



Safety-Related Moral Disengagement in Response to Job Insecurity: Counterintuitive Effects of Perceived Organizational and Supervisor Support

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Received: 20 March 2018 / Accepted: 14 August 2018 / Published online: 21 August 2018
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Abstract

The purpose of this study was to examine individual and organizational antecedents and consequences of safety-related moral disengagement. Using Conservation of Resources theory, social exchange theory, and psychological contract breach as a theoretical foundation, this study tested the proposition that higher job insecurity is associated with greater levels of subsequent safety-related moral disengagement, which in turn is related to reduced safety performance. Moreover, we examined whether perceived organizational and supervisor support buffered or intensified the impact of job insecurity on moral disengagement. Using a two-wave lagged design, anonymous survey data collected from $N=389$ working adults in the U.S. supported the hypothesized moderated mediation model. Specifically, the conditional indirect effects of job insecurity on safety performance via moral disengagement were intensified as levels of perceived organizational and supervisor support increased. These results suggest that the threat of job insecurity may prompt employee moral disengagement; this effect is even stronger among employees who perceived higher levels of organizational and supervisor support. We interpret these counterintuitive findings in light of increasingly insecure contemporary work arrangements and how these may give rise to potentially unethical safety-related decision making and behavior.

Keywords Job insecurity · Perceived organizational support · Moral disengagement

Moral disengagement refers to the psychosocial process by which individuals cognitively mitigate the moral self-sanctions and consequences of engaging in unethical behavior (Bandura 1990, 2002). Although the study of moral disengagement has been examined extensively within the field of social psychology, it has also begun to garner attention within the business ethics community (e.g., Barsky 2011; Detert et al. 2008; Hystad et al. 2014). While much of this nascent literature has focused on outcomes such as deviant work behaviors, employee theft, and fraud, recent work has also linked moral disengagement with the enactment of unethical safety-related behavior. For example, Petitta,

Probst, and Barbaranelli (2017) found that employee moral disengagement predicted employee failure to properly report workplace accidents. Similarly, Hystad, Mearns, and Eid (2014) found that moral disengagement was predictive of risky and non-compliant safety behaviors.

In addition to understanding the *consequences* of moral disengagement, researchers (e.g., Barsky 2011; Treviño 1986) argue that future inquiry in this field needs to place greater emphasis on the interaction between the person and the situation (i.e., the organizational context) as *causes* of moral disengagement. Our study responds to this call by examining individual and organizational antecedents [specifically, job insecurity, perceived organizational support (POS), and perceived supervisor support (PSS)] and consequences of safety-related moral disengagement [specifically, safety compliance and safety organizational citizenship behaviors (OCBs)]. Using Conservation of Resources theory (Hobfoll 1989), social exchange theory (Blau 1964; Shore et al. 2006), and psychological contract breach (Rousseau 1989) as a theoretical foundation, we test the proposition that higher employee job insecurity will be associated

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with greater levels of subsequent safety-related moral disengagement, which in turn is related to reduced in-role and extra-role safety performance (i.e., lower compliance and safety OCBs). Moreover, we test competing hypotheses regarding the buffering vs. intensifying moderating impact of perceived organizational and supervisor support on the relationship between job insecurity and subsequent moral disengagement. On the one hand, high-quality social exchange relationships (i.e., high POS and PSS) may provide employees with greater access to resources and may enhance the ability of employees to better cope with the threat of job insecurity. On the other hand, individuals with high POS and/or PSS may be even more sensitive to the perceived breach of the social exchange relationship that accompanies job insecurity.

In testing these propositions, our study makes several important contributions to the literature. First, we seek to understand the role of new work arrangements in the development of potentially unethical decision making and behavior. Contemporary work arrangements such as an increased reliance on temporary and contingent workers and the use of flexible work contracts coupled with increasing globalization, outsourcing, and technological advancements ensure that the vast majority of workers today operate with few or no guarantees of job security. Indeed, Kalleberg (2013) argued that these factors have led to fundamental changes in the nature of work and an increasingly polarized workforce characterized by greater income inequality and less secure forms of employment compared to the circumstances faced by earlier generations of workers. Perhaps not surprisingly, national surveys (e.g., American Psychological Association surveys of Stress in America 2013, 2015) indicate that worries about work and income consistently rank among the top-rated stressors. Using a social exchange theory perspective (Blau 1964; Shore et al. 2006), our current study represents the first to test whether the resultant job insecurity that accompanies these phenomena is associated with greater safety-related moral disengagement on the part of employees. Moreover, we examine two distinct forms of job insecurity as potential antecedents of moral disengagement: *quantitative job insecurity*, which involves a perceived threat of job loss, and *qualitative job insecurity*, which is characterized by a perceived threat to one's valued job features (e.g., career, skills, and wage development; Hellgren et al. 1999).

Our study also bridges the literatures in the often disparate fields of job insecurity, moral disengagement, and occupational safety by examining the safety-related outcomes of moral disengagement within organizations. While a growing body of literature (e.g., Bohle et al. 2001; Probst and Brubaker 2001; Probst et al. 2013; Quinlan and Bohle 2009) links the stressor of job insecurity with adverse safety outcomes (e.g., decreased safety compliance, increased injuries, and greater accident under-reporting), this study is the first

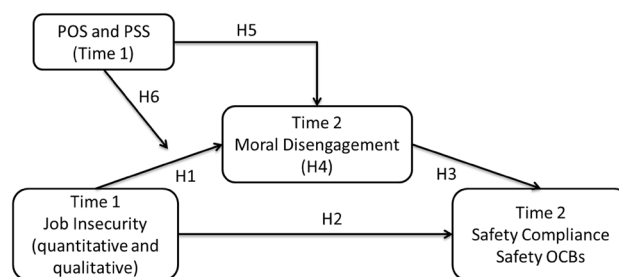


Fig. 1 Overarching conceptual moderated mediation model. *Note* POS perceived organizational support, PSS perceived supervisor support, OCBs organizational citizenship behaviors

to specifically test moral disengagement as an explanatory mechanism of these relationships between job insecurity and safety-related outcomes. In other words, we seek to examine whether employees use moral disengagement as a rationale for reducing in-role (i.e., lowered safety compliance) and extra-role (i.e., decreased enactment of safety-related OCBs) safety performance in the face of a perceived threat to one's job.

Finally, our study examines the interplay between individual (i.e., perceived quantitative and qualitative job insecurity) and contextual (i.e., perceived organizational and supervisor support) influences on employee use of moral disengagement. Specifically, we examine how perceived threats to one's job affects employee moral disengagement within the context of the employee's broader social exchange relationship with their organization. In doing so, we test the boundary conditions under which the relationship between job insecurity and moral disengagement may be buffered or exacerbated by employee levels of perceived support from their organization and supervisor. Figure 1 presents an overview of our overarching conceptual model. As can be seen, we expect a moderated mediation relationship between job insecurity, perceived organizational and supervisor support, moral disengagement, and safety performance.

Below we begin our review of the literature by considering in depth the concept of moral disengagement. Next, we introduce quantitative and qualitative job insecurity as individual antecedents of moral disengagement, and review literature on the relationships between job insecurity, moral disengagement, and safety performance. Finally, we introduce perceived organizational and supervisor support as organizational antecedents of moral disengagement and consider competing theoretical and empirical evidence regarding whether these variables buffer or intensify the relationship between employee job insecurity and safety-related moral disengagement.

