RESEARCH ARTICLE

Mindfulness and emotion: a five-level analysis

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Abstract

Based on the five-level model of emotions in the workplace (FLMEW), we present an analysis of emotion and mindfulness at work. The five levels of emotion are: (1) temporal variations in emotion at the within-person level of analysis, which relate to state mindfulness; (2) stable individual differences in experiencing and expressing emotions at the between-persons level, which correspond with trait mindfulness; (3) perceiving and communicating emotions in dyadic relationships at the inter-personal level, reflecting inter-personal mindfulness; (4) emotional processes and leadership at the group level, which are associated with team mindfulness; and (5) and emotional culture and climate at the organizational level, which relate to organizational mindfulness. We provide a definition of mindfulness at each level. We argue that mindfulness tends to be associated with more positive and less negative affective experience at each level. We highlight practical implications and suggest future research at each level.

Research on mindfulness at work has been growing rapidly in recent years. Defined as self-regulated attention on present-moment experience with an open, nonjudgmental, and accepting attitude (Bishop et al., 2004), mindfulness has widespread implications for emotion and behavior in the workplace (for reviews, see Good et al., 2016; Kay, Masters-Waage, & Skarlicki, 2019). For individual employees, mindfulness facilitates emotion regulation (Chambers, Gullone, & Allen, 2009; Hill & Updegraff, 2012; Hülsheger, Alberts, Feinholdt & Lang, 2013) as well as more positive affect and less negative affect (Brown & Ryan, 2003), resulting in more pro-social workplace behaviors (Hafenbrack, Cameron, Spreitzer, Zhang, Noval, & Shaffakat, 2020; Kay & Skarlicki, 2020; Sawyer, Thoroughgood, Stillwell, Duffy, Scott, & Adair, 2021) and less anti-social workplace behaviors (Liang, Brown, Ferris, Hanig, Lian, & Keeping, 2018; Liang, Lian, Brown, Ferris, Hanig, & Keeping, 2016; Long & Christian, 2015). For teams, mindfulness has been shown to temper the link between relationship conflict and social undermining at work (Yu & Zellmer-Bruhn, 2018), as well as promote work engagement by facilitating recovery from job-related stress (Liu, Xin, Shen, He, & Liu, 2020). For organizations, mindfulness has been positively associated with organizational trust (Tabancali & Öngel, 2020) and collaborative climate (Tabancali & Öngel, 2022). In short, mindfulness matters at all levels of organizational life.

Accordingly, Sutcliffe, Vogus, and Dane (2016) outlined a multi-level theory of mindfulness in organizations. After canvassing prior research on the relevance of mindfulness at the intrapersonal, interpersonal, group, and organizational levels separately, they noted a paucity of work on the role of mindfulness across levels. In particular, they emphasized the potential importance of affective mechanisms in cross-level mindfulness research. In so doing, they tentatively advanced emotion regulation and emotional intelligence as promising mechanisms by which

individual mindfulness may foster mindfulness at higher levels of the organization, and they called for work clarifying the cross-level implications of mindfulness at work.

Responding to this call, in the present article, we map mindfulness onto Ashkanasy's (2003a; see also Ashkanasy & Dorris, 2017; Ashkanasy & Humphrey, 2011) Five-Level Model of Emotions in the Workplace (which Ashkanasy [2021] refers to as the FLMEW). We first introduce the FLMEW and examine the relationship between emotion and mindfulness at each of the five levels in the model. We then discuss how the components of the FLMEW can be viewed as an integrated multi-level model of emotions and mindfulness in organizations, clarifying the differences between different conceptions of mindfulness at each of the five levels, and arguing that mindfulness at one level can affect important outcomes at other levels of the organization. After suggesting directions for future research on emotions and mindfulness at each level of analysis, we discuss the practical relevance of our model, highlighting how it can help managers identify new ways to cultivate mindfulness at different levels of the organization.

The five-level model of emotion in the workplace (FLMEW)

Level 1 of the FLMEW refers to employees' experiences of in-the-moment affect and emotion (Clark et al., 1989). At this level, the emphasis is on how employees respond to what Weiss and Cropanzano (1996) refer to as 'affective events.' Such events are in-the-moment occurrences that happen every day in their workplace. At level 2, the focus is on individual differences such as trait affectivity (Watson & Tellegen, 1985) and emotional intelligence (Mayer & Salovey, 1997), and how employees varying on such variables might enact and experience emotions. The way employees perceive and communicate their emotions in interpersonal exchanges is addressed at level 3 of the FLMEW, including the effects of interpersonal emotion regulation (Troth, Lawrence, Jordan, & Ashkanasy, 2018; Zaki & Williams, 2013) and emotional labor (Grandey, 2000; Hochschild, 1983). At level 4, attention shifts to more collective effects such as group affective tone (George, 2000), emotional contagion (Hatfield, Cacioppo, & Rapson, 1993), and emotional leadership (Humphrey, 2002). Finally, at level 5, central concepts include emotional climate (Ashkanasy & Nicholson, 2003; de Rivera, 1992) and culture (Ashkanasy & Härtel, 2014).

Ashkanasy (2003b) makes the point that, although they are conceptually distinct, emotional attitudes and behaviors at each level of the FLMEW link across the five levels of analysis, resulting in a complex and inter-connected picture of organizational functioning. In effect, emotions at the different levels 'cascade throughout the organization, subsequently impacting key organizational variables that underpin organizational performance' (Ashkanasy, Härtel, & Bialkowski, 2020: 375). In the following sections, we discuss the five levels of the FLMEW and discuss research on mindfulness at work at each level of analysis (see Figure 1).

Level 1: within person

Level 1 in the FLMEW is based on Weiss and Cropanzano's (1996) affective events theory (AET). At the core of this theory is the idea that 'affective events' emanating from the organization's environment (e.g., change, leader behavior) lead employees to experience particular *emotions* (e.g., fear, anger, happiness, or sadness) that are acute and object-oriented (e.g., fear of a threat or anger when goals are thwarted). Such reactions can then become *moods*, which tend not to be object-oriented and are longer lasting than emotions (Frijda, 1986).

Weiss and Cropanzano (1996) argue that both emotions and moods translate into one of two forms of behavior. The first is spontaneous 'affect-driven' behavior, which may be either positive (e.g., helping a colleague) or negative (e.g., shouting at a colleague). This form of behavior represents a direct response to the event, mediated by the employee's emotional or mood state. The second form is deliberative 'judgment-driven' behavior like deciding to quit or be more
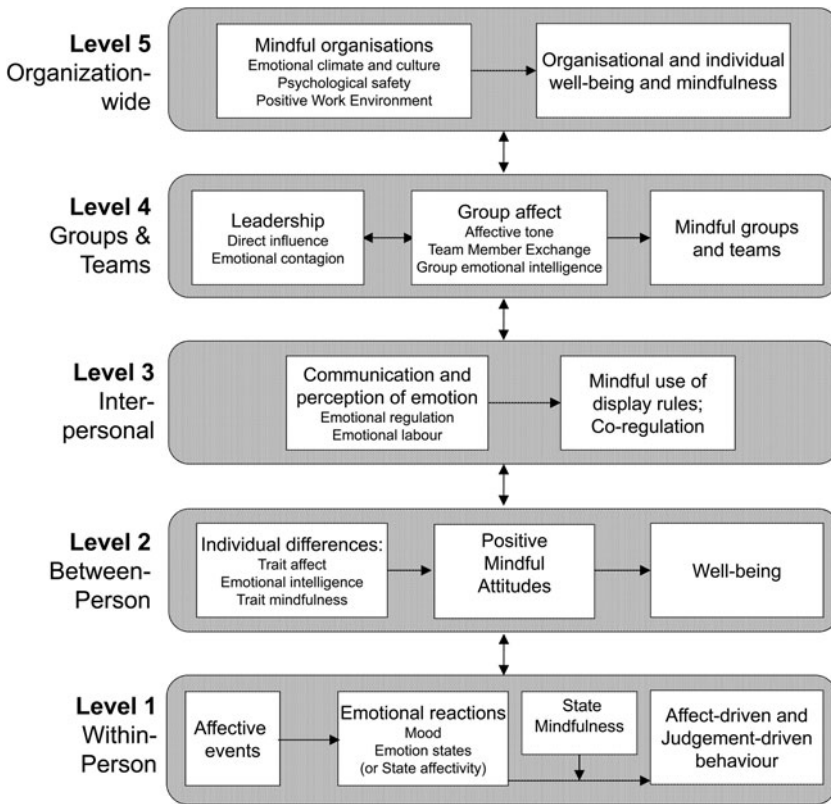
Figure 1. A five-level model of emotions and mindfulness in organizations.
Adapted from Ashkanasy, N. M., & To, M. L. (2022). A multilevel model of emotions and creativity in organizations. In Z. Ivcevic, J. D. Hoffmann, & J. C. Kaufman (Eds.), *Cambridge handbook of creativity and emotion* (pp. 598-619). New York: Cambridge University Press.

productive, which comes about because of attitudes (e.g., job commitment, job satisfaction, anomie) resulting from the affective event (and the subsequent emotional reaction).

At the within-person level, mindfulness is measured as a psychological state. To date, three state mindfulness questionnaires have been developed and validated. The first is a five-item mono-factorial measure derived from the Mindful Attention and Awareness Scale (MAAS; Brown & Ryan, 2003), operationalized as the extent to which individuals are experiencing mindfulness in the present-moment. The second is a 10-item bi-factorial measure called the Toronto Mindfulness Scale (Lau et al., 2006). The third is a 21-item bi-factorial measure called the State Mindfulness Scale (Tanay & Bernstein, 2013). Although each of these measures reflects a slightly different conceptualization of mindfulness (for further details, see Kay et al., 2019), what they have in common is that they treat mindfulness as an ephemeral psychological state, like the emotions and moods that occupy this level of the FLMEW.

Mindfulness can influence both affect-driven and judgment-driven behaviors through a host of different mechanisms (for reviews, see Good et al., 2016; Hölzel, Lazar, Gard, Schuman-Olivier, Vago, & Ott, 2011; Kay et al., 2019; Kudesia, 2019; Shapiro, Carlson, Astin, & Freedman, 2006; Teasdale, 1999; Vago & Silbersweig, 2012). With respect to affect-driven behaviors, Hafenbrack, Kinias, and Barsade (2014) found that state mindfulness decreases state negative affect. Accordingly, it has been shown to lower defensive behavior in the face of socio-evaluative threat (Heppner et al., 2008) and mortality salience (Niemiec et al., 2010), as

well as to make individuals better able to overcome emotional exhaustion from discrimination at work (Thoroughgood, Sawyer, & Webster, 2020), and indeed more willing to face aversive events in general (Arch & Craske, 2006). Conversely, mindfulness has also been shown to augment the positive affective consequences of breaks on motivation and work engagement (Chong, Kim, Lee, Johnson, & Lin, 2020).

