have overviewed the recent literature in moral psychology and cognitive neuroscience as it relates to how and why we make the moral choices we do, outlines the main processes underlying moral action, and discussed how they play into the way that individuals approach, enact, and encode unethical behavior. In this final section, we discuss the directions for future research that we believe would help move the field forward, particularly in terms of organizational research on ethics.

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*More integrated work.* At the risk of stating the obvious, researchers need to find ways to integrate across these bodies of knowledge, using new findings from other disciplines to advance knowledge in our own. Schminke (2010) identified three main barriers to such cross-disciplinary integration. The first barrier is fear. Scholars in a given discipline, he argues, feel most comfortable working within their own disciplinary boundaries, and may feel threatened by the different methodologies or philosophies of science that underpin other discoveries. The second barrier is differences in purpose. Scholars in different fields are often trying to answer fundamentally different research questions, which means that what is most important to one group of researchers is simply not a priority for others. Finally, scholars' backgrounds represent a third barrier to integration. Such backgrounds usually come with different language and theories. which often create confusion and ambiguity rather than an enthusiasm to learn from each other. And yet, we believe, integrated work is not only possible but could also be very beneficial to ethics work. This will involve bringing the organization and organizational concerns to bear on work from fields where the concerns of managers and contextual factors that organizations provide have not been relevant. To do so will require both persistence and creativity on the part of researchers.

In this contribution, we have made a preliminary effort at integration for the field of organizational ethics—showing how recent findings from moral psychology and cognitive neuroscience speak to many of the issues that have been foundational concerns for business ethics scholars for several decades. However, the time is ripe for additional efforts. As the behavioral economists Herbert Gintis, Ernest Fehr, and colleagues write, "While the twentieth century was an era of increased specialization, the twenty-first may well turn out to be an era of trans-disciplinary synthesis" (Gintis et al., 2005, p. 4). We hope this is true, even with the

substantial institutional incentives that work against interdisciplinary research (Knights & Willmott, 1997).

Of particular interest here is more work focused on how elements of our organizational context trigger the processes we described in the second section of this chapter (intuitive, affective, physiological, identity-based, and deliberative processes), leading to more or less effective approaches to our moral decisions, our ability to enact them in the moment, and the way in which the aftermath of those experiences play into how we approach future decisions. For instance, it could well be the case that some organizational contexts facilitate self-interested approaches to moral decisions through the potential for promotion or monetary rewards. A lengthy tenure in such an organization might, over time, educate our moral intuitions in a dangerous direction. This certainly seems to have been the case with the recent study of bankers, who became more selfish in an experimental game when their identities as bankers were made salient (Cohn et al., 2014).

More creative designs. Future research would also benefit from more mixed-method studies, particularly studies that partner the external validity of field research with the ability to test causal relationships afforded by experimental research. Most comments on the importance of triangulating across different research methods refer either implicitly or explicitly to mixing quantitative and qualitative designs rather than mixing field based correlational or longitudinal research with lab-based experiments (e.g., Bansal & Corley, 2011; Jick, 1979). Though reviewers remain hesitant to endorse such work, we believe papers that mix field-based studies with experiments to better grasp causal mechanisms (e.g., Derfler-Rozin, Moore, & Staats, 2014; Gino & Pierce, 2010) will make a more substantial long-term impact on the field.

Another reason it is important to be creative (and why most studies of actual unethical *behavior* have remained in the lab) is that it is extremely difficult to access behavioral measures

of misconduct from within organizations. For a start, misconduct is hidden. In addition, organizational stakeholders do not always respond positively to the prospect of unearthing accurate measures of misconduct from within their own organizations—particularly for external researchers to use in empirical work—as do so increases their exposure to liability and risk. It also can be easier not to know about some of the more nefarious practices that occur within our organizations (Gellerman, 1986; Metzger, Dalton, & Hill, 1993). Stakeholders are also unlikely to approve field-based experiments in ethical domains, again for fear of legal risk or public exposure (though Greenberg, 1990 represents a good exception to this general rule). This makes determining causality of hypothesized effects difficult using field data alone, and brings us back to the importance of multi-method research in organizational ethics.

More research on eliciting positive change. We are not the first to stress the importance of finding and testing interventions that can help support more ethical behavior inside organizations (Bazerman & Gino, 2012; Bazerman & Tenbrunsel, 2011; Margolis, 2009; Zhang, Gino, & Bazerman, 2014). The dearth of research on interventions is a function of the same obstacles that undermines research on unethical outcomes in organizations: fear of exposure and risk of liability. However, many of the interventions tested in social psychological research provide creative and potentially subtle (and thus less threatening) ways to examine how to increase ethical behavior in organizations.

What work there is on interventions actually tracks the primary categories of affect, physiology, identity, and deliberation. For example, interventions that improve moral behavior through their influence over affective responses include work on how a positive mood can bolster our ability to resist temptation (Fedorikhin & Patrick, 2010), and how priming individuals to feel secure (rather than anxious) protects individuals from morally disengaging (Chugh, Kern, Zhu, & Lee, 2014). Interventions that improve moral behavior physiologically by supporting willpower

include recommendations to confront our toughest moral decisions when we are well-rested (Kouchaki & Smith, 2013) and well-fed (Gailliot et al., 2007). Reducing time pressure seems another clear way to improve ethical behavior. A number of studies have demonstrated how removing time pressure, or providing extra time to allow deliberation to occur, improves moral outcomes (Gunia et al., 2012; Kern & Chugh, 2009; Shalvi et al., 2012). For example, our tendency to engage in unethical behavior to avoid losses is eliminated when time pressure is removed (Kern & Chugh, 2009).

Identity-based interventions include those that help remind people that they are agents in their own narratives. Shu and colleagues (2012) conducted a field experiment at an automobile company and found that those who signed at the top of a mileage report form were more honest—they reported driving approximately ten percent more miles, on average, compared to those who signed an ethics code at the bottom of the insurance form. Signing at the top of the page activated one's identity in advance of deciding whether or not to be honest on the form, increasing honest responses. Their results suggest that making one's identity salient in a given context will increase the likelihood of ethical responses, even if it is not one's *moral* identity that is made salient. These findings echo earlier work that showed that the mere presence of a mirror in a room dampens unethical behavior through increasing self-awareness (Diener & Wallbom, 1976; Gibbons & Wicklund, 1982). It is so important for most of us to think of ourselves as moral that simply being reminded of our own agency in a situation may be enough to boost ethical behavior.

In terms of deliberation, we want to stress that the research indicates that it is more than just the complexity of our deliberation that matters. We need to deliberate in the right way, with the right additional inputs (in terms of how our intuitive responses are triggered, our emotions are responding, and which identities are salient), in order to make the right choices. Some of this will

be determined by the type of choice we face: our deliberative capacities are more effective in thinking through ethical dilemmas that do not tempt us with easy self-interested options and which do not trigger strong intuitive responses (Greene, 2013). Sometimes it will be about finding the time (Shalvi et al., 2012) and opportunity (Gunia et al., 2012) to think enough and appropriately about a decision. And sometimes it will be about creating the right structures or systems that will allow us to think in the right way (Derfler-Rozin et al., 2014; Moore & Tenbrunsel, 2014). For example, Derfler-Rozin and colleagues showed that creating task variety in one's work helped support deliberative thinking, bolstering employees' resistance to temptations to break rules and behave in self-interested ways (Derfler-Rozin et al., 2014).