Moral Disengagement

Moral disengagement (MD) is a social cognitive dimension originally proposed by Bandura (1990, 2002, 2016) in the framework of his social cognitive theory of moral agency. MD was introduced to clarify how people, despite being morally committed to ethical principles, may enact behaviors that violate shared norms, while continuing to profess the same principles and avoiding any feelings of conflict, guilt, shame or remorse. From an agentic viewpoint, moral reasoning is translated into moral action by means of self-regulatory mechanisms, self-sanctions and moral standards. People proactively behave in accordance with their own moral standards because this gives a sense of self-satisfaction and self-respect; people avoid transgressing established moral standards because doing so would trigger self-blame. However, moral standards are not invariant; rather, they can be deactivated by MD mechanisms. This de-activation process allows one to perform morally transgressive behavior avoiding the necessity of “altering” one’s own moral standards and the consequential self-sanctions. MD, thus, refers to those social cognitive processes by which a transgressive behavior is transformed such that it no longer has the negative qualities that serve as deterrent from its enactment.

MD operates through eight mechanisms by which self-sanctions of harmful conduct are deactivated (Bandura 1990). These mechanisms refer to four major points (or “foci”) in the self-regulatory system at which internal moral control can be disengaged from detrimental conduct. A first set of mechanisms operate by deconstructing or *re-constructing transgressive behavior* through moral justification (i.e., through: redefining the detrimental conduct as socially valuable and acceptable); advantageous comparisons (i.e., through the comparison of one’s behaviors with more reprehensible actions); and euphemistic labeling (i.e., by using convoluted verbiage to confer a respectable status to reprehensible activities). A second set of mechanisms operate by *obscuring personal causal agency* or distorting the relationship between one’s actions and their effects by means of displacement of responsibility (i.e., by the attribution to others the pressure to enact detrimental behavior) and diffusion of responsibility (by holding others around as responsible for damaging actions). A third set of mechanisms operate *altering the detrimental effects of one’s transgressive actions* through disregard (i.e., by minimizing, and/or ignoring these effects) or distortion (i.e., by misconstruing and discrediting the evidence of harm). A final set of mechanisms operates by *vilifying the recipients* of one’s misbehavior by means of dehumanization (i.e., divesting people of human qualities in order to exonerate oneself from damaging others) and attribution of blame (i.e., attributing others provocative conduct thus justifying the inevitable harming reaction).

A large body of research has demonstrated the disinhibitory power of MD and its strong associations with several manifestations of aggressive behavior, unethical decision making, and other forms of harmful conduct across different domains of functioning (Bandura et al. 1996, 2000; Detert et al. 2008; Fida et al. 2015; Moore et al. 2012). In explaining harmful conduct in organizations, several studies have attested to the role of MD in the performance of various behaviors that violate social and organizational norms: for example, corporate transgression and organizational corruption (Bandura et al. 2000; Barsky 2011; Barsky et al. 2006; Beu and Buckley 2004; Moore 2008); violations of legal and moral rules in producing harmful practices and products (Brief et al. 2001); violation of safety rules and accident unreporting (Barbaranelli and Perna 2004; Petitta et al. 2017); workplace harassment (Claybourn 2011), crimes of obedience (Beu and Buckley 2004); and general unethical behavior toward others at work (Barsky 2011; Moore et al. 2012). Below we discuss how job insecurity may trigger employee safety-related moral disengagement and subsequent decrements in safety-related performance.

Job Insecurity as a Predictor of Moral Disengagement

While acknowledging the agentic nature of individuals in self-regulating their conduct and choosing to morally disengage, previous research (e.g., Detert et al. 2008; Moore et al. 2012) has largely focused on MD as an individual difference propensity that is associated with stable personality traits such as empathy, trait cynicism, locus of control, and moral identity; moral reasoning abilities (e.g., cognitive moral development and relativism); and dispositional moral emotions such as dispositional guilt and shame. Yet, in Bandura’s conceptualization (e.g., Bandura 2016), MD is neither a personality trait nor a state-like construct. Rather, MD is a label attached to the mechanisms implied in a dynamic process which is related to the self-regulation of transgressive conduct within an agentic conception of the mind (Bandura 1990). The current study extends the prior nomological net (Cronbach and Meehl 1955) to examine perceived threats to one’s job in the form of quantitative and qualitative job insecurity as variables that may activate employee moral disengagement mechanisms.

Job insecurity is a subjective phenomenon involving employee perceptions regarding the extent to which “the nature and continued existence of one’s job are perceived to be at risk” (Sverke and Hellgren 2002, p. 27). In line with this, Hellgren and colleagues (1999) argued that there is an important theoretical distinction between qualitative job insecurity and quantitative job insecurity. Whereas the former reflects perceived threats of losing valued job features,

the latter reflects subjective assessments regarding potential loss of the job itself. Despite subsequent research supporting this distinction (e.g., Blau et al. 2004; O'Neill and Sevastos 2013), the vast majority of research on job insecurity has been limited to quantitative job insecurity. Yet, both forms of job insecurity represent perceived threats to one's job and, therefore, are both examined in the current study.

Research has demonstrated that the experience of job insecurity is interpreted by employees as a breach of the implicit psychological contract between employer and employee (De Cuyper and De Witte 2006, 2007; Vander Elst et al. 2016). Psychological contracts are idiosyncratic informal expectations held by workers regarding the nature of the social exchange relationship with their employing organization (Rousseau 1989). For example, one such psychological contract may be the provision of hard work and effort by employees in exchange for secure employment from their organization. Thus, the social exchange relationships between employers and employees are rooted in the norm of reciprocity (Gouldner 1960) and the expectation that there will be a balance between the obligations and entitlements on the part of the employer and employee (Conway and Briner 2005).

Indeed, Gouldner (1960) argued that the expectation of reciprocity is one of the universal moral norms and is vital to the maintenance of stable social systems. In other words, the generalized moral norm of reciprocity requires certain obligations on the part of the employer in exchange for benefits received from its employees. Not surprisingly, therefore, research has consistently found that the experience of job insecurity leads to the perception that one's employer has not fulfilled their obligations, i.e., a perceived breach of the moral norm of reciprocity (De Cuyper and De Witte 2006, 2007; Vander Elst et al. 2016).

Such a breach can then be expected to lead to the moral justification of "counter-breaches" in retaliation for the threat to one's job security. Thus, in response to the psychological contract breach posed by job insecurity, the norm of reciprocity suggests that job insecurity will result in altering one's contributions to the organization. Indeed, this has been demonstrated with task performance, innovative work behaviors, and organizational commitment (e.g., De Cuyper and De Witte 2006, 2007; Vander Elst et al. 2016).

In the current study, we expect a similar effect such that the perceived threat of job insecurity will lead employees to cognitively reframe safety violations and decreased safety OCBs as "justifiable forms of retribution toward an organization offering less than ideal conditions of employment" (Huang et al. 2017, p. 27; see also Claybourn 2011). To evaluate this process of cognitive re-framing, we explicitly measure safety-related MD in response to the twin threats of quantitative and qualitative job insecurity and hypothesize that:

Hypothesis 1 Higher quantitative (*1a*) and qualitative (*1b*) job insecurity will predict greater use of MD in safety-related decision making.

Job Insecurity and Safety Performance

In addition to the effect of job insecurity on safety-related MD, we also expect to observe significant direct effects of job insecurity on safety performance. Neal and Griffin (1997) proposed a model of safety performance consisting of two dimensions: task-related (or in-role) safety performance and contextual (or extra-role) safety performance. *Safety compliance* reflects task-related (i.e., the required component of) safety performance and refers to following established organizational safety procedures and appropriate safety protocols (e.g., lockout-tagout procedures; wearing ear plugs and/or hard hats). On the other hand, safety participation reflects discretionary extra-role *safety-related organizational citizenship behaviors* (e.g., voluntarily helping coworkers with safety-related issues, initiating safety improvements at work, etc.).