Second, regarding judgment-driven behaviors, state mindfulness can reduce various forms of cognitive bias and associated behaviors, such as affective forecasting caused by impact bias (Emanuel, Updegraff, Kalmbach, & Ciesla, 2010), 'throwing good money after bad' owing to sunk cost bias (Hafenbrack, Kinias, & Barsade, 2014); and reducing gambling behaviors stemming from overconfidence (Lakey, Campbell, Brown, & Goodie, 2007). In addition, Weinstein, Brown, and Ryan (2009) found mindfulness to be associated with benign stress appraisals and avoidant coping, while Jahanzeb, Fatima, Javed, and Giles (2020) showed that it acts to limit the impact of experiencing ostracism on work performance through acquiescent silence.

Level 2: between-persons

Level 2 of the FLMEW refers to the effects of individual differences in personality and temperament. Ashkanasy (2003a) specifically examined two emotion-related individual differences: (1) emotional intelligence (Mayer & Salovey, 1997) and (2) trait affect (Watson & Tellegen, 1985). In line with AET, Ashkanasy argues that emotional intelligence moderates the effect of affective events on employees' subsequent emotional reactions. Thus, compared to low emotional intelligence employees, high emotional intelligence employees are better able to perceive, assimilate, understand, and ultimately manage (or regulate) their emotions. Jordan, Ashkanasy, & Härtel (2002a, 2002b) argue that relative to their low emotional intelligence colleagues, emotionally intelligent employees are less reactive to affective events such as job loss (see also Lopes, Grewal, Kadis, Gall, & Salovey, 2006). Regarding trait affect, high positive affect (PA) individuals should naturally be more likely to experience positive affect in response to positive affective events than their low PA peers; similarly, high negative affect (NA) individuals would be expected to be more reactive to negative affective events than their low NA colleagues (cf. Dalal, Baysinger, Brummel, & LeBreton, 2012).

At the between-person level, mindfulness is measured as a psychological trait. To date, at least eight trait mindfulness measures have been validated. The most widely used measure is the MAAS, which is a 15-item mono-factorial measure of the tendency to experience present-moment attention and awareness (Brown & Ryan, 2003). The two other most commonly used measures of trait mindfulness are the Kentucky Inventory of Mindfulness Skills (KIMS; Baer, Smith, & Allen, 2004) and the Five Facets Mindfulness Questionnaire (FFMQ; Baer et al., 2008). Both of these measures contain 39 items assessing multiple factors including observing internal stimuli (e.g., emotions), describing internal stimuli (e.g., moods), acting with awareness, and nonjudgmental acceptance (of thoughts and emotions). Additionally, the FFMQ measures nonreactivity to inner experience (e.g., emotion regulation). Although each measure conceptualizes mindfulness slightly differently, the one factor they all have in common is present moment attention and awareness. In all cases, these measures treat mindfulness as a stable dispositional trait (for further details, see Kay et al., 2019), like emotional intelligence and trait affectivity at this level of the FLMEW.

Trait mindfulness is related to both emotional intelligence and trait affectivity, as well as the Big Five dimensions of personality. Emotional intelligence has not only been shown to relate positively with trait mindfulness (Schutte & Malouff, 2011), but also to improve with mindfulness practice (Nadler, Carswell, & Minda, 2020). Moreover, a major component of emotional intelligence is emotion regulation (Gross, 2013). Indeed, so closely linked is mindfulness with emotion regulation that Chambers, Gullone, and Allen (2009) use the term 'mindful emotion regulation.' Heppner, Spears, Vidrine, and Wetter (2015) note further that 'mindfulness benefits emotion

regulation, including increased willingness to experience negative emotions, reduced reactivity to emotional stimuli and situations, a decentered perspective, and increased emotional stability' (p. 107).

Concerning trait affectivity and personality, Brown and Ryan (2003) found that mindfulness tends to be associated positively with PA and inversely with NA. In meta-analytic research, Giluk (2009) and Haliwa, Wilson, Spears, Strough, and Shook (2021) also found that, of the Big Five dimensions of personality, neuroticism (the negative affective dimension) is most inversely associated with trait mindfulness. These findings are further supported in a meta-analytic study by Sedlmeier et al. (2012), in which the author reported finding that mindfulness practice can significantly lower both neuroticism and trait negative affect.

More recently, researchers have begun to turn their attention to the role of individual differences in the effectiveness of mindfulness training. Notably, de Vibe, Bjørndal, Fattah, Dyrdal, Halland, and Tanner-Smith (2017) found that mindfulness training is most effective at improving subjective well-being in individuals who are high in neuroticism. Similarly, Kay and Young (2022) showed that online mindfulness training improves psychological well-being by facilitating authenticity, but only in those who are high versus low in trait conscientiousness.

Level 3: interpersonal relationships (how emotions are perceived and communicated)

At level 3 in the FLMEW, Ashkanasy (2003a) analyzes the way employees communicate emotions to others inside and outside their organization. At this level, interpersonal mindfulness – broadly defined as how mindful people are in their interactions with others – comes to bear (see Arendt, Pircher Verdorfer, & Kugler, 2019; Pratscher, Wood, King, & Bettencourt, 2019; Reina, Kreiner, Rheinhardt, & Mihelcic, 2022). Nonetheless, both state and trait mindfulness also have implications for interpersonal relationships, and a small but rapidly growing strand of the mindfulness literature (e.g., see Eby, Robertson, & Facteau, 2020) investigates the effects of mindfulness on affective communication with others. The primary focus in research to date has been on how mindfulness attenuates hostile emotions and behaviors. For example, Long and Christian (2015) showed that mindfulness buffers retaliation to injustice by reducing anger. Liang et al. (2016) showed that mindfulness also weakens the link between hostility and abusive supervision.

Similarly, Liang et al. (2018) found that mindfulness decreases hostility and aggression by limiting the extent to which employees employ dysfunctional emotion regulation strategies like surface acting. Shaffakat, Otaye-Ebede, Reb, Chandwani, and Vongswasdi (2021) further showed that mindfulness serves to down-regulate hostility by employees who experience psychological contract breach and the deviant workplace behaviors that flow therefrom.

By contrast, a growing body of research also shows that mindfulness fosters prosocial behaviors by facilitating positive emotional experience. For example, Hafenbrack et al. (2020) found that mindfulness increases prosocial behavior by augmenting empathy. Kay and Skarlicki (2020) also demonstrated that mindfulness improves collaborative conflict management by facilitating cognitive reappraisal of emotions. Further, Sawyer et al. (2021) showed that mindfulness fosters gratitude via positive affect and perspective taking, which in turn promotes helping workplace behaviors.

A budding line of research also shows that mindfulness can increase negative emotional experience and interpersonal behaviors. For example, Kay et al. (2023) show that mindfulness heightens moral outrage at third-party injustice and thereby incites deontic retribution against the offender. Hülsheger, van Gils, & Walkowiak (2021) also showed that mindfulness can increase guilt for enacted incivility against colleagues without fostering reparation behaviors. It should be noted, however, that both Schindler, Pfattheicher, and Reinhard (2019) and Hafenbrack, LaPalme, and Solal (2021) found the opposite; namely, that mindfulness *lowers* guilt for transgressing against others and thereby can *reduce* reparation behaviors. Given these opposing findings, further research on the effects of mindfulness on negative emotions and interpersonal behaviors at this level of the FLMEW is required.

Level 4: groups and teams

At this level of analysis, the FLMEW encompasses group processes and especially team leadership, which Ashkanasy (2003a) notes is a means to facilitate positive group emotions (Krzeminska, Lim, & Härtel, 2018). To date, a nascent body of research shows mixed results on the relationship between team mindfulness and team affect. Yu and Zellmer-Bruhn (2018: 324) define team mindfulness as 'a shared belief among team members that their interactions are characterized by awareness and attention to present events, and experiential, non-judgmental processing of within-team experiences.' Operationalizing team mindfulness in this way, these authors found that it reduces the association between task conflict and relationship conflict at the team level, and social undermining that results from such conflict at the individual level. Yu and Zellmer-Bruhn (2018) did not theorize a role for negative affect in their model; however, they did control for it. Results showed no relationship between team mindfulness and negative affect.

Liu et al. (2020) found that team mindfulness enhances the positive relationship between individual mindfulness and recovery from stress or boredom at work, thereby leading to higher levels of engagement. Although they did not model affect, considering on the one hand the strong association between stress and negative affect and, on the other, the close link between work engagement and positive affect, it seems reasonable to infer from these findings that team mindfulness may facilitate positive group emotions.

Liu et al. (2020) further examined whether and how the individual mindfulness of team members affects team mindfulness via relational stress. Again, although these authors did not theorize a role for affect, they controlled for positive team affectivity and team emotional intelligence. Results showed no significant relationship between either control variable and team mindfulness. Xie (2021) found a positive relationship between individual team members' ability to regulate their emotions and team mindfulness.

Regarding leadership in teams, Sy, Côté, and Saavedra (2005) found that leaders have a special role to play in engendering a positive emotional tone. This effect is thought to be facilitated by emotional contagion (see Barsade, 2002; Hatfield, Cacioppo, & Rapson, 1993; Sy, Côté, & Saavedra, 2005). As Gooty, Connelly, Griffith, and Gupta (2010) argue, groups whose leaders foster a positive emotional tone become both more cohesive and more effective (see also Humphrey, 2002). Given that mindfulness is associated with higher positive affect and lower negative affect at the individual level, it follows that leaders who are relatively mindful should also experience more positive affect and less negative affect. Moreover, self-reported mindfulness in leaders has been positively associated with greater psychological need satisfaction among subordinates (Reb, Narayanan, & Chaturvedi, 2014), less stress (Liu, Zhao, & Lu, 2021), and emotional exhaustion (Schuh, Zheng, Xin, & Fernandez, 2019), as well as higher subordinate ratings of Leader Member Exchange (LMX, see Amina, Hadi, Waheed, & Fayyaz, 2021; Tan, Wang, & Huang, 2021; Wang, Shi, & Wang, 2021), servant leadership (Verdorfer, 2016), and transformational leadership (Lange, Bormann, & Rowold, 2018).