Another interesting possibility to consider is how the composition of organizations might affect ethically charged behaviors. Coates suggests that since hormones can exaggerate unhealthy levels of risk-taking and risk-aversion among traders—leading to morally problematic behaviors such as rogue trading—financial institutions should be more cognizant of the age and sex composition of their trading floors (Coates et al., 2010), a workplace that is notoriously homogenous (in Coates and Herbert's 2008 study, only 4 of 260 traders at the organization were female). However, other evidence indicates that sex-based testosterone differences are partially responsible for self-selection into high-risk career choices such as financial trading (Sapienza, Zingales, & Maestripieri, 2009), representing an interesting obstacle to this type of structural change.

Concluding thoughts. Ultimately, we would be saddened if readers felt that the takeaway of this contribution was that moral behavior is largely outside our control. It is true that traditional models of ethical behavior such as Rest's four component model (1986) may have been overly optimistic about the conscious agency that we can impose over our moral choices. However, understanding the ways in which our moral behavior is driven synthetically by both

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deliberative and non-deliberative processes is also liberating, and leaves open many opportunities to influence individuals and organizations to be more ethical. Knowing that our intuitive responses to certain types of choices will be highly motivating means that we can be vigilant to them. Knowing that activating certain identities will improve behavior means that we can seek opportunities to heighten their salience in our daily lives, or within our organization. Sticking with an overly deliberative model leaves room for much error and ignorance. Knowing the multiple systems that work together to enact our moral behavior opens up many new paths for positive change.

Moral behavior is highly complex, requiring both deliberative and non-deliberative processes to be acting in concert. Only when these processes are working together in the right way can we overcome the many ways in which our approach to ethical decisions can be misdirected and our ability to enact the right behavior in the moment compromised. We need the time, energy, resources, and strategies available to help us overcome our natural tendencies to behaving in whatever way works best for us, while believing it's morally justifiable. As organizational scholars, it is our responsibility to understand what directs and drives individuals within organizations either towards or away from unethical behavior. Through overviewing current literature from psychology and cognitive neuroscience about the processes that underlie moral behavior, and offering a framework with which to understand how moral behavior is approached, enacted, and encoded, our hope is to encourage future works that starts from what we know now about how to behave better in future.

## REFERENCES

- Algoe, S. B., & Haidt, J. (2009). Witnessing excellence in action: The "other-praising" emotions of elevation, gratitude, and admiration. *Journal of Positive Psychology*, 4, 105-127.
- Alleyne, R. (2010, September 23). Oxytocin the love hormone could cure shyness. *The Telegraph*. Retrieved from:

  <a href="http://www.telegraph.co.uk/health/healthnews/8020464/Oxytocin-the-love-hormone-could-cure-shyness.html">http://www.telegraph.co.uk/health/healthnews/8020464/Oxytocin-the-love-hormone-could-cure-shyness.html</a>.
- Andrade, E. B., & Ariely, D. (2009). The enduring impact of transient emotions on decision making. *Organizational Behavior and Human Decision Processes*, 109, 1-8.
- Aquino, K., & Becker, T. E. (2005). Lying in negotiations: how individual and situational factors influence the use of neutralization strategies. *Journal of Organizational Behavior*, 26, 661-679.
- Aquino, K., Freeman, D., Reed, A., Lim, V. K. G., & Felps, W. (2009). Testing a social-cognitive model of moral behavior: The interactive influence of situations and moral identity centrality. *Journal of Personality and Social Psychology*, 97, 123-141.
- Aquino, K., McFerran, B., & Laven, M. (2011). Moral identity and the experience of moral elevation in response to acts of uncommon goodness. *Journal of Personality and Social Psychology*, 100, 703-718.
- Aquino, K., & Reed, A. (2002). The self-importance of moral identity. *Journal of Personality and Social Psychology*, 83, 1423-1440.
- Arendt, H. (1963/1994). Eichmann in Jerusalem: A report on the banality of evil. New York: Penguin.
- Ashforth, B. E., & Anand, V. (2003). The normalization of corruption in organizations. *Research in Organizational Behavior*, 25, 1-52.
- Baker, W. E., & Faulkner, R. R. (1993). The social organization of conspiracy: Illegal networks in the heavy electrical equipment industry. *American Sociological Review*, *58*, 837-860.
- Bandura, A. (1990). Selective activation and disengagement of moral control. *Journal of Social Issues*, 46, 27-46.
- Bansal, P., & Corley, K. (2011). The Coming of Age for Qualitative Research: Embracing the Diversity of Qualitative Methods. *Academy of Management Journal*, *54*, 233-237.
- Bargh, J. A., & Chartrand, T. L. (1999). The unbearable automaticity of being. *American Psychologist*, *54*, 462-479.
- Barnes, C. M., Gunia, B. C., & Wagner, D. T. (2014). Sleep and moral awareness. *Journal of Sleep Research*.
- Barnes, C. M., Schaubroeck, J., Huth, M., & Ghumman, S. (2011). Lack of sleep and unethical conduct. *Organizational Behavior and Human Decision Processes*, 115, 169-180.
- Bartov, E., Givoly, D., & Hayn, C. (2002). The rewards to meeting or beating earnings expectations. *Journal of Accounting and Economics*, 33, 173-204.
- Bartz, J. A., Zaki, J., Bolger, N., & Ochsner, K. N. (2011). Social effects of oxytocin in humans: context and person matter. *Trends in Cognitive Sciences*, *15*, 301-309.
- Batson, C. D., Kobrynowicz, D., Dinnerstein, J. L., Kampf, H. C., & Wilson, A. D. (1997). In a very different voice: Unmasking moral hypocrisy. *Journal of Personality and Social Psychology*, 72, 1335-1348.
- Baumeister, R. F. (1984). Choking under pressure: Self-consciousness and paradoxical effects of incentives on skillful performance. *Journal of Personality and Social Psychology, 46*, 610-620.

- Baumeister, R. F., Stillwell, A. M., & Heatherton, T. F. (1995). Personal narratives about guilt: Role in action control and interpersonal relationships. *Basic and Applied Social Psychology*, *17*, 173-198.
- Bazerman, M. H., & Gino, F. (2012). Behavioral ethics: Toward a deeper understanding of moral judgment and dishonesty. *Annual Review of Law and Social Science*, 8, 85-104.
- Bazerman, M. H., & Tenbrunsel, A. E. (2011). *Blind spots: Why we fail to do what's right and what to do about it.* Princeton, NJ: Princeton University Press.
- Bazerman, M. H., Tenbrunsel, A. E., & Wade-Benzoni, K. (1998). Negotiating with yourself and losing: Making decisions with competing internal preferences. *Academy of Management Review*, 23, 225-241.
- Bennett, R. J., & Robinson, S. L. (2003). The past, present, and future of workplace deviance research. In J. Greenberg (Ed.), *Organizational behavior: The state of the science* (2nd ed., pp. 247-281). Mahwah, NJ: Lawrence Erlbaum.
- Blair, J., Mitchell, D., & Blair, K. (2005). *The psychopath: Emotion and the brain*. Malden: Blackwell Publishing.
- Blair, R. J. R. (1995). A cognitive developmental approach to morality: Investigating the psychopath. *Cognition*, *57*, 1-29.
- Blair, R. J. R. (1999). Responsiveness to distress cues in the child with psychopathic tendencies. *Personality and Individual Differences*, *27*, 135-145.
- Blair, R. J. R., Colledge, E., Murray, L., & Mitchell, D. G. V. (2001). A Selective Impairment in the Processing of Sad and Fearful Expressions in Children with Psychopathic Tendencies. *Journal of Abnormal Child Psychology*, 29, 491-498.
- Blair, R. J. R., Sellars, C., Strickland, I., Clark, F., Williams, A. O., Smith, M., & Jones, L. (1995). Emotion attributions in the psychopath. *Personality and Individual Differences*, 19, 431-437.
- Bleske-Rechek, A., Nelson, L. A., Baker, J. P., Remiker, M. W., & Brandt, S. J. (2010). Evolution and the trolley problem: People save five over one unless the one is young, genetically related, or a romantic partner. *Journal of Social, Evolutionary, and Cultural Psychology*, *4*, 115-127.
- Borg, J. S., Lieberman, D., & Kiehl, K. A. (2008). Infection, Incest, and Iniquity: Investigating the Neural Correlates of Disgust and Morality. *Journal of Cognitive Neuroscience*, 20, 1529-1546.
- Brief, A. P., Buttram, R. T., & Dukerich, J. M. (2001). Collective corruption in the corporate world: Toward a process model. In M. E. Turner (Ed.), *Groups at work: Theory and research* (pp. 471-499). Mahwah, NJ: Erlbaum.
- Brosnan, S. F., & de Waal, F. B. M. (2003). Monkeys reject unequal pay. *Science*, 425, 297-299. Brown, M. E., & Treviño, L. K. (2006). Ethical leadership: A review and future directions. *The*

Leadership Quarterly, 17, 595-616.