Over the past two decades, there have been a series of studies documenting a negative relationship between job insecurity and employee safety outcomes. In one of the first ones, a longitudinal study by Probst and Brubaker (2001) found that job insecurity was predictive of reduced safety compliance and more accidents and injuries. A follow-up experimental study (Probst 2002) manipulated the threat of layoffs, finding individuals threatened with job loss subsequently enacted more safety violations. Similarly, in a field study, Størseth (2006) found that greater job insecurity was associated with more risky safety behaviors. Most recently, in a cross-national study of employees in the US and Italy, Probst et al. (2013) found that job insecurity was also predictive of employee accident underreporting, i.e., failure to accurately report accidents and injuries when they occurred at work. On the basis of this prior research, we similarly expect to find that:

Hypothesis 2 Job insecurity will be negatively related to safety compliance (*2a*) and safety-related OCBs (*2b*).

We not only contribute to the literature by extending this earlier research to consider safety-related OCBs as an outcome of job insecurity, but more importantly, by proposing that MD serves as an explanatory mechanism for the relationships in H2. As we noted earlier, MD mechanisms affect the regulation of conduct by deactivating the internal control of moral standards, thereby allowing individuals to avoid emotional reactions related to specific moral infractions. Thus, MD mechanisms may be considered as cognitive distortions (Gibbs et al. 1995) or as a bias through which

individuals may view their own transgressive behavior and its negative consequences in a socially and morally favorable (or at least acceptable) way.

Accordingly, violating appropriate safety protocols and reducing one's safety-related OCBs may be rendered justifiable by invoking a variety of moral justifications (Barbaranelli and Perna 2004; Petitta et al. 2017). For example, employees may minimize the consequences of poor safety performance by rationalizing that safety risks are exaggerated and that most work is not as dangerous as portrayed. They may displace the responsibility for safety from the individual employee to designated company officials or one's supervisor. Another MD strategy may be to diffuse responsibility by claiming that "no one else complies, so why should I?" Thus, an individual worker may be exonerated from being responsible for his or her actions since the agency locus is shifted from the individual. Finally, by attributing blame for any workplace accidents to "inattentive workers," an employee may self-exonerate his or her own transgressions and potential contributions to a poor safety environment. Once these MD mechanisms are activated, engaging in norms violations (i.e., reduced compliance and OCBs) becomes easier for the individual. Thus, we hypothesize that:

Hypothesis 3 Higher levels of MD will be negatively associated with safety performance, including safety compliance (3a) and safety-related OCBs (H3b).

The combination of H1 and H3 implies a mediation process in which higher job insecurity renders more accessible the recourse to MD mechanisms, which in turn makes it easier to violate safety performance expectations. Within the domain of safety, the mediating role of MD has been empirically examined by Hystad et al. (2014) who found that higher levels of safety-related MD were associated with more safety violations and lower levels of discretionary safety behaviors (i.e., safety OCBs). While they did not examine job insecurity as an antecedent to the development of MD, they did find that perceived organizational injustice prompted MD and subsequent poorer safety performance. Although injustice and JI are unique constructs, they share similar attributes of perceived breach of the social exchange relationship between employee and employer. The mediation effect of MD has been also demonstrated by Huang and colleagues (2017) who found that MD represents the mediation mechanism through which job insecurity may give rise to interpersonal and organizational deviance. Finally, Fida and colleagues (2015) demonstrated that MD mediates the impact of negative emotions arising from stressors such as interpersonal conflict, workload, and organizational constraints on individual and organizational counterproductive work behaviors.

In a similar fashion, we expect that employees will react to job insecurity by re-framing their reduced safety performance so it no longer seems immoral or unethical. For example, employees may self-rationalize that they are spending less time on safety-related OCBs and safety performance so they can focus on "more important aspects of job performance" to better retain their job. It may be particularly seen as justifiable to morally disengage from focusing on safety, since research has found that employees perceive focusing on productivity will be more effective at retaining one's job than focusing on safety (Probst and Brubaker 2007). Accordingly, we predict:

Hypothesis 4 MD will mediate the relationship between job insecurity and safety performance (i.e., safety compliance, 4a, and safety-related OCBs, 4b).¹

The Role of Social Exchanges within Organizations

Social exchange theory posits that the behavior of employees is affected by the organizational context and network of relationships they have formed within that context (Blau 1964). In the current study, we consider two indicators of the social relationships employees have within their organizational context: perceived organizational support (POS) and perceived supervisor support (PSS). POS reflects global beliefs on the part of employees regarding the extent to which their employing organization values their contributions and cares about their overall well-being (Eisenberger et al. 1997). In a similar fashion, employees also formulate global assessments concerning the extent to which their supervisor supports and values their contributions and well-being (i.e., PSS; Kottke and Sharafinski 1988). Although these may appear to have high construct overlap, the basis for forming these assessments may differ. Whereas supervisors may

¹ Although our study focuses on moral disengagement as a mediating mechanism, we also acknowledge that there are other plausible explanatory variables accounting for the relationship between job insecurity and safety performance, including cognitive and affective-based explanatory mechanisms (Probst and Lavaysse 2017). For example, threat-rigidity theory would predict that job insecurity can result in cognitive failures (i.e., unintentional lapses in attention, memory, or motor functioning; Wallace and Chen 2005) which could lead to safety violations. Additionally, Probst and Brubaker (2001) found support for attitudinal and affective mediating mechanisms, such that the effects of job insecurity on compliance, injuries, and accidents were mediated by reductions in job satisfaction, safety knowledge and safety motivation. Thus, while we expect that moral disengagement will partially mediate the impact of job insecurity on safety performance, we nevertheless expect that direct effects will also be observed even after accounting for the effects via moral disengagement.

provide more tangible and individualized forms of support (e.g., mentorship, provision of a pay raise), organizations may be supportive through less tangible efforts (e.g., fostering a supportive work-family environment; Huffman et al. 2008).

Meta-analytic research has found that POS results in more positive employee outcomes, including higher levels of job satisfaction, greater organizational commitment, and better employee (contextual and task) performance (Riggle et al. 2009). Similarly, a recent meta-analysis of PSS (Ng and Sorensen 2008) found positive associations with job satisfaction and affective commitment, and negative relationships with turnover intentions. Pertinent to our current investigation, Claybourn (2011) found that employees who perceived their organizations to have a more positive climate (the measurement of which included perceived provision of support) exhibited significantly lower levels of MD. Therefore, on the basis of social exchange theory and this empirical evidence, we predict:

Hypothesis 5 Higher levels of POS (5a) and PSS (5b) will predict lower subsequent MD.

Does Support Buffer or Intensify the Impact of Job Insecurity on Moral Disengagement?

As noted earlier, exposure to quantitative and qualitative job insecurity represents a new reality facing today's employees. Thus, it is important to understand the mechanisms by which such insecurity results in adverse safety-related outcomes and to identify moderators to pinpoint avenues for the development of organizational intervention. In the current study, we examine the potential moderating impact of perceived organizational and supervisor support on employee reactions to job insecurity. As we demonstrate below, there is theoretical and empirical evidence to suggest competing hypotheses regarding the form (i.e., buffering vs. exacerbating) of this moderating effect.