Level 5: the organization as a whole

At level 5 of the FLMEW, the organization's climate and culture become the focus of attention. Here it is important to differentiate between the concepts of climate and culture. *Organizational climate*, on the one hand, represents employees' collective conscious perceptions of their work environment (Schneider, 2000; Schneider, Ehrhart, & Macey, 2011). In terms of an affective dimension, climate is seen as 'an objective (emotional) phenomenon that can be palpably sensed' (de Rivera, 1992: 2). O*rganizational culture*, on the other hand, has been characterized by Härtel and Ashkanasy (2011) as akin to a 'fossil record.' It derives from the organization's founder and evolves as a reflection of the collective experiences of organizational members (Schein, 1992). In terms of the effects of culture, this may be seen in norms of emotional expression (or display

rules; see Diefendorff & Richard, 2003) that the organization adopts. Note especially that, while organizational culture and climate represent different constructs, affect serves an important role in both (Ashkanasy, 2007; James et al., 2008). In this regard, according to Virtanen (2000), 'climate is … more manifest than culture, and culture more latent than climate' (p. 349). Thus, in effect, organizational members experience positive or negative affect as a consequence of the affective (or emotional) climate of their organization that is, in turn, determined by their organization's culture (cf. Pizer & Härtel, 2005).

As an example, consider the popularly conceived idea of a 'climate of fear.' In this regard, Ashkanasy and Nicholson (2003) found that this form of (negative) climate derives from the day-by-day management of individual units within the organization. In the extreme, such a negative climate can lead to what Frost (2007) characterizes as 'toxic emotions' that, in turn, lead to negative outcomes for employees, both in terms of productivity and well-being (see Ashkanasy & Daus, 2002; Leavitt, 2007). According to Härtel (2008; see also Härtel & Ashkanasy, 2011), the antidote to such negativity lies in the development of a positive work environment (PWE). Härtel (2008) notes in this regard that employees working in an organization characterized by a PWE are, 'respectful, inclusive and psychologically safe; leaders and co-workers as trustworthy, fair and open to diversity; and characterized by ethical policies and decision-making' (p. 584).

Importantly, PWEs do not just arise spontaneously. Fujimoto, Härtel, and Panipucci (2005) argue that this form of environment comes about because of positive leadership and human resource management (HRM) practices (see also Dutton & Ragins, 2017). Fujimoto and her associates found further that such HRM policies and practices (i.e., PWEs) determine employees' positive attitudes to diversity. Ashkanasy, Härtel, and Bialkowski (2020) argue in addition that development of positive HRM policies and practices enable effective managing and monitoring of employees' affective experiences, especially by ensuring that managers are appropriately educated and trained. Ashkanasy, Härtel, and Bialkowski (2020) conclude (p. 379) that a PWE is a consequence of 'facilitating positive workplace relationships (Krzeminska, Lim, & Härtel, 2018), constructive conflict management (Ayoko & Härtel, 2002), trust (Kimberley & Härtel, 2007), diversity openness (Härtel & Fujimoto, 2000), and organizational justice (Kimberley & Härtel, 2007).'

We propose that the positive affective climate and culture that reflect a PWE are associated with mindfulness at level 5 of the FMLEW. In their seminal work in this area, Weick, Sutcliffe, and Obstfeld (1999) described 'organizational mindfulness' as an organization-level phenomenon that is comprised of five interrelated processes. First, mindful organizations are preoccupied with failure, meaning they are vigilant against liabilities of success, including over-confidence and complacency. Second, mindful organizations are reluctant to simplify their interpretations of the world, meaning they actively question assumptions in order to uncover blind spots. Third, mindful organizations have a heightened sensitivity to their operations, meaning they strive always to maintain an integrated understanding of operations. Fourth, mindful organizations have a commitment to resilience, meaning they cultivate a capacity to respond to unexpected events by adapting, improvising, and learning from mistakes (Everly, 2011). Fifth, mindful organizations have a fluid authority structure, meaning they subordinate hierarchical rank to expertise in order to better address problems as they arise.

These five aspects of organizational mindfulness are captured in both validated scales of mindful organizing to date. The first is a 9-item measure that encapsulates all five facets in a single dimension (Vogus & Sutcliffe, 2007a). The second is a 42-item measure in which the five facets split out into separate dimensions (Ray, Baker, & Plowman, 2011).

Sutcliffe, Vogus, and Dane (2016) are careful to note that although organizational mindfulness may be facilitated by individual-level mindfulness, it is 'not grounded in an assumption that individual level mindfulness is a necessary precondition for it' (p. 73). More than an aggregate of individual-level mindfulness, organizational mindfulness is the result of collective practices that heighten attention to operational details in context so as to foster learning and adaptability in

the name of minimizing error and maximizing performance (Vogus & Sutcliffe, 2012). In other words, organizational mindfulness is a truly collective phenomenon that is inextricably linked to an organization's culture (Sutcliffe, Vogus, & Dane, 2016).

Unfortunately, there is a paucity of research on the relationship between organizational mindfulness and culture (Petitta & Martínez-Córcoles, 2022). We argue nonetheless that organizations are more likely to engage effectively in mindful organizing when they have a PWE. Not only are organizations with a PWE more resilient (cf. Vogus & Sutcliffe, 2007b), but they also engender the psychological safety needed by employees to question assumptions (Edmondson, 2002), defer to the expertise of subordinates (Nembhard & Edmondson, 2006), and share their mistakes without fear of reprisal and thereby enable organizational learning (Skarlicki, Kay, Aquino, & Fushtey, 2017).

Extending the notion that organizational mindfulness is supported by a PWE, a nascent literature suggests that organizational mindfulness may also be reflected in a positive ethical climate (Akca, Yavuz, & Atca, 2021; Nguyen, Wu, Evangelista, & Nguyen, 2020). In support of this notion, Lawrie, Tuckey, and Dollard (2018) found that a safe work climate is associated with organizational and individual mindfulness. Similarly, organizational mindfulness may also engender a climate of trust that protects employees from the deleterious effects of controlling work environments leading to increased employee well-being (Schultz, Ryan, Niemiec, Legate, & Williams, 2015).

PWE may foster mindfulness and well-being in employees at the individual level as well. For example, Reina and Kudesia (2020) showed that workplace environments characterized by positive social interactions help foster mindfulness in employees, which is well-known to foster individual well-being (Brown, Ryan, & Creswell, 2007). In other words, while the literature on organizational mindfulness is still underdeveloped, it seems that mindful organizing likely helps maintain an affective climate and culture that supports mindfulness and wellbeing at lower levels of the FLMEW.

Summary of the five levels

Up to this point, we have addressed the relationship between mindfulness and emotions at each of the five levels set out by Ashkanasy (2003a) in the FLMEW. Citing Weiss and Cropanzano's (1996) AET, at level 1 of the model (within-person temporal variability), we proffer the idea that state mindfulness is a phenomenon that can vary temporally depending on situation contingencies such as positive interactions with others. At level 2 (between-person and individual differences), we argue that individuals who are high in trait mindfulness tend to be more aware of emotions and better able to regulate them in self and others. At level 3 in the FLMEW, the focus is on interpersonal emotional exchanges and communication of emotion. By being able to control aggressive urges, interpersonally mindful employees are better equipped to communicate an air of calmness when under pressure at work, and to engage in prosocial behaviors. This suggests in addition that mindful employees would be more likely than others to engage in processes such as 'co-regulating' emotions with other parties (Troth et al., 2018).

At the group (level 4) and organizational (level 5) levels of analysis, the focus of the FLMEW shifts to collective behavior. While the mindfulness literature at the team level is still emerging and shows somewhat mixed results, research to date suggests that team mindfulness likely promotes a positive team climate and healthier exchanges between team members. For example, Druskat and Wolff (2001) found that emotionally intelligent groups tend to be psychologically adjusted and therefore outperform less emotionally intelligent groups, and given the strong association between mindfulness and emotional intelligence, we expect that mindful teams enjoy similar benefits. When the organization is considered as a whole, budding evidence supports a similar conclusion: a PWE should tend to promote employee and organizational mindfulness and the benefits associated therewith.

Mindfulness and a multilevel model of emotions

As is clear in the foregoing analysis, the five levels of the FMLEW are neither static nor independent. In this regard, Ashkanasy and Dorris (2017) emphasize that the multi-level characterization of organizations is both dynamic and interactive. Sutcliffe, Vogus, and Dane (2016) make the same arguments in respect of a multilevel characterization of organizational mindfulness. We discuss these aspects next.

The FLMEW as a dynamic system

That dynamism is an inherent property of the FLMEW is apparent beginning at level 1, which is based on Weiss and Cropanzano's (1996) concept of AET. Indeed, AET was developed specifically to address the constant changing nature of emotions and affect. In making their case for scholars to begin to tackle emotions and affect in organizations, Ashforth and Humphrey (1995) noted that this variability seemed to be largely responsible for their reluctance to do so. As a consequence, the within-person dimension of organizational behavior had been neglected in prior research, although this lack is now being addressed with methods like experience sampling (Fisher & To, 2012).

Ashkanasy and Härtel (2014) argue that the temporal variability that characterizes emotions at level 1 can just as easily be applied to an organization's climate. In other words, depending on environmental factors affective climate can vary, irrespective of whether the culture in the organization represents a generally PWE. Thus, organizational members can still experience setbacks that result in stress and (state) negativity notwithstanding whether or not the organization's leadership and HRM policies are conducive to a PWE. The critical issue here is that, when setbacks occur, a PWE is helpful for facilitating the resilience that characterizes organizational mindfulness (Vogus & Sutcliffe, 2007b). Härtel and Ganegoda (2008) argue in addition that, in a PWE, leaders are more likely to provide positive support to organizational members during difficult periods, which Reina and Kudesia (2020) show is conducive to state mindfulness at the individual level.

Dreison, Salyers, and Sliter (2015) posit that mindfulness training needs to consider both employees' personality (at level 2) and the organization's culture (at level 5). These authors argue that to be effective, mindfulness training must meet the needs of the individual – as demonstrated by Kay and Young (2022) – as well as the needs of the organization. In this instance, a PWE may be an important condition for promoting employee mindfulness. Thus, employees working in a 'toxic' organizational environment (cf. Frost, 2007) may be more inclined to react negatively to their circumstances than their more mindful co-workers.

It is important to note, however, that under some circumstances mindfulness may become a conduit for negative emotions. In this regard, Britton (2019: 159) asked, '[c]an mindfulness be too much of a good thing?' Britton suggests that, like other psychological variables, mindfulness is a 'nonmonotonic' variable (i.e., conforms to an inverted U-shaped relationship), where there is an optional 'sweet spot,' after which the benefits begin to drop away. Thus, a mindful employee might, under some circumstances, be highly sensitized to environmental stimuli, leading to negative emotions and consequent negative attitudes and behaviors.

In support of this idea, Kay et al. (2023) found that individuals who are high versus low in mindfulness experience greater moral outrage upon witnessing the mistreatment of others – but only when the mistreatment is subtle as opposed to exaggerated. The reasoning proffered for this finding is that even nonmindful individuals are affected by the extreme mistreatment of others, whereas mindfulness helps them recognize more subtle (and therefore more common) instances of third-party injustice.