- Burger, J., & Cooper, H. (1979). The desirability of control. *Motivation and Emotion*, *3*, 381-393. Carlson, M., Charlin, V., & Miller, N. (1988). Positive mood and helping behavior: A test of six hypotheses. *Journal of Personality and Social Psychology*, *55*, 211-229.
- Carney, D. R., Hall, J. A., & LeBeau, L. S. (2005). Beliefs about the nonverbal expression of social power. *Journal of Nonverbal Behavior*, 29, 105-123.
- Carney, D. R., & Mason, M. F. (2010). Decision making and testosterone: When the ends justify the means. *Journal of Experimental Social Psychology*, 46, 668-671.

- Carney, D. R., Yap, A. J., Lucas, B. J., Mehta, P. H., McGee, J. A., & Wilmuth, C. (2014). *Power Buffers Stress For Better and For Worse*. Haas School of Business, University of California, Berkeley.
- Caruso, E. M., & Gino, F. (2011). Blind ethics: Closing one's eyes polarizes moral judgments and discourages dishonest behavior. *Cognition*, *118*, 280-285.
- Chugh, D., Kern, M. C., & Kim, H. Y. (2014). When personality matters: Cognitive load moderates the effect of personality on ethics. New York University, Stern School of Business.
- Chugh, D., Kern, M. C., Zhu, Z., & Lee, S. (2014). Withstanding moral disengagement: Attachment security as an ethical intervention. *Journal of Experimental Social Psychology*, *51*, 88-93.
- Clark, K. B. (1980). Empathy: A neglected topic in psychological research. *American Psychologist*, *35*, 187-190.
- Coates, J. (2012). The hour between dog and wolf: Risk-taking, gut feelings and the biology of boom and bust (1st American ed.). New York: Penguin Press.
- Coates, J. M., Gurnell, M., & Sarnyai, Z. (2010). From molecule to market: Steroid hormones and financial risk-taking. *Philosophical Transactions of the Royal Society B: Biological Sciences*, 365, 331-343.
- Coates, J. M., & Herbert, J. (2008). Endogenous steroids and financial risk taking on a London trading floor. *Proceedings of the National Academy of Sciences*, 105, 6167-6172.
- Cohen, T. R., Panter, A. T., Turan, N., Morse, L., & Kim, Y. (in press). Moral character in the workplace. *Journal of Personality and Social Psychology*.
- Cohn, A., Fehr, E., & Marechal, M. A. (2014). Business culture and dishonesty in the banking industry. *Nature, advance online publication*.
- Colquitt, J. A., Conlon, D. E., Wesson, M. J., Porter, C. O. L. H., & Ng, K. Y. (2001). Justice at the millenium: A meta-analytic review of 25 years of organizational justice research. *Journal of Applied Psychology*, 86, 425-445.
- Cooper, J. (2007). Cognitive dissonance: Fifty years of a classic theory. Los Angeles: Sage.
- Cuddy, A. J., Wilmuth, C. A., & Carney, D. R. (2012). *The benefit of power posing before a high-stakes social evaluation*. Harvard Business School. Retrieved from <a href="http://nrs.harvard.edu/urn-3:HUL.InstRepos:9547823">http://nrs.harvard.edu/urn-3:HUL.InstRepos:9547823</a>
- Cushman, F. (2013). Action, Outcome, and Value: A Dual-System Framework for Morality. *Personality and Social Psychology Review, 17*, 273-292.
- Cushman, F., Young, L., & Greene, J. D. (2010). Multi-system moral psychology. In J. Doris (Ed.), *The Oxford handbook of moral psychology* (pp. 47-71). New York, NY: Oxford University Press.
- Dabbs, J. M., Carr, T. S., Frady, R. L., & Riad, J. K. (1995). Testosterone, Crime, and Misbehavior among 692 Male Prison-Inmates. *Personality and Individual Differences*, 18, 627-633.
- Dabbs, J. M., & Morris, R. (1990). Testosterone, Social Class, and Antisocial Behavior in a Sample of 4,462 Men. *Psychological Science*, *1*, 209-211.
- Dabney, D. (1995). Neutralization and deviance in the workplace: Theft of supplies and medicines by hospital nurses. *Deviant Behavior*, 16, 313-331.
- Damasio, A. R. (1994). *Descartes' error: Emotion, reason, and the human brain*. New York: G.P. Putnam.
- Dana, J., Weber, R., & Kuang, J. (2007). Exploiting moral wiggle room: Experiments demonstrating an illusory preference for fairness. *Economic Theory*, 33, 67-80.

- Danziger, S., Levav, J., & Avnaim-Pesso, L. (2011). Extraneous factors in judicial decisions. *Proceedings of the National Academy of Sciences*, 108, 6889-6892.
- Darley, J. M., & Latané, B. (1968). Bystander intervention in emergencies: Diffusion of responsibility. *Journal of Personality and Social Psychology*, 8, 377-383.
- Davison, H. K., & Burke, M. J. (2000). Sex Discrimination in Simulated Employment Contexts: A Meta-Analytic Investigation. *Journal of Vocational Behavior*, *56*, 225-248.
- de Waal, F. (2006). The animal roots of human morality. New Scientist, 192, 60-61.
- de Waal, F. B. M., Macedo, S., Ober, J., & Wright, R. (2006). *Primates and philosophers: How morality evolved*. Princeton, N.J.: Princeton University Press.
- Derfler-Rozin, R., Moore, C., & Staats, B. (2014). *Reducing rule breaking through task variety: How task design supports deliberative thinking*. Robert H. Smith School of Business, University of Maryland.
- Diekmann, K. A., Samuels, S. M., Ross, L., & Bazerman, M. H. (1997). Self-interest and fairness in problems of resource allocation: Allocators versus recipients. *Journal of Personality and Social Psychology*, 72, 1061-1074.
- Diener, E., Fraser, S. C., & Beaman, A. L. (1976). Effects of deindividuation variables on stealing among Halloween trick-or-treaters. *Journal of Personality and Social Psychology*, *33*, 178-183.
- Diener, E., & Wallbom, M. (1976). Effects of self-awareness on antinormative behavior. *Journal of Research in Personality*, 10, 107-111.
- Ditto, P. H., Pizarro, D. A., & Tannenbaum, D. (2009). Motivated moral reasoning. In D. M. Bartels, C. W. Bauman, L. J. Skitka & D. L. Medin (Eds.), *The Psychology of Learning and Motivation* (Vol. 50, pp. 307-338). Burlington: Academic Press.
- Donaldson, T. (1994). When integration fails: The logic of prescription and description in business ethics. *Business Ethics Quarterly*, 157-169.
- Doris, J. M., & Cushman, F. (Eds.). (2010). *The moral psychology handbook*. Oxford: Oxford University Press.
- Dunn, J. R., & Schweitzer, M. E. (2005). Feeling and Believing: The Influence of Emotion on Trust. *Journal of Personality and Social Psychology*, 88, 736-748.
- Eisenberg, N., & Miller, P. A. (1987). The relationship of empathy to prosocial and related behaviors. *Psychological Bulletin*, 101, 91-119.
- Epley, N., & Caruso, E. M. (2004). Egocentric ethics. Social Justice Research, 17, 171-187.
- Evans, J. S. B. T. (2008). Dual-Processing Accounts of Reasoning, Judgment, and Social Cognition. *Annual Review of Psychology*, *59*, 255-278.
- Farrington, D. P. (1979). Experiments on Deviance with Special Reference to Dishonesty. In B. Leonard (Ed.), *Advances in experimental social psychology* (Vol. Volume 12, pp. 207-252): Academic Press.
- Fast, N. J., & Chen, S. (2009). When the boss feels inadequate. *Psychological Science*, 20, 1406-1413.
- Fedorikhin, A., & Patrick, V. M. (2010). Positive Mood and Resistance to Temptation: The Interfering Influence of Elevated Arousal. *Journal of Consumer Research*, 37, 698-711.
- Fehr, B., & Samsom, D. (1992). The construct of Machiavellianism: Twenty years later. In C. D. Spielberger & J. N. Butcher (Eds.), *Advances in Personality Assessment* (Vol. 9, pp. 77-116). Hillsdale, NJ: Lawrence Erlbaum.
- Feinberg, M., Willer, R., Antonenko, O., & John, O. P. (2012). Liberating Reason From the Passions: Overriding Intuitionist Moral Judgments Through Emotion Reappraisal. *Psychological Science*, 23, 788-795.