The Buffering Argument

According to Conservation of Resources theory (Hobfoll 1989), employees are motivated to seek, protect, and retain resources. Such resources can be objects (e.g., owning a home), personal characteristics (e.g., self-efficacy), conditions (e.g., seniority, tenure), or energies (e.g., time, money, or knowledge). In particular, job security is considered a condition resource, given the latent and manifest benefits (Jahoda 1981) that stable employment provides (e.g., social status, identity, as well as financial resources to facilitate the acquisition of object resources). Potential or actual loss of valued

resources such as those accompanied by job insecurity are viewed as threats to the employee. However, Conservation of Resources theory also posits that employees facing the threat of resource loss are better able to cope when they have other resources to draw upon, since these resources may be valued in their own right and/or serve as an instrument to obtain other valued resources (i.e., so-called "resource caravans"). Thus, Conservation of Resources theory would suggest that positive organizational and supervisor support might serve as condition resources (Hobfoll 2001, 2011) that buffer against the negative consequences of job insecurity.

Not only do POS and PSS provide greater access to resources and therefore enhance the ability of employees to better cope with the threat of job insecurity, individuals with high-quality social exchange relationships may also be prone to seek and interpret information about their employer and supervisors that confirms their pre-existing perceptions of a positive social exchange relationship. Such confirmation bias (Nickerson 1998) may lead them to interpret any experienced job insecurity as less severe and/or unintentional on the part of their organization and supervisor. Rather, they may be more likely to attribute potentially negative job-related threats to external circumstances out of the control of the organization itself (Morrison and Robinson 1997; Turnley and Feldman 1999; Bal et al. 2010), rather than to deliberate breaches of the psychological contract.

Because of these dual factors (i.e., access to more resources and confirmation bias toward positively interpreting the threat of job insecurity), employees with higher POS and PSS should exhibit fewer tendencies toward MD in response to perceived qualitative or quantitative job insecurity. In support of this buffering hypothesis, Huang et al. (2017) found that high-quality leader-member exchange relationships attenuated the relationship between perceived (quantitative) job insecurity and subsequent MD. Specifically, whereas low-LMX employees responded to the threat of job insecurity with significantly higher levels of MD, levels of MD were unchanged as a function of job insecurity for their high-LMX counterparts. The authors interpreted these findings as evidence that employees who experience trust and support as a function of their high-quality exchange relationship find it more difficult to morally justify or excuse deviant behavior in response to job insecurity. On the basis of this theoretical and empirical foundation, we predict that:

Hypothesis 6a (buffering) High levels of POS and PSS will attenuate the relationship between job insecurity and safety-related MD.

The Intensifying Argument

Although there is ample justification for the buffering hypothesis, there are also theoretical reasons and empirical evidence to suggest that POS and PSS might instead intensify the effects of job insecurity on employee MD. Although this may seem initially counterintuitive, the intensifying hypothesis (Bal et al. 2010) suggests that individuals with high POS and PSS will be more sensitive to any breaches of the psychological contract (Coyle-Shapiro 2002; Restubog and Bordia 2006). In other words, in light of their perceived positive social exchange relationships, high POS and PSS employees may interpret the threat of job insecurity as a betrayal of the social exchange relationship (Elangovan and Shapiro 1998; Restubog and Bordia 2006) and a severe breach of the norm of reciprocity (Gouldner 1960). These enhanced negative reactions to the threat will then result in intensified negative reciprocation (including MD and justification of negative safety-related behaviors) on the part of employees (Eisenberger et al. 2004). On the other hand, Bal et al. (2010) argue that employees with low POS and PSS may already have low expectations regarding what they can obtain from their organization and supervisor. Thus, a potential contract breach (such as a perceived threat to one's job or its valued aspects) may be less predictive of subsequent acts of negative reciprocation.

Indeed, there is empirical evidence to support these contentions. For example, Bal et al. (2010) found that employees with high POS responded to a perceived psychological contract breach with significantly decreased OCBs and reduced in-role behavior. However, among low POS employees, there were no significant relationships between perceived breach and these outcomes. In another study by Restubog and Bordia (2006), researchers compared reactions to contract breach as a function of organizational and supervisor familism (constructs similar to POS and PSS referring to the quality of exchange relationships between employees and their employer/supervisor, as well as expectations of loyalty, reciprocity, and solidarity). In line with the intensifying hypothesis, they found that employees with high expectations of supervisor familism had stronger negative reactions to psychological contract breaches compared to employees with low supervisor familism. In yet a third study, Coyle-Shapiro (2002) found that greater trust in one's organization strengthened the relationship between perceived employer obligations (including long-term job security and career prospects within the company) and enactment of OCBs. In a similar fashion, we would expect that employees will react more negatively to a perceived threat to employer obligations (i.e., perceived quantitative and qualitative job insecurity) when POS and PSS are high. Thus, our competing hypothesis predicts:

Hypothesis 6b (intensifying) High levels of POS and PSS will magnify the relationship between job insecurity and safety-related MD.

Method

Participants and Procedure

To test our hypotheses, we collected anonymous survey data via Qualtrics from a sample of U.S. adult workers. Due to the anonymity of the data and low risk to participants, the study was classified as exempt by the first author's Institutional Review Board (Protocol #: 15967). Employees participated via Amazon's Mechanical Turk, an online human subjects' crowdsourcing platform. As recommended by Peer et al. (2014), we only recruited "high reputation" participants who had an established track record of providing high-quality data to previous crowd-sourced tasks. Specifically, we required a minimum 90% prior approval rating across a minimum of 100 previously completed tasks. Additionally, prior to being asked to complete the survey, potential participants responded to a brief pre-qualification test to ensure that they met our inclusion requirements. Specifically, respondents needed to indicate that they were currently employed. Moreover, due to the focus on safety-related MD and safety performance, only workers who indicated that they currently held a "position that exposes them to safety hazards or risk of injury" were allowed to participate in the study. These screening questions were embedded within a longer 6-item pre-survey qualification test to reduce the likelihood of potential participants providing false information to meet our requisite inclusion criteria.

Data were collected at two time points (baseline and a one-month follow-up). To incentivize continued participation at both times, participants were offered \$4 for completing the survey at Time 1 and an additional \$5 for completing the T2 survey. The initial sample consisted of $N = 499$ individuals at Time 1. Of these, $N = 398$ completed the second survey, resulting in an 80% retention rate. The final sample was predominantly male (57%). The average age of respondents was 35.77 years ($SD = 10.58$), with a range from 19 to 72. The vast majority (76%) held a permanent position within their organization. Over half (52.3%) had been with their current employer for 5 or more years ($M = 5.59$ years; $SD = 4.60$), with a range from less than 1 year to 32 years. The average years of education from respondents were 14.67 (roughly corresponding to "some college"). Finally, twenty-one different industry sectors were represented, with the largest numbers coming from health care (13%), retail trade (13%), manufacturing (10%), construction (9%), and transportation/warehousing (7%).

Measures

To reduce the problems associated with mono-method bias, we followed recommendations by Podsakoff et al. (2012) and introduced a 1-month temporal lag between our individual and contextual predictors of safety-related MD and safety performance. Specifically, our conceptual antecedents (job insecurity and perceived support) were measured at Time 1, whereas our subsequent outcomes (safety-related MD and safety performance) were measured one month later at Time 2.

Job Insecurity

Worries about losing one's job (quantitative JI) or valued aspects of one's job (qualitative JI) were measured using Hellgren, Sverke, and Isaksson's (1999) 6-item measure of quantitative and qualitative job insecurity. A sample quantitative item is, "I worry about being able to keep my job." A sample qualitative item is, "I feel worried about my career development in this organization." Other qualitative items focused on concerns regarding "future wage development" and "getting less stimulating work tasks in the future." Respondents indicated their agreement with each statement using a 5-point Likert scale ranging from 1 = *Strongly Disagree* to 5 = *Strongly Agree*.