The cross-level interactive nature of the FLMEW

The apparent simplicity of the FLMEW belies the fact that processes and emotions at each level interact with each other in a complex cross-level fashion. For example, Gross and John (2003)

found in this regard that temporal variations in emotions at level 1 are moderated by individual differences at level 2. Ashkanasy (2003b; see also Ashkanasy & Dorris, 2017; Ashkanasy & Humphrey, 2011) notes further that, although an individual employee's behaviors and emotions (at level 1) vary moment-by-moment, this can also depend on their level of emotional intelligence (at level 2), their ability to read and communicate emotions (at level 3), as well as their environment, in terms of the team they are working in (at level 4), and their organization's broader climate and culture (level 5).

In this regard, Lakey et al. (2007) found that in-the-moment mindfulness (level 1) helps employees overcome the effects of personal biases (level 2). In addition, Hafenbrack et al. (2020) reported links between state mindfulness (level 1) and empathy (level 3). Further, Thoroughgood, Sawyer, and Webster (2020) found that trait mindfulness (level 2) enables employees to better deal with a discriminatory work environment (level 5). For example, mindful individuals (at level 2) are more likely than their less mindful colleagues to deal appropriately with colleagues who are reacting emotionally (at level 1) following a group-level conflict (at level 4). Similarly, at the group level (level 4), Yu and Zellmer-Bruhn (2018) report finding that team mindfulness helps team members deal with interpersonal conflicts (at level 1). Liu et al. (2020) found in addition that trait mindfulness (level 2) can influence team mindfulness (level 4), while Liu et al. (2022) also found that team mindfulness (level 4) helps to improve relationships between team members (level 3) (see also Amina et al., 2021; Tan, Wang, & Huang, 2021; Wang, Shi, & Wang, 2021). Finally, in line with the cross-level interactive nature of the FLMEW, Sutcliffe, Vogus, and Dane (2016) suggest that organizational mindfulness (level 5) is associated with mindfulness at lower levels of the FLMEW, which raises promising avenues for future research.

Future research

Although the literature on affective implications of mindfulness at work is growing rapidly, a great deal of mindfulness research remains nonetheless to be done at each of the five levels of the FLMEW. The promising avenues for future research are too numerous to take exhaustive stock of here. As such, in this section, we identify and discuss future lines of inquiry that we think are particularly interesting and important at each level of analysis.

Level 1: within-person

Much work still needs to be done at this level of analysis to examine the effects and dynamics of mindfulness on state affect and discrete emotions. For example, the vast preponderance of mindfulness research to date has focused on negative as opposed to positive affect. Although studies have started to show that mindfulness training is beneficial for both negative and positive state affect (Lindsay et al., 2018), relatively little is known about the relative strength and durability of these effects.

Research is also needed to examine the implications of mindfulness for a host of discrete emotions that commonly arise in the workplace. For example, research is needed to understand the effects of mindfulness on emotional experiences such as boredom, interest, pride, shame, and excitement, each of which has important implications for workplace behavior (e.g., see Hayward, Ashkanasy, & Baron, 2018). A further question that arises here is whether some discrete emotions might increase mindfulness in certain circumstances. For example, experiencing emotions such as awe, authentic pride, or elevation might make employees feel more mindful in the moment, and thereby lead them to respond to affective workplace events differently than they otherwise would. On this note, given the challenges of studying emotions in real time, researchers would do well to employ more experience sampling methods to investigate the implications of mindfulness for these and other discrete emotions at work (cf. Beal, 2015; Gabriel et al., 2019), including the potential for reverse causation.

Level 2: individual differences

Research at this level has only just started to scratch the surface of the relationship between mindfulness and personality and affective traits like emotional intelligence. For example, extending the findings by Nadler, Carswell, and Minda (2020) that mindfulness training can improve emotional intelligence, research is needed to investigate whether and to what extent these effects are lasting, or whether they degrade over time after training ends.

Additionally, building from the discovery by Kay, Hafenbrack, and Skarlicki (2017) that mindfulness training improves eudaimonic well-being only among individuals who are low in dispositional authenticity, research is needed to examine possible ceiling effects in mindfulness training. For example, if individuals are already highly emotionally intelligent, it seems reasonable to expect that the effects identified by Nadler, Carswell, and Minda (2020) may not be as pronounced as they would be for those who are low in emotional intelligence. Amidst growing research showing that mindfulness does not have exclusively positive outcomes (Hafenbrack & Vohs, 2018; Lyddy, Good, Bolino, Thompson, & Stephens, 2021), research is needed on the effects of mindfulness training for individuals with dark personality traits like psychopathy, narcissism, and Machiavellianism (Kay et al., 2019). Indeed, since emotionally intelligent Machiavellians have been shown to engage in more interpersonally deviant workplace behaviors (Côté, DeCelles, McCarthy, Van Kleef, & Hideg, 2011), the question arises as to whether cultivating emotional intelligence in such individuals through mindfulness training might yield similarly negative outcomes.

Level 3: interpersonal relationships

At this level, research is needed to investigate the implications of mindfulness on the experience and expression of moral emotions and virtue ethics. For example, in light of conflicting findings in the literature to date on the effects of mindfulness on affective guilt (Hafenbrack, LaPalme, & Solal, 2021; Hülsheger, van Gils, & Walkowiak, 2021), research is needed to resolve this contradiction, such as by examining when mindfulness is more likely to heighten versus dampen guilt and resulting repair behaviors (i.e., contextual moderator), or for whom it might do so (i.e., individual difference moderator).

In addition, little is yet known about the relationship between mindfulness and trust in the workplace. Given that trusting others is inherently risky, while mindfulness tends to lower anxiety (Hayes, Bond, & Barnes-Holmes, 2006), it seems reasonable to expect that mindfulness may increase the propensity to trust others. Similarly, building from research demonstrating that mindfulness fosters forgiveness between romantic partners (Karremans et al., 2020), research is needed to test whether and under what circumstances mindfulness may promote forgiveness in the workplace. Finally, building from findings that mindfulness increases moral outrage in observers of injustice in a third-party context (Kay et al., 2023), research is needed to examine the implications of mindfulness in other third-party contexts, such as whether it heightens prosocial emotions like elevation in individuals who witness uncommon acts of moral virtue.

Level 4: groups and teams

Here, a great deal of research still needs to be done. In particular, psychological safety – which Edmondson (1999) defines as the shared belief by members of a team that the team is safe for interpersonal risk taking – appears to be a particularly promising line of inquiry. Indeed, given the fundamental importance of psychological safety for team functioning (Edmondson & Lei, 2014) as well as the benefits of mindfulness for prosocial behavior (Donald et al., 2019), it is surprising that so little research to date has been done on the relationship between team mindfulness and psychological safety.

Similarly, although team mindfulness has been shown to be inversely associated with affective team conflict (Yu & Zellmer-Bruhn, 2018), research is needed on the implications of team

mindfulness for outcomes like voice, trust, and team cohesion. Further, a paucity of research has examined if mindfulness training can cultivate team mindfulness, or whether it might causally reduce team conflict or indeed any other affective outcome at the individual or team level. Such research is important to determine whether mindfulness and the prosocial emotions and behaviors that tend to flow from it can be improved in work teams. Finally, although a small body of research has investigated the association between self-reported trait mindfulness in supervisors and subordinate outcomes (Reb, Narayanan, & Chaturvedi, 2014; Schuh et al., 2019), the term 'mindful leadership' has now made its way into common parlance (Carroll, 2008) with little supporting research about whether this is truly a valid and measurable leadership style. Such research has the potential to open-up a new field in leadership studies.

Level 5: the organization

This level is arguably the least developed in terms of research on mindfulness and the FMLEW, and it is in particular need of scholarly attention. In this sense, it might be called the 'final frontier' of research on the affective implications of mindfulness at work. At this level, we regard at least two avenues of future research as holding special promise.

The first concerns the relationship between organizational mindfulness and affective phenomena at level 5 of the FMLEW. We have argued in this article that organizational mindfulness is associated with a PWE, and a nascent body of research offers tentative support for this view. For example, evidence has started to emerge that organization-level mindfulness is positively associated with organizational trust (Tabancali & Öngel, 2020) and collaborative climate (Tabancali & Öngel, 2022). Future research is needed to chart the affective nomological network of organizational mindfulness at the organizational level. As noted by Suttcliffe Vogus, and Dane (2016), organizational mindfulness may also be reciprocally related to various aspects of organizational culture like psychological safety climate, to which we also add emotional display rules and affective climate. While organizational mindfulness is likely linked with organizational culture (Petitta & Martínez-Córcoles, 2022), future research is needed to tease out whether organizational mindfulness is an antecedent or outcome of its various contents.

A second avenue for future research concerns the relationship between organizational mindfulness and affective phenomena at other levels of the FLMEW. We have highlighted in this article that mindfulness at one level of the FLMEW can have cross-level effects on affective outcomes at other levels. In a similar vein, Sutcliffe, Vogus, and Dane (2016) suggest that there may be a relationship between mindfulness at the individual and organizational levels; however, research is still needed to test whether individual mindfulness is related to mindfulness at the organizational level (Shahbaz & Parker, 2021). Johnson, Park, and Chaudhuri (2020) identify no research to date on the effects of mindfulness training on organization-level phenomena, which may in part be due to the challenge of recruiting enough participants to reliably measure level 5 outcomes. Rupprecht, Koole, Chaskalson, Tamdjidi, and West (2019) further suggest the effects of mindfulness training on organization-level phenomena may be enhanced if accompanied by a focus on organizational processes. Though potentially true, such research would need to be carefully designed to tease out the differential effects of training in mindfulness versus other organizational processes.

Practical implications

Beyond stimulating new research, the multilevel model of mindfulness and emotions that we have advanced in this article has practical implications for employees, managers, and organizations alike. In particular, it can help them better understand the different conceptualizations of mindfulness, and their implications for individuals, dyads, teams, and the larger organization. For example, our model clarifies that state mindfulness is more conducive to positive emotional experience in the moment for employees (level 1); trait mindfulness is better suited to longer-

term employee wellbeing (level 2); interpersonal mindfulness is helpful for positive relationships with coworkers (level 3); group mindfulness is optimal for harmonious team functioning (level 4); and organizational mindfulness is helpful for organizational resilience (level 5).