- Festinger, L. (1957). A theory of cognitive dissonance. Evanston, IL: Row, Peterson.
- Fischer, A. H., & Roseman, I. J. (2007). Beat them or ban them: The characteristics and social functions of anger and contempt. *Journal of Personality and Social Psychology*, 93, 103-115.
- Flack, J. C., & de Waal, F. B. M. (2000). 'Any animal whatever': Darwinian building blocks of morality in monkeys and apes. *Journal of Consciousness Studies*, 7, 1-29.
- Fleming, J. E. (1987). A survey and critique of business ethics research, 1986 *Research in corporate social performance and policy* (Vol. 9, pp. 1-24). Greenwich, CT: JAI Press.
- Foot, P. (1967). The problem of abortion and the doctrine of double effect. *Oxford Review*, 5, 5-15
- Freud, S. (1900/1955). The interpretation of dreams. New York: Basic Books.
- Gailliot, M. T., Baumeister, R. F., DeWall, C. N., Maner, J. K., Plant, E. A., Tice, D. M., . . . Schmeichel, B. J. (2007). Self-control relies on glucose as a limited energy source: Willpower is more than a metaphor. *Journal of Personality and Social Psychology*, 92, 325-336.
- Gellerman, S. W. (1986). Why "good" managers make bad ethical choices. *Harvard Business Review*, 86(4), 85-90.
- Gibbons, F. X., & Wicklund, R. A. (1982). Self-focused attention and helping behavior. *Journal of Personality and Social Psychology*, 43, 462-474.
- Gino, F., & Bazerman, M. H. (2007). Slippery slopes and misconduct: The effect of gradual degradation on the failure to notice others' unethical behavior. *Harvard Working Paper No. 06-007*.
- Gino, F., & Bazerman, M. H. (2009). When misconduct goes unnoticed: The acceptability of gradual erosion in others' unethical behavior. *Journal of Experimental Social Psychology*, 45, 708-719.
- Gino, F., Gu, J., & Zhong, C.-B. (2009). Contagion or restitution? When bad apples can motivate ethical behavior. *Journal of Experimental Social Psychology*, 45, 1299-1302.
- Gino, F., & Pierce, L. (2010). Robin Hood under the hood: Wealth-based discrimination in illicit customer help. *Organization Science*, *21*, 1176-1194.
- Gino, F., Schweitzer, M. E., Mead, N. L., & Ariely, D. (2011). Unable to resist temptation: How self-control depletion promotes unethical decision making. *Organizational Behavior and Human Decision Processes*, 115, 191-203.
- Gintis, H., Bowles, S., Boyd, R., & Fehr, E. (Eds.). (2005). *Moral sentiments and material interests: The foundations of cooperation in economic life*. Cambridge, MA: MIT Press.
- Gioia, D. A. (1992). Pinto fires and personal ethics: A script analysis of missed opportunities. *Journal of Business Ethics, 11*, 379-389.
- Goffman, E. (1974). *Frame analysis: An essay on the organization of experience*. Cambridge, Mass.: Harvard University Press.
- Goldman Sachs. (2013). *Risk Management and the Residential Mortgage Market*. Available through the New York Times. Retrieved from <a href="http://www.nytimes.com/interactive/2013/07/09/business/dealbook/20130709-tourre-documents.html">http://www.nytimes.com/interactive/2013/07/09/business/dealbook/20130709-tourre-documents.html</a>
- Gosling, P., Denizeau, M., & Oberlé, D. (2006). Denial of responsibility: A new mode of dissonance reduction. *Journal of Personality and Social Psychology*, 90, 722-733.
- Graham, J., Haidt, J., & Nosek, B. A. (2009). Liberals and conservatives rely on different sets of moral foundations. *Journal of Personality and Social Psychology*, *96*, 1029-1046.

- Greenberg, J. (1990). Employee theft as a reaction to underpayment inequity: The hidden cost of pay cuts. *Journal of Applied Psychology*, 75, 561-568.
- Greenberg, J. (2002). Who stole the money and when? Individual and situational determinants of employee theft. *Organizational Behavior and Human Decision Processes*, 89, 985-1003.
- Greene, J. (2013). *Moral tribes: Emotion, reason, and the gap between us and them.* London, UK: Atlentic Books.
- Greene, J., & Haidt, J. (2002). How (and where) does moral judgment work? *Trends in Cognitive Sciences*, 6, 517-523.
- Greene, J. D., Morelli, S. A., Lowenberg, K., Nystrom, L. E., & Cohen, J. D. (2008). Cognitive load selectively interferes with utilitarian moral judgment. *Cognition*, 107, 1144-1154.
- Greene, J. D., Nystrom, L. E., Engell, A. D., Darley, J. M., & Cohen, J. D. (2004). The neural bases of cognitive conflict and control in moral judgment. *Neuron*, *44*, 389-400.
- 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, 12506-12511.
- Greene, J. D., Sommerville, R. B., Nystrom, L. E., Darley, J. M., & Cohen, J. D. (2001). An fMRI Investigation of Emotional Engagement in Moral Judgment. *Science*, 293, 2105-2108.
- Gu, J., Zhong, C.-B., & Page-Gould, E. (2013). Listen to your heart: When false somatic feedback shapes moral behavior. *Journal of Experimental Psychology: General, 142*, 307-312.
- Guastella, A. J., Einfeld, S. L., Gray, K. M., Rinehart, N. J., Tonge, B. J., Lambert, T. J., & Hickie, I. B. (2010). Intranasal Oxytocin Improves Emotion Recognition for Youth with Autism Spectrum Disorders. *Biological Psychiatry*, *67*, 692-694.
- Gunia, B. C., Wang, L., Huang, L., Wang, J., & Murnighan, J. K. (2012). Contemplation and conversation: Subtle influences on moral decision making. *Academy of Management Journal*, 13-34.
- Haidt, J. (2001). The emotional dog and its rational tail: A social intuitionist approach to moral judgment. *Psychological Review*, *108*, 814-834.
- Haidt, J. (2007). The new synthesis in moral psychology. Science, 316, 998-1002.
- Haidt, J., Björklund, F., & Murphy, S. (2000). *Moral Dumbfounding: When Intuition Finds No Reason*. University of Virginia.
- Haidt, J., & Graham, J. (2007). When morality opposes justice: Conservatives have moral intuitions that liberals may not recognize. *Social Justice Research*, 20, 98-116.
- Haidt, J., & Joseph, C. (2004). Intuitive Ethics: How Innately Prepared Intuitions Generate Culturally Variable Virtues. *Daedalus*, 133, 55-66.
- Haidt, J., & Kesebir, S. (2010). Morality. In S. Fiske, D. Gilbert & G. Lindzey (Eds.), *Handbook of Social Psychology* (5th ed., pp. 797-832). Hobeken, NJ: Wiley.
- Haidt, J., Koller, S. H., & Dias, M. G. (1993). Affect, culture, and morality, or is it wrong to eat your dog? *Journal of Personality and Social Psychology*, 65, 613-628.
- Hare, R. D. (1993). Without conscience: The disturbing world of psychopaths among us. New York: Pocket Books.
- Harlow, J. M. (1868/1993). Recovery from the passage of an iron bar through the head. *History of Psychiatry*, 4, 274-281.
- Harris, J., & Bromiley, P. (2007). Incentives to cheat: The influence of executive compensation and firm performance on financial misrepresentation. *Organization Science*, 18, 350-367.