Perceived Organizational and Supervisor Support

POS was measured using the shortened 6-item measure of POS validated by Eisenberger et al. (2001). A sample item is, "My organization really cares about my well-being." Similar to Eisenberger et al. (2002), we utilized the same 6 items substituting "supervisor" for "organization" to measure PSS. A sample item is "My supervisor shows little concern for me" (reverse-coded). All support items were responded to on a 5-point Likert scale ranging from 1 = *Strongly Disagree* to 5 = *Strongly Agree*.

Moral Disengagement

Safety-related MD was measured using the unidimensional Job Safety Moral Disengagement (JS-MD) scale originally developed by Barbaranelli and Perna (2004) and later abbreviated by Petitta et al. (2017). The 12-item JS-MD scale includes items reflecting the six different mechanisms of MD: moral justification; advantageous comparison; displacement of responsibility; diffusion of responsibility; distorting consequences; and attribution of blame. Sample items include, "Employees have more serious things to be preoccupied with than minor machinery malfunctions" and

"Safety checks are useless, because most machines will eventually malfunction." Response options could range from 1 = *Strongly Disagree* to 5 = *Strongly Agree*.

Safety-Related Performance

Safety performance was measured using two scales. The first assessed behavioral *safety compliance* (Probst and Brubaker 2001), a 5-item measure of safety-related task performance, whereas the second assessed safety participation, a 4-item contextual performance measure of *safety-related organizational citizenship behaviors* (Neal et al. 2000). A sample compliance item is "I conduct a proper risk assessment prior to beginning a task." A sample safety OCB item is "I voluntarily carry out tasks or activities that help to improve workplace safety." Both scales were responded to using a 7-point Likert scale ranging from 1 = *Strongly Disagree* to 7 = *Strongly Agree*.

Results

Test of Measurement Model

To test our measurement model, we performed an initial confirmatory factor analysis with MPlus (Muthén and Muthén 1998–2012) using robust maximum likelihood estimation consisting of the hypothesized seven latent variables (i.e., quantitative job insecurity, qualitative job insecurity, POS, PSS, MD, safety compliance, and safety OCBs) and their respective item-level indicators. We then compared the fit of this model with three plausible alternative models: one that combined the two forms of job insecurity into a single factor, one that combined the two forms of support into a single factor, and finally, one that combined the two forms of safety performance into a single factor. Based on the model fit indices shown in Table 1 and the Satorra-Bentler Scaled Chi-Square difference tests of the nested models, the best fitting model appeared to be the hypothesized seven factor model.

Descriptive Statistics

Table 2 presents the descriptive statistics, scale reliabilities, and intercorrelations among the study variables at the two time points. Consistent with previous research, both quantitative and qualitative job insecurity (measured at T1) were significantly and negatively correlated with subsequent T2 measures of safety compliance ($r = -0.27$ and -0.29 , respectively, $p < 0.001$) and safety OCBs ($r = -0.22$ and -0.25 , respectively, $p < 0.001$). Moreover, both forms of job insecurity (measured at T1) were significantly and positively related to MD at Time 2 ($r = 0.30$ and 0.24 , respectively,

Table 1 Confirmatory factor analysis results

Model	χ^2	df	CFI	TLI	RMSEA	SRMR	Satorra–Bentler (S–B) scaled χ^2	Δ df	S–B scaling correction factor
Hypothesized 7 factor model	1376.55	681	0.92	0.91	0.051	0.064	–	–	1.364
Model combining JI-quant and JI-qual	1579.82	687	0.90	0.89	0.057	0.069	203.27*	6	1.364
Model combining POS and PSS	1683.35	687	0.88	0.88	0.060	0.067	198.69*	6	1.371
Model combining safety compliance and OCBs	1877.72	687	0.86	0.85	0.066	0.089	338.79*	6	1.370

Jl-quant Quantitative job insecurity, *Jl-qual* qualitative job insecurity, *POS* perceived organizational support, *PSS* perceived supervisor support
Satorra–Bentler scaled χ^2 test reflect difference test between Model 1 and the respective nested model

* $p < 0.01$

Table 2 Descriptive statistics

Variable	<i>M</i>	<i>SD</i>	1	2	3	4	5	6	7
1. Quantitative job insecurity (T1)	2.24	1.18	<i>0.94</i>						
2. Qualitative job insecurity (T1)	2.73	1.14	0.65	<i>0.85</i>					
3. Perceived organizational support (T1)	3.47	0.96	–0.43	–0.48	<i>0.92</i>				
4. Perceived supervisor support (T1)	3.67	0.94	–0.38	–0.37	0.78	<i>0.92</i>			
5. Moral disengagement (T2)	2.04	0.75	0.30	0.24	–0.15	–0.19	<i>0.92</i>		
6. Safety compliance (T2)	5.42	1.27	–0.27	–0.29	0.26	0.25	–0.62	<i>0.89</i>	
7. Safety OCBs (T2)	5.43	1.18	–0.22	–0.25	0.42	0.37	–0.30	0.51	<i>0.88</i>

Listwise $N = 398$; all correlations significant at $p < 0.01$. Cronbach’s alpha reliability coefficients are italicized on the diagonal

$p < 0.001$). Further, higher levels of safety-related MD were associated with less safety compliance ($r = -0.62, p < 0.001$) and enactment of fewer safety OCBs ($r = -0.30, p < 0.001$). Finally, perceived organizational and supervisor support at T1 were both negatively related to subsequent T2 levels of MD ($r = -0.15$ and -0.19 , respectively, $p < 0.005$).

Hypothesis Tests

To test our first stage moderated mediation model (Edwards and Lambert 2007), we used the SPSS PROCESS macro (Model 7) created by Hayes (2012). In addition to providing regression coefficients for the specified paths, it also utilizes $N = 5000$ samples to obtain bias corrected bootstrap confidence intervals of the direct and conditional indirect effects, as well as index of moderated mediation.

Table 3 presents the results of these model tests examining the moderating role of POS in the relationships between quantitative and qualitative job insecurity and safety-related MD. As can be seen, in support of Hypothesis 1, quantitative job insecurity was a significant predictor of subsequent levels of MD ($B = 0.21, p < 0.01$), as was qualitative job insecurity ($B = 0.13, p < 0.01$). As predicted by Hypothesis 2, quantitative job insecurity significantly predicted later levels

of safety compliance ($B = -0.10, p < 0.05$) and safety OCBs ($B = -0.14, p < 0.01$). Similarly, qualitative job insecurity at T1 predicted T2 safety compliance ($B = -0.17, p < 0.01$) and safety OCBs ($B = -0.20, p < 0.01$).

MD was predictive of reduced safety compliance ($B = -1.01, p < 0.01$) and safety OCBs ($B = -0.40, p < 0.01$) in response to quantitative job insecurity. Similarly, MD was associated with lower safety compliance ($B = -0.99, p < 0.01$) and safety OCBs ($B = -0.40, p < 0.01$) in response to qualitative job insecurity. Both of these findings lend support to Hypothesis 3, as well as Hypothesis 4. However, because both qualitative and quantitative job insecurity remained significant predictors even after accounting for employee MD, this indicates a partial (rather than fully) mediating effect of MD. Additionally, while the zero-order correlations suggested negative relationships between POS and MD, these effects were non-significant in any of the models tested, thus failing to support Hypothesis 5a.