As a result, our model can also help managers identify different ways to cultivate mindfulness according to their specific objectives. For example, 'on the spot' mindfulness exercises (Hafenbrack, 2017) may be best suited for calming negative emotions in the heat of the moment (level 1); hiring more dispositionally mindful employees may be helpful for creating a more emotionally intelligent workforce in the long-run (level 2); mindfulness training may be helpful for improving work relationships (level 3); promoting psychological safety may be useful for developing team mindfulness (level 4); and instilling 'no blame' policies (Skarlicki et al., 2017) may be helpful for cultivating organizational mindfulness (level 5). In so doing, our work should also help managers distinguish theoretical conjecture from empirical fact as they consider whether and how to harness the benefits of mindfulness at work.

Conclusion

In summary, in this article we have reviewed the literature on emotions and mindfulness through the lens of Ashkanasy's (2003a) five-level model of emotions in the workplace. At the lowest level of the model, we outline within-person temporal variations in emotions, attitudes, and behavior that relate to state mindfulness. These, in turn, can escalate through higher levels of analysis including the effects of individual differences such as emotional intelligence, trait affectivity, and trait mindfulness, as well as interpersonal communication and perceptions of emotion in dyadic relationships and teams, ending up as a whole-of-organization phenomenon. We argue that the model we have outlined is both dynamic and interactive. Emotions, behaviors, and attitudes at each of the five levels can vary moment-by-moment or day-by-day and intricately relate to individual, team, and organizational mindfulness. Finally, we conclude that mindfulness, be it at the individual, dyadic, team, or organizational level, can be fostered by a PWE (Härtel, 2008). In the end, mindfulness can be a spin-off of positive organizational cultures stemming from positive leadership and HRM policies.

Conflict of interest. None.

References

Akca, M., Yavuz, M., & Atca, I. (2021). The relationship between ethical climate, workplace deviance, and mindfulness. In R. Yadav, P. Panday & N. Sharma (Eds.), *Critical issues on changing dynamics in employee relations and workforce diversity* (pp. 64–89), New York: IGI Global. https://doi.org/10.4018/978-1-7998-3515-8.ch004.

Amina, A., Hadi, N. U., Waheed, A., & Fayyaz, H. (2021). The effect of leader mindfulness on employee job performance: Investigating the mediating and moderating role of leader-member exchange and organization culture. *Journal of Behavioral Sciences*, *31*, 138–165. https://doi.org/10.53369/unsm6660

Arch, J. J., & Craske, M. G. (2006). Mechanisms of mindfulness: Emotion regulation following a focused breathing induction. *Behavior Research and Therapy*, *44*, 1849–1858. https://doi.org/10.1016/j.brat.2005.12.007

Arendt, J. F., Pircher Verdorfer, A., & Kugler, K. G. (2019). Mindfulness and leadership: Communication as a behavioral correlate of leader mindfulness and its effect on follower satisfaction. *Frontiers in Psychology*, *10*, 667. https://doi.org/10.3389/fpsyg.2019.00667

Ashforth, B. E., & Humphrey, R. H. (1995). Emotion in the workplace: A reappraisal. *Human Relations*, *48*, 97–125. https://doi.org/10.1177/001872679504800201.

Ashkanasy, N. M. (2003a). Emotions in organizations: A multi-level perspective. In F. Dansereau, F. J. Yammarino (Eds.), *Research on multi-level issues* (vol. *2*, pp. 9–54). Bingley, UK: Emerald Group Publishing. https://doi.org/10.1016/s1475-9144(03)02002-2

Ashkanasy, N. M. (2003b). Emotions at multiple levels: An integration. In F. Dansereau and F. J. Yammarino (Eds.), *Research in multi-level issues, volume 2: Multilevel issues in organizational behavior and strategy* (pp. 71–81). Bingley, UK: Emerald Group Publishing. https://doi.org/10.1016/s1475-9144(03)02005-8

Ashkanasy, N. M. (2007). Organizational climate. In S. R. Clegg & J. R. Bailey (Eds.), *International encyclopedia of organization studies* (Vol. *3*, pp. 1028–1030). Thousand Oaks, CA: Sage.

Ashkanasy, N. M. (2021). A multilevel model of emotions and proactive behavior. In K. Z. Peng & C.-H. Wu (Eds.), *Emotion and proactivity at work: Prospects and dialogues* (pp. 83–104). Bristol, UK: Bristol University Press. https://doi.org/10.2307/j.ctv1ks0hcg.10

Ashkanasy, N. M., & Daus, C. S. (2002). Emotion in the workplace: The new challenge for managers. *Academy of Management Perspectives*, *16*, 76–86. https://doi.org/10.5465/ame.2002.6640191

Ashkanasy, N. M., & Dorris, A. D. (2017). Emotion in the workplace. *Annual Review of Organizational Psychology and Organizational Behavior*, *4*, 67–90. https://doi.org/10.1146/annurev-orgpsych-032516-113231

Ashkanasy, N. M., & Härtel, C. E. (2014). Positive and negative affective climate and culture: The good, the bad, and the ugly. In B. Schneider & K. Barbera (Eds.), *Oxford handbook of organizational climate and culture* (pp. 136–152). New York: Oxford University Press. https://doi.org/10.1093/oxfordhb/9780199860715.013.0008

Ashkanasy, N. M., Härtel, C. E. J., & Bialkowski, A. (2020). Affective climate and organization-level emotion management. In L.-Q. Yang, R. S. Cropanzano, V. Martinez-Tur & C. A. Daus (Eds.), *The Cambridge handbook of workplace affect* (pp. 375–385). New York: Cambridge University Press. https://doi.org/10.1017/9781108573887.029

Ashkanasy, N. M., & Humphrey, R. H. (2011). Current emotion research in organizational behavior. *Emotion Review*, *3*, 214–224. https://doi.org/10.1177/1754073910391684

Ashkanasy, N. M., & Nicholson, G. J. (2003). Climate of fear in organisational settings: Construct definition, measurement and a test of theory. *Australian Journal of Psychology*, *55*, 24–29. https://doi.org/10.1080/00049530412331312834

Ayoko, O. B., & Härtel, C. E. J. (2002). The role of emotions and emotion management in destructive and productive conflict in culturally heterogeneous workgroups. In N. M. Ashkanasy, W. J. Zerbe & C. E. J. Härtel (Eds.), *Managing emotions in the workplace* (pp. 77–97). Armonk, NY: M. E Sharpe. https://doi.org/10.4324/9781315290812-14

Baer, R. A., Smith, G. T., & Allen, K. B. (2004). Assessment of mindfulness by self-report: The Kentucky Inventory of Mindfulness Skills. *Assessment*, *11*(3), 191–206. https://doi.org/10.1177/107319110426802

Baer, R. A., Smith, G. T., Lykins, E., Button, D., Krietemeyer, J., Sauer, S., … Williams, J. M. G. (2008). Construct validity of the five facet mindfulness questionnaire in meditating and nonmeditating samples. *Assessment*, *15*(3), 329–342. https://doi.org/10.1177/1073191107313003

Barsade, S. G. (2002). The ripple effect: Emotional contagion and its influence on group behavior. *Administrative Science Quarterly*, *47*, 644–675. https://doi.org/10.2307/3094912

Beal, D. J. (2015). ESM 2.0: State of the art and future potential of experience sampling methods in organizational research. *Annual Review of Organizational Psychology and Organizational Behavior*, *2*, 383–407. https://doi.org/10.1146/annurev-orgpsych-032414-111335

Bishop, S. R., Lau, M., Shapiro, S., Carlson, L., Anderson, N. D., Carmody, J., … Devins, G. (2004). Mindfulness: A proposed operational definition. *Clinical Psychology: Science and Practice*, *11*, 230–241. https://doi.org/10.1093/clipsy.bph077

Britton, W. B. (2019). Can mindfulness be too much of a good thing? The value of a middle way. *Current Opinion in Psychology*, *28*, 159–165. https://doi.org/10.1016/j.copsyc.2018.12.011

Brown, K. W., & Ryan, R. M. (2003). The benefits of being present: Mindfulness and its role in psychological well-being. *Journal of Personality and Social Psychology*, *84*, 822–848. https://doi.org/10.1037/0022-3514.84.4.822

Brown, K. W., Ryan, R. M., & Creswell, J. D. (2007). Mindfulness: Theoretical foundations and evidence for its salutary effects. *Psychological Inquiry*, *18*(4), 211–237. https://doi.org/10.1080/10478400701598298

Carroll, M. (2008). *The mindful leader: Ten principles for bringing out the best in ourselves and others*. Boston, MA: Trumpeter.

Chambers, R., Gullone, E., & Allen, N. B. (2009). Mindful emotion regulation: An integrative review. *Clinical Psychology Review*, *29*, 560–572. https://doi.org/10.1016/j.cpr.2009.06.005

Chong, S., Kim, Y. J., Lee, H. W., Johnson, R. E., & Lin, S. H. J. (2020). Mind your own break! The interactive effect of workday respite activities and mindfulness on employee outcomes via affective linkages. *Organizational Behavior and Human Decision Processes*, *159*, 64–77. https://doi.org/10.1016/j.obhdp.2019.11.001

Clark, L. A., Watson, D., & Leeka, J. (1989). Diurnal variation in the positive affects. *Motivation and Emotion*, *13*, 205–234. https://doi.org/10.1007/bf00995536.

Côté, S., DeCelles, K. A., McCarthy, J. M., Van Kleef, G. A., & Hideg, I. (2011). The Jekyll and Hyde of emotional intelligence: Emotion-regulation knowledge facilitates both prosocial and interpersonally deviant behavior. *Psychological Science*, *22*, 1073–1080. https://doi.org/10.1177/0956797611416251

Dalal, R. S., Baysinger, M., Brummel, B. J., & LeBreton, J. M. (2012). The relative importance of employee engagement, other job attitudes, and trait affect as predictors of job performance. *Journal of Applied Social Psychology*, *42*, E295–E325. https://doi.org/10.1111/j.1559-1816.2012.01017.x

de Rivera, J. (1992). Emotional climate: Social structure and emotional dynamics. In K. T. Strongman (Ed.), *International review of studies on emotions* (vol. *2*, pp. 197–218). New York: Wiley.

de Vibe, M., Bjørndal, A., Fattah, S., Dyrdal, G. M., Halland, E., & Tanner-Smith, E. E. (2017). Mindfulness-based stress reduction (MBSR) for improving health, quality of life and social functioning in adults: A systematic review and meta-analysis. *Campbell Systematic Reviews*, *13*, 1–264. https://doi.org/10.4073/csr.2017.11

Diefendorff, J. M., & Richard, E. M. (2003). Antecedents and consequences of emotional display rule perceptions. *Journal of Applied Psychology*, *88*, 284–294. https://doi.org/10.1037/0021-9010.88.2.284

Donald, J. N., Sahdra, B. K., Van Zanden, B., Duineveld, J. J., Atkins, P. W., Marshall, S. L., & Ciarrochi, J. (2019). Does your mindfulness benefit others? A systematic review and meta-analysis of the link between mindfulness and prosocial behaviour. *British Journal of Psychology*, *110*, 101–125. https://doi.org/10.1111/bjop.12338

Dreison, K. C., Salyers, M. P., & Sliter, M. T. (2015). A deeper dive into the relationship between personality, culture, and mindfulness. *Industrial and Organizational Psychology*, *8*, 614–619. https://doi.org/10.1017/iop.2015.88

Druskat, V. U., & Wolff, S. B. (2001). Group emotional intelligence and its influence on group effectiveness. In C. Cherniss & D. Goleman (Eds.), *The emotionally intelligent workplace* (pp. 132–155). San Francisco: Jossey-Bass.