- Horberg, E. J., Oveis, C., & Keltner, D. (2011). Emotions as Moral Amplifiers: An Appraisal Tendency Approach to the Influences of Distinct Emotions upon Moral Judgment. *Emotion Review*, *3*, 237-244.
- Horner, V., Carter, J. D., Suchak, M., & de Waal, F. B. M. (2011). Spontaneous prosocial choice by chimpanzees. *Proceedings of the National Academy of Sciences*.
- Huang, L., Galinsky, A. D., Gruenfeld, D. H., & Guillory, L. E. (2011). Powerful Postures Versus Powerful Roles: Which Is the Proximate Correlate of Thought and Behavior? *Psychological Science*, 22, 95-102.
- Huebner, B., Dwyer, S., & Hauser, M. (2009). The role of emotion in moral psychology. *Trends in Cognitive Sciences*, 13, 1-6.
- Huemer, M. (2005). Ethical intuitionism. New York: Palgrave Macmillan.
- Hume, D. (1739-1740/2007). A Treatise of Human Nature. Oxford: Clarendon Press.
- Hume, D. (1751/1957). *An inquiry concerning the principles of morals* (Vol. 62). New York: Liberal Arts Press.
- Jackall, R. (1988). *Moral mazes: The world of corporate managers*. New York: Oxford University Press.
- Jackson, P. L., Brunet, E., Meltzoff, A. N., & Decety, J. (2006). Empathy examined through the neural mechanisms involved in imagining how I feel versus how you feel pain. *Neuropsychologia*, 44, 752-761.
- Jick, T. D. (1979). Mixing qualitative and quantitative methods: Triangulation in action. *Administrative Science Quarterly*, 24, 602-611.
- Jones, T. M. (1991). Ethical decision making by individuals in organizations: An issuecontingent model. *Academy of Management Review, 16*, 366-395.
- Kahneman, D. (2003a). Maps of bounded rationality: Psychology for behavioral economics. *American Economic Review, 93*, 1449-1475.
- Kahneman, D. (2003b). A perspective on judgment and choice: Mapping bounded rationality. *American Psychologist*, *58*, 697-720.
- Kahneman, D., & Tversky, A. (Eds.). (2000). *Choices, values, and frames*. Cambridge: Canbridge University Press.
- Kant, I. (1785/1993). *Grounding for the metaphysics of morals* (J. W. Ellington, Trans. 3rd ed.). Indianapolis: Hackett.
- Katz, J. (1988). Seductions of crime. New York: Basic Books.
- Kern, M. C., & Chugh, D. (2009). Bounded ethicality: The perils of loss framing. *Psychological Science*, 20, 378-384.
- Ketelaar, T., & Tung Au, W. (2003). The effects of feelings of guilt on the behaviour of uncooperative individuals in repeated social bargaining games: An affect-as-information interpretation of the role of emotion in social interaction. *Cognition & Emotion*, 17, 429-453.
- Kidwell, R. E., & Bennett, N. (1993). Employee propensity to withhold effort: A conceptual model to intersect three avenues of research. *Academy of Management Review, 18*, 429-456.
- Killgore, W. D., Killgore, D. B., Day, L. M., Li, C., Kamimori, G. H., & Balkin, T. J. (2007). The effects of 53 hours of sleep deprivation on moral judgment. *Sleep*, *30*, 345-352.
- Kish-Gephart, J. J., Detert, J. R., Treviño, L. K., & Edmondson, A. C. (2009). Silenced by fear: The nature, sources, and consequences of fear at work. *Research in Organizational Behavior*, 29, 163-193.

- Kivetz, Y., & Tyler, T. R. (2007). Tomorrow I'll be me: The effect of time perspective on the activation of idealistic versus pragmatic selves. *Organizational Behavior and Human Decision Processes*, 102, 193-211.
- Knights, D., & Willmott, H. (1997). The Hype and Hope of Interdisciplinary Management Studies. *British Journal of Management*, 8, 9.
- Knobe, J. M., & Nichols, S. (Eds.). (2008). *Experimental philosophy*. Oxford ;New York: Oxford University Press.
- Koenigs, M., Young, L., Adolphs, R., Tranel, D., Cushman, F., Hauser, M., & Damasio, A. (2007). Damage to the prefrontal cortex increases utilitarian moral judgements. *Nature*, 446, 908-911.
- Kohlberg, L. (1969). Stage and sequence: The cognitive-developmental approach to socialization. In D. A. Goslin (Ed.), *Handbook of socialization theory and research* (pp. 348-480). Chicago: Rand McNally.
- Kohlberg, L. (1975). *Collected papers on moral development and moral education*. Cambridge, MA: Moral Education & Research Foundation.
- Kohlberg, L. (1984). Moral stages and moralization: The cognitive developmental approach. In L. Kohlberg (Ed.), *The psychology of moral development: The nature and validity of moral stages* (Vol. 2, pp. 170-205). San Francisco: Harper & Row.
- Kosfeld, M., Heinrichs, M., Zak, P. J., Fischbacher, U., & Fehr, E. (2005). Oxytocin increases trust in humans. *Nature*, 435, 673-676.
- Kouchaki, M., & Desai, S. D. (in press). Anxious, Threatened, and also Unethical: How Anxiety Makes Individuals Feel Threatened and Commit Unethical Acts. *Journal of Applied Philosophy*.
- Kouchaki, M., & Smith, I. H. (2013). The Morning Morality Effect: The Influence of Time of Day on Unethical Behavior. *Psychological Science*.
- Kouchaki, M., Smith-Crowe, K., Brief, A. P., & Sousa, C. (2013). Seeing green: Mere exposure to money triggers a business decision frame and unethical outcomes. *Organizational Behavior and Human Decision Processes*, 121, 53-61.
- Kramer, R. M., & Messick, D. M. (1996). Ethical cognition and the framing of organizatinal dilemmas: Decision makers as intuitive lawyers. In D. M. Messick & A. E. Tenbrunsel (Eds.), *Codes of conduct: Behavioural research into business ethics* (pp. 59-85). New York: Sage.
- Kühberger, A. (1998). The influence of framing on risky decisions: A meta-analysis. *Organizational Behavior and Human Decision Processes* 75, 23-55.
- Kunda, Z. (1990). The case for motivated reasoning. *Psychological Bulletin*, 108, 480-498.
- Langer, E. J. (1975). The illusion of control. *Journal of Personality and Social Psychology*, 32, 311-328.
- Latané, B., & Rodin, J. (1969). A lady in distress: Inhibiting effects of friends and strangers on bystander intervention. *Journal of Experimental Social Psychology*, *5*, 189-202.
- Leith, K. P., & Baumeister, R. F. (1996). Why do bad moods increase self-defeating behavior? Emotion, risk tasking, and self-regulation. *Journal of Personality and Social Psychology*, 71, 1250-1267.
- Levin, I. P., Schneider, S. L., & Gaeth, G. J. (1998). All Frames Are Not Created Equal: A Typology and Critical Analysis of Framing Effects. *Organizational Behavior and Human Decision Processes*, 76, 149-188.
- Lewicki, R. J. (1983). Lying and deception: A behavioral model. In M. H. Bazerman & R. J. Lewicki (Eds.), *Negotiating in organizations* (pp. 68-90). Beverly Hills, CA: Sage.