Finally, as predicted by Hypothesis 6, POS moderated the relationship between T1 quantitative ($B = 0.12, p < 0.01$) and qualitative ($B = 0.14, p < 0.01$) job insecurity and T2 MD. Figure 2 illustrates the strength of the conditional indirect effect of quantitative job insecurity on safety compliance via MD at the mean and ± 1 SD from the mean values of POS. As can be seen, the strength of the indirect mediating

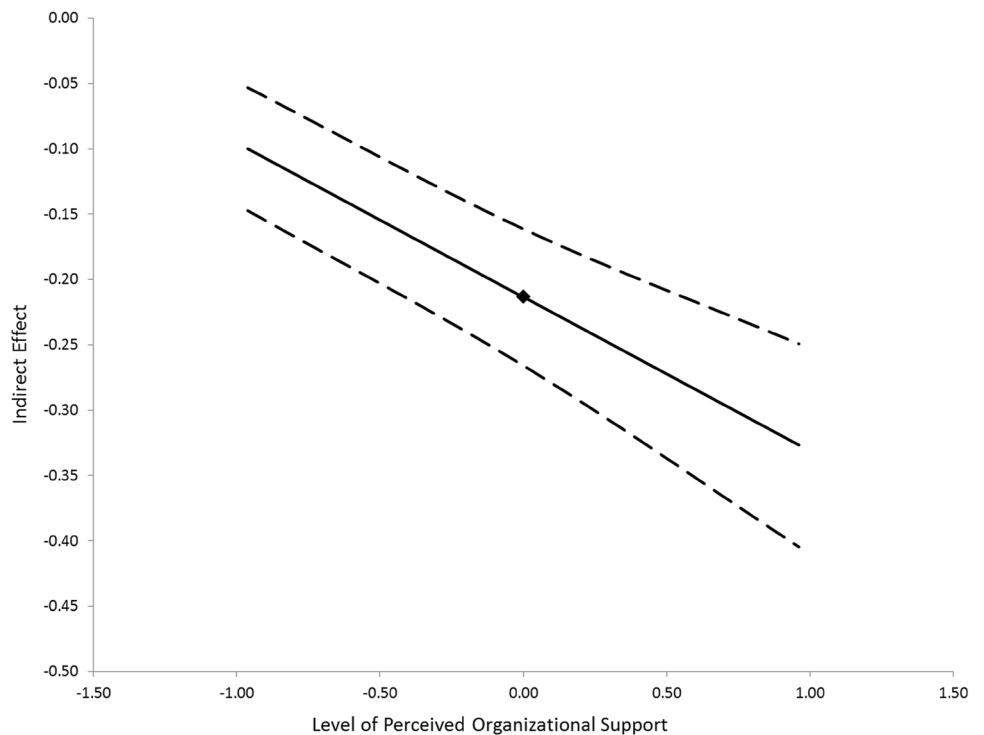
Table 3 Moderated mediation results: perceived organizational support

Effect	B	SE	95% CI	B	SE	95% CI	
Intercept	2.10**	0.04	[2.03; 2.18]	2.10**	0.04	[2.03; 2.18]	
JI-quant → MD	0.21**	0.03	[0.15; 0.28]	0.21**	0.03	[0.15; 0.28]	
POS → MD	-0.02	0.04	[-0.10; 0.06]	-0.02	0.04	[-0.10; 0.06]	
JI-quant × POS → MD	0.12**	0.03	[0.06; 0.17]	0.12**	0.03	[0.06; 0.17]	
		$F(3, 394) = 19.34, p < 0.001; R^2 = 0.13$				$F(3, 394) = 19.34, p < 0.001; R^2 = 0.13$	
Safety compliance				Safety OCBs			
Intercept	7.47**	0.15	[7.18; 7.77]	6.23**	0.17	[5.90; 6.57]	
MD → outcome	-1.01**	0.07	[-1.14; -0.87]	-0.40**	0.08	[-0.55; -0.24]	
JI-quant → outcome	-0.10*	0.04	[-0.19; -0.02]	-0.14**	0.05	[-0.24; -0.04]	
		$F(2, 395) = 130.44, p < 0.001; R^2 = 0.40$				$F(2, 395) = 23.33, p < 0.001; R^2 = 0.11$	
Index of moderated mediation	-0.12	0.04	[-0.20; -0.05]	-0.05	0.02	[-0.09; -0.02]	
Intercept	2.12**	0.04	[2.03; 2.19]	2.12**	0.04	[2.03; 2.19]	
JI-qual → MD	0.13**	0.04	[0.06; 0.20]	0.13**	0.04	[0.06; 0.20]	
POS → MD	-0.06	0.04	[-0.14; 0.03]	-0.06	0.04	[-0.14; 0.03]	
JI-qual × POS → MD	0.14**	0.03	[0.08; 0.19]	0.14**	0.03	[0.08; 0.19]	
		$F(3, 394) = 15.66, p < 0.001; R^2 = 0.11$				$F(3, 394) = 19.34, p < 0.001; R^2 = 0.13$	
Safety compliance				Safety OCBs			
Intercept	7.45**	0.15	[7.16; 7.73]	6.22**	0.17	[5.90; 6.55]	
MD → outcome	-0.99**	0.07	[-1.12; -0.86]	-0.40**	0.08	[-0.54; -0.24]	
JI-qual → outcome	-0.17**	0.04	[-0.26; -0.09]	-0.20**	0.05	[-0.30; -0.10]	
		$F(2, 395) = 138.47, p < 0.001; R^2 = 0.41$				$F(2, 395) = 27.46, p < 0.001; R^2 = 0.12$	
Index of moderated mediation	-0.14	0.04	[-0.21; -0.07]	-0.05	0.02	[-0.10; -0.02]	

JI-quant Quantitative job insecurity, JI-qual qualitative job insecurity, MD moral disengagement, POS perceived organizational support

* $p < 0.05$; ** $p < 0.01$

Fig. 2 Conditional indirect effect of quantitative job insecurity on safety compliance via moral disengagement as a function of level of perceived organizational support



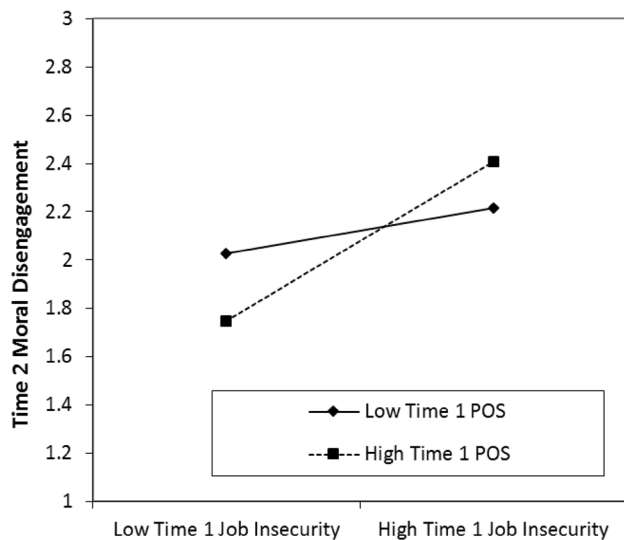


Fig. 3 Moderating effect of perceived organizational support (POS) on the relationship between Time 1 quantitative job insecurity and Time 2 levels of moral disengagement

effect becomes increasingly larger with higher levels of POS. Figure 3 illustrates the form of the interaction between quantitative job insecurity and POS. In support of the intensifying hypothesis (6b) rather than the buffering hypothesis (6a), the relationship between job insecurity and MD is stronger under conditions of high (+1 SD) POS, rather than low (−1 SD) POS.²

Table 4 presents the results of the model tests incorporating PSS as the moderating variable. As can be seen, these results are very consistent with the POS results. Specifically, quantitative and qualitative job insecurity predicted MD, which in turn was significantly associated with safety compliance and OCBs. Moreover, the relationship between both forms of job insecurity and subsequent MD was strengthened as levels of PSS increased. However, unlike with POS, PSS did demonstrate significant main effects on levels of MD such that higher levels of Time 1 supervisor support were predictive of lower Time 2 MD, thus providing support for Hypothesis 5b.