Dutton, J. E., & Ragins, B. R. (2017). *Exploring positive relationships at work: Building a theoretical and research foundation*. New York: Psychology Press.

Eby, L. T., Robertson, M. M., & Facteau, D. B. (2020). Mindfulness and relationships: An organizational perspective. In M. R. Buckley, A. J. Wheeler, J. E. Baur & J. R. B. Halbesleben (Eds.), *Research in personnel and human resources management* (vol. *38*, pp. 57–102). Bingley: UK Emerald Publishing. https://doi.org/10.1108/S0742-730120200000038004

Edmondson, A. (1999). Psychological safety and learning behavior in work teams. *Administrative Science Quarterly*, *44*, 350–383. https://doi.org/10.2307/2666999

Edmondson, A. C. (2002). *Managing the risk of learning: Psychological safety in work teams* (pp. 255–275). Cambridge, MA: Division of Research, Harvard Business School.

Edmondson, A. C., & Lei, Z. (2014). Psychological safety: The history, renaissance, and future of an interpersonal construct. *Annual Review of Organizational Psychology and Organizational Behavior*, *1*, 23–43. https://doi.org/10.1146/annurev-orgpsych-031413-091305

Emanuel, A. S., Updegraff, J. A., Kalmbach, D. A., & Ciesla, J. A. (2010). The role of mindfulness facets in affective forecasting. *Personality and Individual Differences*, *49*, 815–818. https://doi.org/10.1016/j.paid.2010.06.012

Everly, G. S. (2011). Building a resilient organizational culture. *Harvard Business Review*, *10*(2), 109–138.

Fisher, C. D., & To, M. L. (2012). Using experience sampling methodology in organizational behavior. *Journal of Organizational Behavior*, *33*, 865–877. https://doi.org/10.1002/job.1803

Frijda, N. H. (1986). *The emotions*. New York: Cambridge University Press.

Frost, P. J. (2007). *Toxic emotions at work and what you can do about them*. Cambridge, MA: Harvard Business Review Press.

Fujimoto, Y., Härtel, C. E. J., & Panipucci, D. (2005). Emotional experience of individualist-collectivist workgroups: Findings from a study of 14 multinationals located in Australia. In C. E. J. Härtel, W. J. Zerbe & N. M. Ashkanasy (Eds.), *Emotions in organizational behavior* (pp. 125–160). Mahwah, NJ: Lawrence Erlbaum Associates, Inc. https://doi.org/10.4324/9781410611895-14

Gabriel, A. S., Podsakoff, N. P., Beal, D. J., Scott, B. A., Sonnentag, S., Trougakos, J. P., & Butts, M. M. (2019). Experience sampling methods: A discussion of critical trends and considerations for scholarly advancement. *Organizational Research Methods*, *22*, 969–1006. https://doi.org/10.1177/1094428118802626

George, J. M. (2000). Emotions and leadership: The role of emotional intelligence. *Human Relations*, *53*, 1027–1055. https://doi.org/10.1177/0018726700538001

Giluk, T. L. (2009). Mindfulness, Big Five personality, and affect: A meta-analysis. *Personality and Individual Differences*, *47*, 805–811. https://doi.org/10.1016/j.paid.2009.06.026

Good, D. J., Lyddy, C. J., Glomb, T. M., Bono, J. E., Brown, K. W., Duffy, M. K., … Lazar, S. W. (2016). Contemplating mindfulness at work: An integrative review. *Journal of Management*, *42*, 114–142. https://doi.org/10.1177/0149206315617003

Gooty, J., Connelly, S., Griffith, J., & Gupta, A. (2010). Leadership, affect and emotions: A state of the science review. *The Leadership Quarterly*, *21*, 979–1004. https://doi.org/10.1016/j.leaqua.2010.10.005

Grandey, A. A. (2000). Emotional regulation in the workplace: A new way to conceptualize emotional labor. *Journal of Occupational Health Psychology*, *5*, 59–100. https://doi.org/10.1037/1076-8998.5.1.95

Gross, J. J. (2013). Emotion regulation: Taking stock and moving forward. *Emotion*, *13*, 359–365. https://doi.org/10.1037/a0032135

Gross, J. J., & John, O. P. (2003). Individual differences in two emotion regulation processes: Implications for affect, relationships, and well-being. *Journal of Personality and Social Psychology*, *85*, 348–362. https://doi.org/10.1037/0022-3514.85.2.348

Hafenbrack, A. C. (2017). Mindfulness meditation as an on-the-spot workplace intervention. *Journal of Business Research*, *75*, 118–129. https://doi.org/10.1016/j.jbusres.2017.01.017

Hafenbrack, A. C., Cameron, L. D., Spreitzer, G. M., Zhang, C., Noval, L. J., & Shaffakat, S. (2020). Helping people by being in the present: Mindfulness increases prosocial behavior. *Organizational Behavior and Human Decision Processes*, *159*, 21–38. https://doi.org/10.1016/j.obhdp.2019.08.005

Hafenbrack, A. C., Kinias, Z., & Barsade, S. G. (2014). Debiasing the mind through meditation: Mindfulness and the sunk-cost bias. *Psychological Science*, *25*, 369–376. https://doi.org/10.1177/0956797613503853

Hafenbrack, A. C., LaPalme, M. L., & Solal, I. (2021). Mindfulness meditation reduces guilt and prosocial reparation. *Journal of Personality and Social Psychology*, *123*, 28–54. https://doi.org/10.1037/pspa0000298

Hafenbrack, A. C., & Vohs, K. D. (2018). Mindfulness meditation impairs task motivation but not performance. *Organizational Behavior and Human Decision Processes*, *147*, 1–15. https://doi.org/10.1016/j.obhdp.2018.05.001

Haliwa, I., Wilson, J. M., Spears, S. K., Strough, J., & Shook, N. J. (2021). Exploring facets of the mindful personality: Dispositional mindfulness and the Big Five. *Personality and Individual Differences, 171*, 110469. https://doi.org/10.1016/j.paid.2020.110469

Härtel, C. E. J. (2008). How to build a healthy emotional culture and avoid a toxic culture. In C. L. Cooper & N. M. Ashkanasy (Eds.), *Research companion to emotion in organizations* (pp. 575–588). Cheltenham, UK: Edwin Elgar. https://doi.org/10.4337/9781848443778.00049

Härtel, C. E., & Ashkanasy, N. M. (2011). Healthy human cultures as positive work environments. In N. M. Ashkanasy, C. E. P. Wilderom & M. F. Peterson (Eds.), *The handbook of organizational culture and climate* (pp. 85–100). Thousand Oaks, CA: Sage. https://dx.doi.org/10.4135/9781483307961.n6

Härtel, C. E., & Fujimoto, Y. (2000). Diversity is not the problem–openness to perceived dissimilarity is. *Journal of Management & Organization, 6*, 14–27. https://doi.org/10.1017/s1833367200005484

Härtel, C. E. J., & Ganegoda, D. B. (2008). Role of affect and interactional justice in moral leadership. In W. J. Zerbe, C. E. J. Härtel & N. M. Ashkanasy (Eds.), *Research on emotion in organizations* (Vol. 4, pp. 155–180). Bingley, UK: Emerald Group Publishing. https://doi.org/10.1016/s1746-9791(08)04007-8

Hatfield, E., Cacioppo, J. T., & Rapson, R. L. (1993). Emotional contagion. *Current Directions in Psychological Science, 2*, 96–100. https://doi.org/10.1111/1467-8721.ep10770953

Hayes, S. C., Bond, F. W., & Barnes-Holmes, D. (2006). *Acceptance and mindfulness at work: Applying acceptance and commitment therapy and relational frame theory to organizational behavior management.* London, UK: Psychology Press.

Hayward, M. L. A., Ashkanasy, N. M., & Baron, R. A. (2018). Employee pride and hubris. In D. Lindebaum, D. Geddes & P. J. Jordan (Eds.), *The social functions of emotion and talking about emotions at work* (pp. 175–190). Cheltenham, UK: Edward Elgar. https://doi.org/10.4337/9781786434883.00015

Heppner, W. L., Kernis, M. H., Lakey, C. E., Campbell, W. K., Goldman, B. M., Davis, P. J., & Cascio, E. V. (2008). Mindfulness as a means of reducing aggressive behavior: Dispositional and situational evidence. *Aggressive Behavior, 34*, 486–496. https://doi.org/10.1002/ab.20258

Heppner, W. L., Spears, C. A., Vidrine, J. I., & Wetter, D. W. (2015). Mindfulness and emotion regulation. In B. Ostafin, M. Robinson & B. Meier (Eds.), *Handbook of mindfulness and self-regulation* (pp. 107–120). New York: Springer. https://doi.org/10.1007/978-1-4939-2263-5_9

Hill, C. L., & Updegraff, J. A. (2012). Mindfulness and its relationship to emotional regulation. *Emotion, 12*, 81–90. https://doi.org/10.1037/a0026355

Hochschild, A. R. (1983). *The managed heart: Commercialization of human feeling.* Berkeley, CA: University of California Press.