- Liebrand, W. B. G., Messick, D. M., & Wolters, F. J. M. (1986). Why we are fairer than others: A cross-cultural replication and extension. *Journal of Experimental Social Psychology*, 22, 590-604.
- Loewenstein, G. (1996). Out of control: Visceral influences on behavior. *Organizational Behavior and Human Decision Processes*, 65, 272-292.
- Mack, A., & Rock, I. (1998). Inattentional blindness. Cambridge, Mass.: MIT Press.
- MacLean, T. (2001). Thick as thieves: A socially embedded model of rule breaking in organizations. *Business and Society, 40*, 167-196.
- Mano, H. (1994). Risk-Taking, Framing Effects, and Affect. *Organizational Behavior and Human Decision Processes*, *57*, 38-58.
- Margolis, J. (2009). The responsibilty gap. The Hedgehog Review, 11, 41-53.
- Markus, H., & Kunda, Z. (1986). Stability and malleability of the self-concept. *Journal of Personality and Social Psychology*, *51*, 858-866.
- Mars, G. (1982). Cheats at work: An anthropology of workplace crime. London: George Allen & Unwin.
- Masserman, J. H., Wechkin, S., & Terris, W. (1964). "Altruistic" behavior in rhesus monkeys. *The American Journal of Psychiatry*, 121, 584-585.
- Massi, L. L. (2005). Anticipated Guilt as Behavioral Motivation. *Human Communication Research*, *31*, 453-481.
- Mayer, D. M., Kuenzi, M., & Greenbaum, R. L. (2009). Making ethical climate a mainstream management topic: A review, critique, and prescription for the empirical research on ethical climate. In D. D. Cremer (Ed.), *Psychological perspectives on ethical behavior and decision making* (pp. 181-213). Greenwich, CT: Information Age Publishing.
- Mazur, A., & Booth, A. (1998). Testosterone and dominance in men. *Behavioral and Brain Sciences*, 21, 353-+.
- McEwen, B. S. (1998). Protective and Damaging Effects of Stress Mediators. *New England Journal of Medicine*, 338, 171-179.
- Mead, N. L., Baumeister, R. F., Gino, F., Schweitzer, M. E., & Ariely, D. (2009). Too tired to tell the truth: Self-control resource depletion and dishonesty. *Journal of Experimental Social Psychology*, 45, 594-597.
- Mehta, P. H., & Josephs, R. A. (2006). Testosterone change after losing predicts the decision to compete again. *Hormones and Behavior*, *50*, 684-692.
- Mendez, M. F., Anderson, E., & Shapira, J. S. (2005). An Investigation of Moral Judgement in Frontotemporal Dementia. *Cognitive and Behavioral Neurology*, *18*, 193-197.
- Messick, D. M., & Bazerman, M. H. (1996). Ethical leadership and the psychology of decision making. *Sloan Management Review*, *37*, 9-22.
- Messick, D. M., & Sentis, K. (1983). Fairness, preference, and fairness biases. In D. Messick & S. Cook (Eds.), *Equity theory: Psychological and sociological perspectives* (pp. 61-94). New York: Praeger.
- Metzger, M., Dalton, D. R., & Hill, J. W. (1993). The Organization of Ethics and the Ethics of Organizations: The Case for Expanded Organizational Ethics Audits. *Business Ethics Quarterly*, *3*, 27-43.
- Mikolajczak, M., Gross, J. J., Lane, A., Corneille, O., de Timary, P., & Luminet, O. (2010). Oxytocin makes people trusting, not gullible. *Psychological Science*, *21*, 1072-1074.
- Milgram, S. (1974). Obedience to authority: An experimental view. New York: Harper & Row.
- Milkman, K. L., Rogers, T., & Bazerman, M. H. (2008). Harnessing Our Inner Angels and Demons: What We Have Learned About Want/Should Conflicts and How That

- Knowledge Can Help Us Reduce Short-Sighted Decision Making. *Perspectives on Psychological Science*, *3*, 324-338.
- Miller, D. T., & Effron, D. A. (2010). Psychological license: When it is needed and how it functions. *Advances in Experimental Social Psychology*, 43, 115-155.
- Mohliver, A. C. (2012). *The legitimacy of corrupt practices: geography of auditors advice and backdating of stock option grants*. Paper presented at the Academy of Management Annual Meeting, Boston, MA.
- Molden, D. C., Hui, C. M., Scholer, A. A., Meier, B. P., Noreen, E. E., D'Agostino, P. R., & Martin, V. (2012). Motivational Versus Metabolic Effects of Carbohydrates on Self-Control. *Psychological Science*, *23*, 1137-1144.
- Monin, B. (2007). Holier than me? Threatening social comparison in the moral domain. *Revue internationale de psychologie sociale*, 53-68.
- Monin, B., & Jordan, A. H. (2009). Dynamic moral identity: A social psychological perspective. In D. Narvaez & D. Lapsley (Eds.), *Personality, identity, and character: Explorations in moral psychology* (pp. 341-354). Cambridge, MA: Cambridge University Press.
- Monroe, K. R. (2001). Morality and a sense of self: The importance of identity and categorization for moral action. *American Journal of Political Science*, 45, 491-507.
- Moore, C., Detert, J. R., Treviño, L. K., Baker, V. L., & Mayer, D. M. (2012). Why employees do bad things: Moral disengagement and unethical organizational behavior. *Personnel Psychology*, 65, 1-48.
- Moore, C., & Gino, F. (2013). Ethically adrift: How others pull our moral compass from true North, and how we can fix it. *Research in Organizational Behavior*, *33*, 53-77.
- Moore, C., & Tenbrunsel, A. E. (2014). Just think about it? Cognitive complexity and moral choice. *Organizational Behavior and Human Decision Processes*, 123, 138–149.
- Muth, K. (2014, June 17). Flight 93: Rumsfeld's Trolley Problem. *Global Policy*. Retrieved from: <a href="http://www.globalpolicyjournal.com/blog/17/06/2014/flight-93-rumsfeld%E2%80%99s-trolley-problem">http://www.globalpolicyjournal.com/blog/17/06/2014/flight-93-rumsfeld%E2%80%99s-trolley-problem</a>.
- Neisser, U., & Becklen, R. (1975). Selective looking: Attending to visually specified events. *Cognitive Psychology*, *7*, 480-494.
- Nelson, R. J. (2005). *An introduction to behavioral endocrinology* (3rd ed.). Sunderland, MA: Sinauer Associates.
- Newberry, K. J., Reckers, P. M. J., & Wyndelts, R. W. (1993). An examination of tax practitioner decisions: The role of preparer sanctions and framing effects associated with client condition. *Journal of Economic Psychology*, 14, 439-452.
- Nichols, S. (2002). Norms with feeling: Towards a psychological account of moral judgment. *Cognition*, 84, 221-236.
- Nisbett, R., & Wilson, T. D. (1977). Telling more than we can know: Verbal reports on mental processes. *Psychological Review*, *84*, 231-259.
- O'Fallon, M. J., & Butterfield, K. D. (2005). A review of the empirical ethical decision making literature: 1996-2003. *Journal of Business Ethics*, *59*, 375-413.
- O'Leary-Kelly, A. M., Duffy, M. K., & Griffin, R. W. (2000). Construct confusion in the study of antisocial behavior at work. *Research in Personnel and Human Resources Management*, 18, 275-303.
- Oc, B., Bashshur, M. R., & Moore, C. (in press). Speaking Truth to Power: The Effect of Candid Feedback on How Individuals with Power Allocate Resources. *Journal of Applied Psychology*.
- Ocasio, W. (2010). Attention to Attention. Organization Science.