Discussion

The world-wide economic instability produced by the financial crisis of 2008 increased the use of new work arrangements (e.g., temporary work, flexible work

contracts) that cause many of today's workers to operate with few or no guarantees of job security. While the detrimental impact of job insecurity on safety outcomes (e.g., decreased safety compliance and OCBs) has been previously documented, the current study is the first to specifically test MD as an explanatory mechanism of these relationships. As such, the first purpose of the current study was to examine the extent to which employees perceived threat to one's job (i.e., job insecurity) prompts the development of strategies that enable them to self-exonerate from the responsibilities of their safety misconduct (i.e., MD), thus enacting poor in-role (i.e., compliance) and extra-role (i.e., OCB) safety performance. Furthermore, the research aimed to test the boundary conditions under which employees' use of MD as a rationale for reducing safety performance in the face of perceived job instability may be buffered or exacerbated by employee levels of perceived support from their organization and supervisor. In doing so, we sought to gain a better understanding of the interplay between individual (i.e., perceived quantitative and qualitative job insecurity) and contextual (i.e., perceived organizational and supervisor support) influences on employee use of MD and subsequent poor safety performance.

Our findings from a two-wave lagged design suggest that the threat of job insecurity, both quantitative (i.e., perceived likelihood of job loss) and qualitative (i.e., perceived threat to one's career and wage development), may prompt later employee MD, which in turn was associated with decreased employee engagement in safety compliance and OCBs. MD partially mediated the job insecurity–safety outcomes relationship in that both quantitative and qualitative job insecurity also directly predicted lower levels of safety compliance and safety OCBs.

More interestingly, the conditional indirect effects of job insecurity on safety performance via MD were intensified as levels of perceived organizational and supervisor support increased. That is, employees who perceived higher levels of organizational and supervisor support were even more sensitive to the perceived breach of the social exchange relationship that accompanies job insecurity, thus activating more self-exonerating strategies for their own safety violations and consequently performing poorer safety behaviors (i.e., lower compliance and OCBs). As such, organizations with high levels of organizational and supervisor support may expect greater MD on the part of employees as a result of a perceived threat to their job insecurity, which is likely interpreted as a breach of the reciprocity between employees and employer (De Cuyper and De Witte 2006, 2007; Vander Elst et al. 2016).

² The conditional indirect effects and interactions for the remaining 7 models tested were all consistent with the effects shown in Figs. 2 and 3. Complete sets of these results can be obtained upon request from the first author.

Table 4 Moderated mediation results: perceived supervisor support

Effect	B	SE	95% CI	B	SE	95% CI
Intercept	2.07**	0.04	[2.00; 2.14]	2.07**	0.04	[2.00; 2.14]
JI-quant → MD	0.18**	0.03	[0.11; 0.25]	0.18**	0.03	[0.11; 0.25]
PSS → MD	-0.08*	0.04	[-0.16; -0.00]	-0.08*	0.04	[-0.16; -0.00]
JI-quant × PSS → MD	0.06*	0.03	[0.00; 0.11]	0.06*	0.03	[0.00; 0.11]
	$F(3, 394) = 15.49, p < 0.001; R^2 = 0.11$			$F(3, 394) = 15.49, p < 0.001; R^2 = 0.11$		
	Safety compliance			Safety OCBs		
Intercept	7.47**	0.15	[7.18; 7.77]	6.23**	0.17	[5.90; 6.57]
MD → outcome	-1.01**	0.07	[-1.14; -0.87]	-0.40**	0.08	[-0.55; -0.24]
JI-quant → outcome	-0.10*	0.04	[-0.19; -0.02]	-0.14**	0.05	[-0.24; -0.04]
	$F(2, 395) = 130.44, p < 0.001; R^2 = 0.40$			$F(2, 395) = 23.33, p < 0.001; R^2 = 0.11$		
Index of moderated mediation	-0.06	0.04	[-.12; 0.01]	-0.02	0.02	[-0.06; 0.00]
Intercept	2.08**	0.04	[2.00; 2.15]	2.08**	0.04	[2.00; 2.15]
JI-qual → MD	0.12**	0.03	[0.05; 0.19]	0.12**	0.03	[0.05; 0.19]
PSS → MD	-0.12**	0.04	[-0.21; -0.04]	-0.12**	0.04	[-0.21; -0.04]
JI-qual × PSS → MD	0.08*	0.03	[0.02; 0.14]	0.08*	0.03	[0.02; 0.14]
	$F(3, 394) = 12.09, p < 0.001; R^2 = 0.08$			$F(3, 394) = 12.09, p < 0.001; R^2 = 0.08$		
	Safety compliance			Safety OCBs		
Intercept	7.45**	0.15	[7.16; 7.73]	6.22**	0.17	[5.90; 6.55]
MD → outcome	-0.99**	0.07	[-1.12; -0.86]	-0.40**	0.08	[-0.54; -0.24]
JI-qual → outcome	-0.17**	0.04	[-0.26; -0.09]	-0.20**	0.05	[-0.30; -0.10]
	$F(2, 395) = 138.47, p < 0.001; R^2 = 0.41$			$F(2, 395) = 27.46, p < 0.001; R^2 = 0.12$		
Index of moderated mediation	-0.08	0.04	[-0.15; -0.01]	-0.03	0.02	[-0.07; -0.00]

JI-quant Quantitative job insecurity, JI-qual qualitative job insecurity, MD moral disengagement, PSS perceived supervisor support

* $p < 0.05$; ** $p < 0.01$

Theoretical and Practical Implications

Our results have implications for the extant literature in the areas of job insecurity, MD, and job insecurity. First, we extended earlier research by Huang et al. (2017) showing a relationship between quantitative job insecurity and generalized MD by demonstrating that both quantitative and qualitative forms of job insecurity are associated with greater subsequent use of safety-related MD. Thus, it appears that an erosion in the social exchange relationship due to the perception of either *a threat to one's job* or *valued aspects of one's job* can lead employees to utilize MD to avoid moral self-sanctions and justify lower levels of safety compliance and less engagement in safety-related OCBs.

Second, the results of this research also inform the job insecurity literature by demonstrating an additional explanatory mechanism for the relationship between job insecurity and poor safety performance. Researchers (e.g., Probst and Brubaker 2001) have previously found support for attitudinal and affective mediating mechanisms (e.g., safety knowledge, job satisfaction, safety motivation) in explaining the effects of job insecurity on compliance, injuries and accidents. Our findings build upon this previous work by also suggesting

that MD processes can partially explain the observed relationships between job insecurity and poor safety performance. In other words, job insecurity can lead to poorer safety outcomes as a result of cognitively re-framing poor safety behaviors as justifiable in light of perceived organizational violation of the psychological contract and the norm of reciprocity.

Third, we respond to calls from researchers in the field of behavioral ethics to examine individual and organizational contextual variables as causes of MD, rather than focusing on MD as primarily a consequence of relatively stable individual differences (McAlister 2001) or personality traits (Detert et al. 2008). Our findings suggesting an interaction of individual perceptions of job insecurity with organizational and supervisor support comports with Bandura's (2002) assertion that MD is a function of reciprocal interactions between the individual and their environment (i.e., an interplay of personal and social influences). In the current study, we found evidence that employee perceptions of job insecurity coupled with levels of support obtained from supervisors and their organization jointly determined subsequent levels of employee MD. Moreover, the conditional indirect effects indicate that the negative relationship between job

insecurity and poor safety performance via MD is strengthened with higher levels of support.