Hölzel, B. K., Lazar, S. W., Gard, T., Schuman-Olivier, Z., Vago, D. R., & Ott, U. (2011). How does mindfulness meditation work? Proposing mechanisms of action from a conceptual and neural perspective. *Perspectives on Psychological Science, 6*(6), 537–559. https://doi.org/10.1177/1745691611419

Hülsheger, U. R., Alberts, H. J., Feinholdt, A., & Lang, J. W. (2013). Benefits of mindfulness at work: The role of mindfulness in emotion regulation, emotional exhaustion, and job satisfaction. *Journal of Applied Psychology, 98*, 310–325. https://doi.org/10.1037/a0031313

Hülsheger, U. R., van Gils, S., & Walkowiak, A. (2021). The regulating role of mindfulness in enacted workplace incivility: An experience sampling study. *Journal of Applied Psychology, 106*(8), 1250–1265. https://doi.org/10.1037/apl0000824

Humphrey, R. H. (2002). The many faces of emotional leadership. *The Leadership Quarterly, 13*, 493–504. https://doi.org/10.1016/S1048-9843(02)00140-6

Jahanzeb, S., Fatima, T., Javed, B., & Giles, J. P. (2020). Can mindfulness overcome the effects of workplace ostracism on job performance? *The Journal of Social Psychology, 160*, 589–602. https://doi.org/10.1080/00224545.2019.1707465

James, L. R., Choi, C. C., Ko, C. H. E., McNeil, P. K., Minton, M. K., Wright, M. A., & Kim, K. I. (2008). Organizational and psychological climate: A review of theory and research. *European Journal of Work and Organizational Psychology, 17*, 5–32. https://doi.org/10.1080/13594320701662550

Johnson, K. R., Park, S., & Chaudhuri, S. (2020). Mindfulness training in the workplace: Exploring its scope and outcomes. *European Journal of Training and Development, 44*(4/5), 341–354. https://doi.org/10.1108/EJTD-09-2019-0156

Jordan, P. J., Ashkanasy, N. M., & Härtel, C. E. J. (2002a). Emotional intelligence as a moderator of emotional and behavioral reactions to job insecurity. *The Academy of Management Review, 27*, 361–372. https://doi.org/10.5465/amr.2002.7389905

Jordan, P. J., Ashkanasy, N. M., Härtel, C. E. J., & Hooper, G. S. (2002b). Workgroup emotional intelligence: Scale development and relationship to team process effectiveness and goal focus. *Human Resource Management Review, 12*, 195–214. https://doi.org/10.1016/s1053-4822(02)00046-3

Karremans, J. C., van Schie, H. T., van Dongen, I., Kappen, G., Mori, G., van As, S., … van der Wal, R. C. (2020). Is mindfulness associated with interpersonal forgiveness? *Emotion, 20*, 296–310. https://doi.org/10.1037/emo0000552

Kay, A. A., Hafenbrack, A., & Skarlicki, D. (2017). Enhancing eudaimonic well-being with mindfulness: The moderating effect of authenticity. *Academy of Management Proceedings, 2017*(1), 14366. https://doi.org/10.5465/AMBPP.2017.14366abstract

Kay, A. A., Masters-Waage, T. C., & Skarlicki, D. P. (2019). Mindfulness at work. In R. W. Griffin (Ed.), *Oxford bibliographies in management.* New York, NY: Oxford University Press. https://doi.org/10.1093/obo/9780199846740-0123

Kay, A. A., Masters-Waage, T. C., Reb, J., & Vlachos, P. A. (2023). Mindfully outraged: Mindfulness increases deontic retribution for third-party injustice. *Organizational Behavior and Human Decision Processes*. http://doi.org/10.1016/j.obhdp.2023.104249

Kay, A. A., & Skarlicki, D. P. (2020). Cultivating a conflict-positive workplace: How mindfulness facilitates constructive conflict management. *Organizational Behavior and Human Decision Processes*, *159*, 8–20. https://doi.org/10.1016/j.obhdp.2020.02.005

Kay, A. A., & Young, T. (2022). Distanced from others, connected to self: Online mindfulness training fosters psychological well-being by cultivating authenticity. *Academy of Management Learning & Education*, *21*, 261–281. https://doi.org/10.5465/amle.2020.0316

Kimberley, N., & Härtel, C. E. J. (2007). Building a climate of trust during organizational change: The mediating role of justice perceptions and emotion. In C. E. J. Härtel, N. M. Ashkanasy & W. J. Zerbe (Eds.), *Research on emotion in organizations* (vol. 3, pp. 237–264). Bingley, UK: Emerald Group Publishing. https://doi.org/10.1016/s1746-9791(07)03010-6

Krzeminska, A., Lim, J., & Härtel, C. E. J. (2018). Psychological capital and occupational stress in emergency services teams: Empowering effects of servant leadership and workgroup emotional climate. In L. Petitta, C. E. J. Härtel, N. M. Ashkanasy & W. Zerbe (Eds.), *Research on emotion in organizations, volume 14: Individual, relational, and contextual dynamics of emotions* (pp. 189–215). Bingley, UK: Emerald Group Publishing. https://doi.org/10.1108/s1746-979120180000014017

Kudesia, R. S. (2019). Mindfulness as metacognitive process. *Academy of Management Review*, *44*(2), 405–423. https://doi.org/10.5465/amr.2015.0333

Lakey, C. E., Campbell, W. K., Brown, K. W., & Goodie, A. S. (2007). Dispositional mindfulness as a predictor of the severity of gambling outcomes. *Personality and individual differences*, *43*, 1698–1710. https://doi.org/10.1016/j.paid.2007.05.007

Lange, S., Bormann, K. C., & Rowold, J. (2018). Mindful leadership: Mindfulness as a new antecedent of destructive and transformational leadership behavior. *Gruppe. Interaktion. Organization. Zeitschrift für Angewandte Organizationspsychologie (GIO)*, *49*, 139–147. https://doi.org/10.1007/s11612-018-0413-y

Lau, M. A., Bishop, S. R., Segal, Z. V., Buis, T., Anderson, N. D., Carlson, L., … Devins, G. (2006). The Toronto mindfulness scale: Development and validation. *Journal of Clinical Psychology*, *62*(12), 1445–1467. https://doi.org/10.1002/jclp.20326

Lawrie, E. J., Tuckey, M. R., & Dollard, M. F. (2018). Job design for mindful work: The boosting effect of psychosocial safety climate. *Journal of occupational health psychology*, *23*(4), 483–495. https://doi.org/10.1037/ocp0000102

Leavitt, H. J. (2007). Big organizations are unhealthy environments for human beings. *Academy of Management Learning & Education*, *6*, 253–263. https://doi.org/10.5465/amle.2007.25223464

Liang, L. H., Brown, D. J., Ferris, D. L., Hanig, S., Lian, H., & Keeping, L. M. (2018). The dimensions and mechanisms of mindfulness in regulating aggressive behaviors. *Journal of Applied Psychology*, *103*, 281–299. https://doi.org/10.1037/apl0000283

Liang, L. H., Lian, H., Brown, D. J., Ferris, D. L., Hanig, S., & Keeping, L. M. (2016). Why are abusive supervisors abusive? A dual-system self-control model. *Academy of Management Journal*, *59*, 1385–1406. https://doi.org/10.5465/amj.2014.0651

Lindsay, E. K., Chin, B., Greco, C. M., Young, S., Brown, K. W., Wright, A. G., … Creswell, J. D. (2018). How mindfulness training promotes positive emotions: Dismantling acceptance skills training in two randomized controlled trials. *Journal of Personality and Social Psychology*, *115*, 944–973. https://doi.org/10.1037/pspa0000134

Liu, S., Xin, H., Shen, L., He, J., & Liu, J. (2020). The influence of individual and team mindfulness on work engagement. *Frontiers in Psychology*, *10*, 2928. https://doi.org/10.3389/fpsyg.2019.02928

Liu, B., Zhao, H., & Lu, Q. (2021). Effect of leader mindfulness on hindrance stress in nurses: The social mindfulness information processing path. *Journal of Advanced Nursing*, *77*(11), 4414–4426. https://doi.org/10.1111/jan.14929

Liu, X., Zheng, X., Yu, Y., Owens, B. P., & Ni, D. (2022). How and when team average individual mindfulness facilitates team mindfulness: The roles of team relational stress and team individual mindfulness diversity. *Journal of Organizational Behavior*, *43*(3), 430–447. https://doi.org/10.1002/job.2564

Long, E. C., & Christian, M. S. (2015). Mindfulness buffers retaliatory responses to injustice: A regulatory approach. *Journal of Applied Psychology*, *100*, 1409–1422. https://doi.org/10.1037/apl0000019

Lopes, P. N., Grewal, D., Kadis, J., Gall, M., & Salovey, P. (2006). Evidence that emotional intelligence is related to job performance and affect and attitudes at work. *Psicothema*, *18*(Supplement), 132–138.

Lyddy, C. J., Good, D. J., Bolino, M. C., Thompson, P. S., & Stephens, J. P. (2021). The costs of mindfulness at work: The moderating role of mindfulness in surface acting, self-control depletion, and performance outcomes. *Journal of Applied Psychology*, *106*(12), 1921–1938. https://doi.org/10.1037/apl0000863

Mayer, J. D., & Salovey, P. (1997). What is emotional intelligence? In P. Salovey & D. Sluyter (Eds.), *Emotional development and emotional intelligence: Implications for educators* (pp. 3–31). New York: Basic Books.

Nadler, R., Carswell, J. J., & Minda, J. P. (2020). Online mindfulness training increases well-being, trait emotional intelligence, and workplace competency ratings: A randomized waitlist-controlled trial. *Frontiers in Psychology*, *11*. https://doi.org/10.3389/fpsyg.2020.00255

Nembhard, I. M., & Edmondson, A. C. (2006). Making it safe: The effects of leader inclusiveness and professional status on psychological safety and improvement efforts in health care teams. *Journal of Organizational Behavior*, *27*(7), 941–966. https://doi.org/10.1002/job.413

Nguyen, N. P., Wu, H., Evangelista, F., & Nguyen, T. N. Q. (2020). The effects of organizational mindfulness on ethical behavior and firm performance: Empirical evidence from Vietnam. *Asia Pacific Business Review*, 26, 313–335. https://doi.org/10.1080/13602381.2020.1727649

Niemiec, C. P., Brown, K. W., Kashdan, T. B., Cozzolino, P. J., Breen, W. E., Levesque-Bristol, C., & Ryan, R. M. (2010). Being present in the face of existential threat: The role of trait mindfulness in reducing defensive responses to mortality salience. *Journal of Personality and Social Psychology*, 99, 344–365. https://doi.org/10.1037/a0019388

Petitta, L., & Martínez-Córcoles, M. (2022). A conceptual model of mindful organizing for effective safety and crisis management. The role of organizational culture. *Current Psychology*, 1–20. https://doi.org/10.1007/s12144-022-03702-x

Pizer, M.K., & Härtel, C. E. J. (2005). For better or for worse: Organizational culture and emotions. In C. E. J. Härtel, W. J. Zerbe & N. M. Ashkanasy (Eds.), *Emotions in organizational behavior* (pp. 342–361). Mahwah, NJ: Lawrence Erlbaum Associates. https://doi.org/10.4324/9781410611895-30.