- Ordóñez, L. D., Schweitzer, M. E., Galinsky, A. D., & Bazerman, M. H. (2009). Goals gone wild: The systematic side effects of overprescribing goal setting. *Academy of Management Perspectives*, 23, 6-16.
- Palmer, D. (2008). Extending the process model of collective corruption. *Research in Organizational Behavior*, 28, 107-135.
- Perugini, M., Conner, M., & O'Gorman, R. (2011). Automatic activation of individual differences: A test of the gatekeeper model in the domain of spontaneous helping. *European Journal of Personality*, 25, 465-476.
- Petrinovich, L., O'Neill, P., & Jorgensen, M. (1993). An empirical study of moral intuitions: Toward an evolutionary ethics. *Journal of Personality and Social Psychology, 64*, 467-478.
- Pierce, L., & Snyder, J. (2008). Ethical Spillovers in Firms: Evidence from Vehicle Emissions Testing. *Management Science*, *54*, 1891-1903.
- Pillutla, M. M., & Chen, X.-P. (1999). Social norms and cooperation in social dilemmas: The effects of context and feedback. *Organizational Behavior and Human Decision Processes*, 78, 81-103.
- Pillutla, M. M., & Murnighan, J. K. (1996). Unfairness, Anger, and Spite: Emotional Rejections of Ultimatum Offers. *Organizational Behavior and Human Decision Processes*, 68, 208-224.
- Pizarro, D. A., & Bloom, P. (2003). The intelligence of moral intuitions: Comment on Haidt (2001). *Psychological Review*, 110, 193-196.
- Price, K. H., Harrison, D. A., & Gavin, J. H. (2006). Withholding inputs in team contexts: Member composition, interaction processes, evaluation structure, and social loafing. *Journal of Applied Psychology*, *91*, 1375-1384.
- Quinn, R. W., & Worline, M. C. (2008). Enabling courageous collective action: Conversations from United Airlines Flight 93. *Organization Science*, 19, 497-516.
- Reinders Folmer, C. P., & De Cremer, D. (2012). Bad for Me or Bad for Us? Interpersonal Orientations and the Impact of Losses on Unethical Behavior. *Personality and Social Psychology Bulletin*, 38, 760-771.
- Rest, J. R. (1986). *Moral development: Advances in research and theory*. Minneapolis: University of Minnesota Press.
- Reynolds, S. J. (2008). Moral attentiveness: Who pays attention to the moral aspects of life? *Journal of Applied Psychology, 93*, 1027-1041.
- Ricœur, P. (1984). Time and narrative. Chicago: University of Chicago Press.
- Robertson, D. (1993). Empiricism in business ethics: Suggested research directions. *Journal of Business Ethics*, 12, 585-599.
- Robinson, S. L., & Bennett, R. J. (1997). Workplace deviance: Its definition, its manifestations, and its causes. In R. J. Lewicki & R. J. Bies (Eds.), *Research on negotiation in organizations* (Vol. 6, pp. 3-27): Elsevier Science/JAI Press.
- Robinson, S. L., & O'Leary-Kelly, A. M. (1998). Monkey see, monkey do: The influence of work groups on the antisocial behavior of employees. *Academy of Management Journal*, 41, 658-672.
- Ronay, R., & Carney, D. R. (2013). Testosterone's Negative Relationship With Empathic Accuracy and Perceived Leadership Ability. *Social Psychological and Personality Science*, 4, 92-99.
- Ross, W. D. (1930). The right and the good. Oxford: Clarendon Press.

- Ruedy, N., & Schweitzer, M. (2010). In the moment: The effect of mindfulness on ethical decision making. *Journal of Business Ethics*, 95, 73-87.
- Sapienza, P., Zingales, L., & Maestripieri, D. (2009). Gender differences in financial risk aversion and career choices are affected by testosterone. *Proceedings of the National Academy of Sciences*, 106, 15268-15273.
- Scherer, K. R. (1984). On the nature and function of emotion: A component process approach. In K. R. Scherer & P. Ekman (Eds.), *Approaches to emotion* (pp. 293-317). Hillsdale, NJ: Lawrence Erlbaum.
- Schmeichel, B. J. (2007). Attention Control, Memory Updating, and Emotion Regulation Temporarily Reduce the Capacity for Executive Control. *Journal of Experimental Psychology: General*, 136, 241-255.
- Schminke, M., & Priesemuth, M. (2010). Management and ethics: Revisiting distant neighbors. In M. Schminke (Ed.), *Managerial Ethics: Managing the Psychology of Morality* (pp. 1-17). New York: Routledge.
- Schnall, S., Haidt, J., Clore, G. L., & Jordan, A. H. (2008). Disgust as Embodied Moral Judgment. *Personality and Social Psychology Bulletin*.
- Schultheiss, O. C., Campbell, K. L., & McClelland, D. C. (1999). Implicit Power Motivation Moderates Men's Testosterone Responses to Imagined and Real Dominance Success. *Hormones and Behavior*, *36*, 234-241.
- Schweitzer, M. E., Ordóñez, L., & Douma, B. (2004). Goal setting as a motivator of unethical behavior. *Academy of Management Journal*, 47, 422-432.
- Securities and Exchange Commission. (2012, April 16). *Indictment Against Goldman, Sachs & Co. and Fabrice Tourre*.
- Shalvi, S., Dana, J., Handgraaf, M. J. J., & De Dreu, C. K. W. (2011). Justified ethicality: Observing desired counterfactuals modifies ethical perceptions and behavior. *Organizational Behavior and Human Decision Processes*, 115, 181-190.
- Shalvi, S., & De Dreu, C. K. W. (2014). Oxytocin promotes group-serving dishonesty. *Proceedings of the National Academy of Sciences*, 111, 5503-5507.
- Shalvi, S., Eldar, O., & Bereby-Meyer, Y. (2012). Honesty requires time (and lack of justifications). *Psychological Science*, 23, 1264-1270.
- Shu, L. L., & Gino, F. (2012). Sweeping dishonesty under the rug: How unethical actions lead to forgetting of moral rules. *Journal of Personality and Social Psychology*, 102, 1164-1177.
- Shu, L. L., Gino, F., & Bazerman, M. H. (2011a). Dishonest deed, clear conscience: When cheating leads to moral disengagement and motivated forgetting. *Personality and Social Psychology Bulletin*, *37*, 330-349.
- Shu, L. L., Gino, F., & Bazerman, M. H. (2011b). Ethical discrepancy: Changing our attitudes to resolve moral dissonance. In D. De Cremer & A. E. Tenbrunsel (Eds.), *Behavioral business ethics: Shaping an emerging field* (pp. 221-240). London: Taylor & Francis.
- Shu, L. L., Mazar, N., Gino, F., Ariely, D., & Bazerman, M. H. (2012). Signing at the beginning makes ethics salient and decreases dishonest self-reports in comparison to signing at the end. *Proceedings of the National Academy of Sciences*, 109, 15197-15200.
- Shweder, R. A., & Haidt, J. (1993). The future of moral psychology: Truth, intuition, and the pluralist way. *Psychological Science*, *4*, 360-365.
- Shweder, R. A., Much, N., Mahapatra, M., & Park, L. (1997). The "big three" of morality (autonomy, community, divinity), and the "big three" explanations of suffering. In A. M. Brant & P. Rozin (Eds.), *Morality and health* (Vol. 119-169). New York: Routledge.