Finally, our findings add another piece to the admittedly mixed literature regarding the buffering vs. intensifying role of PSS/POS in contributing to employee MD. Huang et al. (2017) found that LMX buffered the impact of job insecurity on employee MD; yet, Bal et al. (2010) found that POS intensified employee MD reactions to perceived contract breach. Our current results lend additional support to that intensifying hypothesis, suggesting that greater POS and PSS can have seemingly counterintuitive negative effects on safety-related MD particularly when organizational conditions exist (such as those that give rise to job insecurity) that may undermine those perceptions of support.

From a practical perspective, our results suggest that organizations with positive social exchange relationships with their employees may be at greater risk of negative employee outcomes in response to perceived breaches of those positive exchange relationships. Thus, while high POS and PSS are broadly acknowledged to be positive forces within organizations and something to strive for, they may also set employees up to feel even greater betrayal and have more negative reactions to the perceived threat of job loss or potential loss of valued features of one's job.

This poses a conundrum for organizations particularly in light of contemporary workplace trends toward less secure forms of employment. How can organizations capitalize on the benefits of POS and PSS while not risking inadvertent negative effects when the norm of reciprocity involving those social exchange relationships is perceived to be violated (for example, under times of heightened perceived job insecurity)? The answer may yet lie in the mixed support for the buffering vs. intensifying hypotheses. Specifically, there may be a third (as yet untested) variable that moderates the two-way interaction between job insecurity and support, such that in some circumstances the ideal buffering relationship is found and in other circumstances the intensifying effect is observed. Drawing from the literature, one such variable may be organizational communication.

Jiang and Probst (2014) found that greater organizational communication (i.e., open exchange of information between employees and management) significantly attenuated the negative effects of job insecurity on workplace accidents. On the other hand, when organizational communication was poor, there was a strong positive relationship between job insecurity and employee experiences of workplace accidents, such that employees with high job insecurity (+ 1 SD) experienced eight times as many accidents compared to employees with low job insecurity (− 1 SD). They posited that the combination of a fear of job loss coupled with a lack of information coming from the organization weakens “an already compromised resource reservoir (p. 564).” Extrapolating these findings to the current study, a restricted flow of

information during times of job uncertainty may lead to the intensifying pattern of findings due to a compounding of the perception of betrayal, whereas a free flow of information between employer and employees may further support the perception that the organization is truly trying their best to support and protect their workers even when forces may lead to the perception of job insecurity.

Enhanced organization communication is a strategy that is also aligned with contemporary interventions to enhance business ethics. At the supervisor level, leaders who want their subordinates to uphold ethical standards are recommended to make it psychologically safe (Dollard and Bakker 2010) for employees to speak up about their concerns. Leaders are encouraged to go beyond a simple “open door policy” to truly welcoming employee expressions regarding even controversial issues. This can prevent employee perceptions of futility (i.e., “speaking up isn't worth the effort”; “no one wants to hear it”) or fear that speaking up will lead to retribution or harsh reactions (Carucci 2016). Leaders are also encouraged to make ethical behavior and integrity a routine conversation, rather than something that is only discussed as part of an organization's compliance program or in response to egregious safety incidents (Carucci 2016).

At the organizational level, widespread line managerial and supervisory behavior consistent with above recommendations could be achieved with training programs that may assist supervisors in developing ethical communication skills. Additionally, organizations should design policies and norms that keep ethics top of mind among organizational members. Yet, they are also advised to spread communication about the positive examples of ethical behavior (not just the bad ones) and reinforce the good things people do (e.g., safety compliance that helps containing unwanted injuries/accidents), thus strengthening ethical choices as ‘the norm’ of the organization. Lastly, safety-related training programs might also help to enhance employees' awareness of their own moral reasoning and the specific MD mechanisms they use to develop morally disengaged decision making as a reaction to perceived job uncertainties.

Limitations and Future Directions

Although this study makes several contributions to the extant literature, it also suffers from some limitations that should be addressed in future research efforts. First, MD clearly only partially accounts for the relationship between job insecurity and poor safety performance. Thus, these partial mediation effects indicate a need to explore other explanatory/mediating variables, particularly those that are potentially less intentional but nevertheless occur in response to the stress associated with job insecurity and subsequent safety violations. Specifically, while the current study suggests that MD is an intentional justification of deviant safety-related

behavior (Petitta et al. 2017) in response to job insecurity, poor safety outcomes can also occur due to unintentional lapses in attention to safety (e.g., cognitive failures). As such, future research inquiry might explore the additional role of inadvertent cognitive failures (i.e., unintentional lapses in attention, memory, or motor functioning; Wallace and Chen 2005) as responses to job insecurity that contribute to predict safety violations and poor safety performance.

Second, the current study rests upon the contention that job insecurity represents a psychological contract breach between employee–employer. While empirical research strongly supports this contention (e.g., De Cuyper and De Witte 2006, 2007; Vander Elst et al. 2016), future studies should include an explicit measurement of psychological contract breach alongside measures of job insecurity, MD and safety performance to verify this assumption.

Third, future studies might also extend the current findings by examining other safety-related outcomes of the job insecurity-MD link beyond compliance and OCBs. For example, future research might consider accident underreporting, as well as actual experiences of workplace injuries, accidents and near misses.

Fourth, although drawing from a broadly diverse sample of workers throughout the United States employed within a wide variety of industry sectors, the current study nevertheless relies on self-report data from a convenience sample. Therefore, it is unclear if self-selection biases in the kinds of employees that agreed to participate may have affected our findings. Therefore, additional replication of our effects would be useful, within the U.S. and also to other cultural contexts.

Finally, while cross-lagged data used in the current research help to minimize common method variance by introducing temporal distance between our predictors and outcomes, future studies gathering 3 (or more) wave data would be ideal for testing longitudinal hypotheses. Such longitudinal research could examine within-person processes (i.e., MD strategies) using latent growth curve models. Furthermore, longitudinal data could also better delineate the potentially recursive relationships between contextual factors (i.e., perceived organizational and supervisor support) and MD mechanisms proposed by Social Cognitive Theory (Bandura 2002).

Conclusion

Using social exchange theory and psychological contract breach as a theoretical foundation, this study tested (and found support for) the proposition that higher levels of employee job insecurity are associated with greater use of subsequent safety-related MD, which in turn is related to reduced safety performance in the form of in-role safety

compliance and extra-role safety-related OCBs. Moreover, we found that higher levels of perceived organizational and supervisor support intensified the impact of job insecurity on subsequent MD. These seemingly counterintuitive results suggest that organizations (particularly those with positive social exchange relationships with their employees) need to take care during times of organizational transition so as not to prompt the rise in unethical safety-related decision making and behavior among employees in response to perceived job insecurity.

Acknowledgements Tahira M. Probst, Department of Psychology, Washington State University; Laura Petitta, Department of Psychology, Sapienza University of Rome; Claudio Barbaranelli, Sapienza University of Rome; Christopher Austin, Department of Psychology, Washington State University. This research was partially supported by a Visiting Professor Research Award (#C26V16BRA2) granted to the first and third authors from the Sapienza University of Rome, in conjunction with a WSU College of Arts and Sciences International Faculty Travel Grant awarded to the first author.

Compliance with Ethical Standards

Conflict of interest The authors declare that there are no conflicts of interest.

Ethical Approval All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards. All participants were provided with informed consent and could freely decline participation.

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