Pratscher, S. D., Wood, P. K., King, L. A., & Bettencourt, B. (2019). Interpersonal mindfulness: Scale development and initial construct validation. *Mindfulness*, 10(6), 1044–1061. https://doi.org/10.1007/s12671-018-1057-2

Ray, J. L., Baker, L. T., & Plowman, D. A. (2011). Organizational mindfulness in business schools. *Academy of Management Learning & Education*, 10(2), 188–203. https://doi.org/10.5465/amle.10.2.zqr188

Reb, J., Narayanan, J., & Chaturvedi, S. (2014). Leading mindfully: Two studies on the influence of supervisor trait mindfulness on employee well-being and performance. *Mindfulness*, 5, 36–45. https://doi.org/10.1007/s12671-012-0144-z

Reina, C. S., Kreiner, G. E., Rheinhardt, A., & Mihelcic, C. A. (2022). Your presence is requested: Mindfulness infusion in workplace interactions and relationships. *Organization Science, 34,* 722–753. https://doi-org.ezproxy.library.uq.edu.au/10.1287/orsc.2022.1596

Reina, C. S., & Kudesia, R. S. (2020). Wherever you go, there you become: How mindfulness arises in everyday situations. *Organizational Behavior and Human Decision Processes*, 159, 78–96. https://doi.org/10.1016/j.obhdp.2019.11.008

Rupprecht, S., Koole, W., Chaskalson, M., Tamdjidi, C., & West, M. (2019). Running too far ahead? Towards a broader understanding of mindfulness in organisations. *Current Opinion in Psychology*, 28, 32–36. https://doi.org/10.1016/j.copsyc.2018.10.007

Sawyer, K. B., Thoroughgood, C. N., Stillwell, E. E., Duffy, M. K., Scott, K. L., & Adair, E. A. (2021). Being present and thankful: A multi-study investigation of mindfulness, gratitude, and employee helping behavior. *Journal of Applied Psychology*, 107, 240–262. https://doi.org/10.1037/apl0000903

Schein, E. (1992). *Organizational culture and leadership*. San Francisco: Jossey-Bass.

Schindler, S., Pfattheicher, S., & Reinhard, M. A. (2019). Potential negative consequences of mindfulness in the moral domain. *European Journal of Social Psychology*, 49, 1055–1069. https://doi.org/10.1002/ejsp.2570

Schneider, B. (2000). The psychological life of organizations. In N. Ashkanasy, C. Wilderom & M. Peterson (Eds.), *The handbook of organizational culture and climate* (pp. 23–30). Thousand Oaks, CA: Sage.

Schneider, B., Ehrhart, M. G., & Macey, W. H. (2011). Organizational climate research: Achievements and the road ahead. In N. M. Ashkanasy, C. E. P. Wilderom & M. F. Peterson (Eds.), *The handbook of organizational culture and climate* (2nd ed.) (pp. 29–49). Thousand Oaks, CA: Sage. https://doi.org/10.4135/9781483307961.n3

Schuh, S. C., Zheng, M. X., Xin, K. R., & Fernandez, J. A. (2019). The interpersonal benefits of leader mindfulness: A serial mediation model linking leader mindfulness, leader procedural justice enactment, and employee exhaustion and performance. *Journal of Business Ethics*, 156, 1007–1025. https://doi.org/10.1007/s10551-017-3610-7

Schultz, P. P., Ryan, R. M., Niemiec, C. P., Legate, N., & Williams, G. C. (2015). Mindfulness, work climate, and psychological need satisfaction in employee well-being. *Mindfulness*, 6, 971–985. https://doi.org/10.1007/s12671-014-0338-7

Schutte, N. S., & Malouff, J. M. (2011). Emotional intelligence mediates the relationship between mindfulness and subjective well-being. *Personality and Individual Differences*, 50, 1116–1119. https://doi.org/10.1016/j.paid.2011.01.037

Sedlmeier, P., Eberth, J., Schwarz, M., Zimmermann, D., Haarig, F., Jaeger, S., & Kunze, S. (2012). The psychological effects of meditation: A meta-analysis. *Psychological Bulletin*, 138, 1139–1171. https://doi.org/10.1037/a0028168

Shaffakat, S., Otaye-Ebede, L., Reb, J., Chandwani, R., & Vongswasdi, P. (2021). Mindfulness attenuates both emotional and behavioral reactions following psychological contract breach: A two-stage moderated mediation model. *Journal of Applied Psychology*, 107, 425–443. https://doi.org/10.1037/apl0000878

Shahbaz, W., & Parker, J. (2021). Workplace mindfulness: An integrative review of antecedents, mediators, and moderators. *Human Resource Management Review*, 32(3), 100849. https://doi.org/10.1016/j.hrmr.2021.100849

Shapiro, S. L., Carlson, L. E., Astin, J. A., & Freedman, B. (2006). Mechanisms of mindfulness. *Journal of Clinical Psychology*, 62(3), 373–386. https://doi.org/10.1002/jclp.20237

Skarlicki, D. P., Kay, A. A., Aquino, K., & Fushtey, D. (2017). Must heads roll? A critique of and alternative approaches to swift blame. *Academy of Management Perspectives*, 31(3), 222–238. https://doi.org/10.5465/amp.2015.0118

Sutcliffe, K. M, Vogus, T. J. (2016). Mindfulness in organizations: A cross-level review. *Annual Review of Organizational Psychology and Organizational Behavior*, 3, 55–81.

Sutcliffe, K. M., Vogus, T. J., & Dane, E. (2016). Mindfulness in organizations: A cross-level review. *Annual Review of Organizational Psychology and Organizational Behavior*, 3, 55–81. https://doi.org/10.1146/annurev-orgpsych-041015-062531

Sy, T., Côté, S., & Saavedra, R. (2005). The contagious leader: Impact of the leader's mood on the mood of group members, group affective tone, and group processes. *Journal of Applied Psychology*, *90*, 295–305. https://doi.org/10.1037/0021-9010.90.2.295

Tabancali, E., & Öngel, G. (2020). Examining the relationship between school mindfulness and organizational trust. *International Education Studies*, *13*(6), 14–25. https://doi.org/10.5539/ies.v13n6p14

Tabancali, E., & Öngel, G. (2022). Relationship between school mindfulness and collaborative school climate. *African Educational Research Journal*, *10*(2), 161–169. https://doi.org/10.30918/AERJ.102.22.028

Tan, H., Wang, Z., & Huang, J. (2021). Leader mindfulness and employee creativity: The importance of leader–member exchange. *Social Behavior and Personality*, *49*, 1–9. https://doi.org/10.2224/sbp.10659D

Tanay, G., & Bernstein, A. (2013). State mindfulness scale (SMS): Development and initial validation. *Psychological Assessment*, *25*(4), 1286–1299. https://doi.org/10.1037/a0034044

Teasdale, J. D. (1999). Metacognition, mindfulness and the modification of mood disorders. *Clinical Psychology & Psychotherapy: An International Journal of Theory & Practice*, *6*(2), 146–155. https://doi.org/10.1002/(SICI)1099-0879(199905)6:2<146::AID-CPP195>3.0.CO;2-E

Thoroughgood, C. N., Sawyer, K. B., & Webster, J. R. (2020). Finding calm in the storm: A daily investigation of how trait mindfulness buffers against paranoid cognition and emotional exhaustion following perceived discrimination at work. *Organizational Behavior and Human Decision Processes*, *159*, 49–63. https://doi.org/10.1016/j.obhdp.2019.02.004

Troth, A. C., Lawrence, S. A., Jordan, P. J., & Ashkanasy, N. M. (2018). Interpersonal emotion regulation in the workplace: A conceptual and operational review and future research agenda. *International Journal of Management Reviews*, *20*, 523–543. https://doi.org/10.1111/ijmr.12144

Vago, D. R., & Silbersweig, D. A. (2012). Self-awareness, self-regulation, and self-transcendence (S-ART): A framework for understanding the neurobiological mechanisms of mindfulness. *Frontiers in Human Neuroscience*, *6*, 296. https://doi.org/10.3389/fnhum.2012.00296

Verdorfer, A. P. (2016). Examining mindfulness and its relations to humility, motivation to lead, and actual servant leadership behaviors. *Mindfulness*, *7*, 950–961. https://doi.org/10.1007/s12671-016-0534-8

Virtanen, T. (2000). Commitment and the study of organizational climate and culture. In N. M. Ashkanasy, C. P. M. Wilderom & M. F. Peterson (Eds.), *Handbook of organizational culture and climate* (pp. 339–354). Thousand Oaks, CA: Sage.

Vogus, T. J., & Sutcliffe, K. M. (2007a). The safety organizing scale: Development and validation of a behavioral measure of safety culture in hospital nursing units. *Medical Care*, *45*, 46–54. https://www.jstor.org/stable/40221374

Vogus, T. J., & Sutcliffe, K. M. (2007b). Organizational resilience: towards a theory and research agenda. In 2007 IEEE international conference on systems, man and cybernetics (pp. 3418-3422). IEEE. https://doi.org/10.1109/ICSMC.2007.4414160

Vogus, T. J., & Sutcliffe, K. M. (2012). Organizational mindfulness and mindful organizing: A reconciliation and path forward. *Academy of Management Learning & Education*, *11*, 722–735. https://doi.org/10.5465/amle.2011.0002c

Wang, Z., Shi, L., & Wang, L. (2021). Does leader mindfulness influence voice behavior? Leader–member exchange as a mediator. *Social Behavior and Personality: An International Journal*, *49*(8), 1–8. https://doi.org/10.2224/sbp.10716

Watson, D., & Tellegen, A. (1985). Toward a consensual structure of mood. *Psychological Bulletin*, *98*, 219–235. https://doi.org/10.1037/0033-2909.98.2.219

Weick, K. W., Sutcliffe, K. M., & Obstfeld, D. (1999). Organizing for high reliability: Processes of collective mindfulness. In B. Staw & R. Sutton (Eds.), *Research in organizational behavior* (Vol. *21*, pp. 81–123). Greenwich, CT: JAI.

Weinstein, N., Brown, K. W., & Ryan, R. M. (2009). A multi-method examination of the effects of mindfulness on stress attribution, coping, and emotional well-being. *Journal of Research in Personality*, *43*, 374–385. https://doi.org/10.1016/j.jrp.2008.12.008

Weiss, H. M., & Cropanzano, R. (1996). Affective events theory: A theoretical discussion of the structure, causes and consequences of affective experiences at work. *Research in organizational behavior* (Vol. *18*, pp. 1–74). Oxford, UK: Elsevier Science.

Xie, L. (2021). Flow in work teams: The role of emotional regulation, voice, and team mindfulness. *Current Psychology*, *41*, 7867–7877. https://doi.org/10.1007/s12144-020-01179-0

Yu, L., & Zellmer-Bruhn, M. (2018). Introducing team mindfulness and considering its safeguard role against conflict transformation and social undermining. *Academy of Management Journal*, *61*, 324–347. https://doi.org/10.5465/amj.2016.0094

Zaki, J., & Williams, W. C. (2013). Interpersonal emotion regulation. *Emotion*, *13*, 803–810. https://doi.org/10.1037/a0033839