- Simon, H. A. (1947). *Aministrative behavior: A study of decision making processes in administrative organizations*. Chicago: Macmillan.
- Simon, H. A. (1982). Models of bounded rationality. Cambridge, MA: MIT Press.
- Simon, L., Greenberg, J., & Brehm, J. (1995). Trivialization: The forgotten mode of dissonance reduction. *Journal of Personality and Social Psychology*, 68, 247-260.
- Simons, D. J., & Chabris, C. F. (1999). Gorillas in our midst: sustained inattentional blindness for dynamic events. *Perception*, *28*, 1059-1074.
- Skarlicki, D. P., van Jaarsveld, D. D., & Walker, D. D. (2008). Getting even for customer mistreatment: The role of moral identity in the relationship between customer interpersonal injustice and employee sabotage. *Journal of Applied Psychology*, *93*, 1335-1347.
- Staub, E. (1974). Helping a distressed person: Social, personality, and stimulus determinants. In L. Berkowitz (Ed.), *Advances in Experimental Social Psychology* (Vol. 7). New York: Academic Press.
- Tangney, J. P., Wagner, P. E., Hill-Barlow, D., Marschall, D. E., & Gramzow, R. (1996). Relation of shame and guilt to constructive versus destructive responses to anger across the lifespan. *Journal of Personality and Social Psychology*, 70, 797-809.
- Tenbrunsel, A. E., Diekmann, K. A., Wade-Benzoni, K. A., & Bazerman, M. H. (2010). The ethical mirage: A temporal explanation as to why we are not as ethical as we think we are. *Research in Organizational Behavior*, *30*, 153-173.
- Tenbrunsel, A. E., & Messick, D. M. (1999). Sanctioning systems, decision frames, and cooperation. *Administrative Science Quarterly*, 44, 684-707.
- Tenbrunsel, A. E., & Smith-Crowe, K. (2008). Ethical decision making: Where we've been and where we're going. *Academy of Management Annals*, *2*, 545-607.
- Tepper, B. J. (2000). Consequences of abusive supervision. *Academy of Management Journal*, 43, 178-190.
- Thomson, J. J. (1976). Killing, letting die, and the trolley problem. *The Monist*, 204-217.
- Treviño, L. K. (1986). Ethical decision-making in organizations: A person-situation interactionist model. *Academy of Management Review, 11*, 601-617.
- Treviño, L. K., Weaver, G. R., & Reynolds, S. J. (2006). Behavioral ethics in organizations: A review. *Journal of Management*, 32, 951-990.
- Tyson, T. (1990). Believing that everyone else is less ethical: Implications for work behavior and ethics instruction. *Journal of Business Ethics*, *9*, 715-721.
- Uhlmann, E. L., Pizarro, D. A., Tannenbaum, D., & Ditto, P. H. (2009). The motivated use of moral principles. *Judgment and Decision Making*, *4*, 476-491.
- Valdesolo, P., & DeSteno, D. (2006). Manipulations of Emotional Context Shape Moral Judgment. *Psychological Science*, 17, 476-477.
- van Dijk, E., & De Cremer, D. (2006). Self-Benefiting in the Allocation of Scarce Resources: Leader-Follower Effects and the Moderating Effect of Social Value Orientations. *Personality and Social Psychology Bulletin, 32*, 1352-1361.
- Van Ijzendoorn, M. H., & Bakermans-Kranenburg, M. J. (2012). A sniff of trust: Meta-analysis of the effects of intranasal oxytocin administration on face recognition, trust to in-group, and trust to out-group. *Psychoneuroendocrinology*, *37*, 438-443.
- vanDellen, M. R. (2008). *Social, personal, and environmental influences on self-control*. Unpublished doctoral dissertation, Department of Psychology and Neuroscience, Duke University.

- Vardi, Y., & Weitz, E. (2004). *Misbehavior in organizations: Theory, research, and management*. Mahwah, NJ: Lawrence Erlbaum Associates.
- Waal, F. B. M. d. (1989). *Peacemaking among primates*. Cambridge, Mass.: Harvard University Press.
- Wakeman, S. W., Moore, C., & Gino, F. (2014). *Competence by any means: Cheating after threat to boost one's self-image*. London Business School, UK.
- Wang, J. T.-y., Spezio, M., & Camerer, C. F. (2010). Pinocchio's Pupil: Using Eyetracking and Pupil Dilation to Understand Truth Telling and Deception in Sender-Receiver Games. *The American Economic Review*, 100, 984-1007.
- Wang, L., Zhong, C.-B., & Murnighan, J. K. (2014). The social and ethical consequences of a calculative mindset. *Organizational Behavior and Human Decision Processes*, 125, 39-49.
- Weaver, G. R., & Trevino, L. K. (1994). Normative and empirical business ethics: separation, marriage of convenience, or marriage of necessity? *Business Ethics Quarterly*, 129-143.
- Wertenbroch, K. (1998). Consumption Self-Control by Rationing Purchase Quantities of Virtue and Vice. *Marketing Science*, 17, 317-337.
- Wheatley, T., & Haidt, J. (2005). Hypnotic Disgust Makes Moral Judgments More Severe. *Psychological Science*, *16*, 780-784.
- Woodzicka, J. A., & LaFrance, M. (2002). Real versus imagined gender harassment. *Journal of Social Issues*, *57*, 15-30.
- Yap, A. J., Wazlawek, A. S., Lucas, B. J., Cuddy, A. J. C., & Carney, D. R. (2013). The Ergonomics of Dishonesty: The Effect of Incidental Posture on Stealing, Cheating, and Traffic Violations. *Psychological Science*, 24, 2281-2289.
- Yip, J. A., & Schweitzer, M. E. (2014). *Mad and Misleading: Incidental Anger Promotes Deception*. Available at SSRN. Retrieved from <a href="http://ssrn.com/abstract=2478692">http://ssrn.com/abstract=2478692</a>
- Zajonc, R. B. (1980). Feeling and thinking: Preferences need no inferences. *American Psychologist*, *35*, 151-175.
- Zajonc, R. B., & Sales, S. M. (1966). Social facilitation of dominant and subordinate responses. *Journal of Experimental Social Psychology*, 2, 160-168.
- Zhang, T., Gino, F., & Bazerman, M. H. (2014). Morality rebooted: Exploring simple fixes to our moral bugs. *Research in Organizational Behavior*, *34*, 63-79.
- Zhong, C.-B. (2011). The ethical dangers of deliberative decision making. *Administrative Science Quarterly*, *56*, 1-25.
- Zuckerman, M., DePaulo, B. M., & Rosenthal, R. (1981). Verbal and Nonverbal Communication of Deception. In B. Leonard (Ed.), *Advances in Experimental Social Psychology* (Vol. Volume 14, pp. 1-59): Academic Press.

Figure 1. A psychological process model of unethical behavior

