



# Unlocking the performance potential of functionally diverse teams: The paradoxical role of leader mood

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In a multisource, lagged design field study of 66 consulting teams, we investigated the role of leader mood in unlocking the performance potential of functionally diverse teams. In line with our hypotheses, we found that, given high levels of leader positive mood, functional diversity was positively related to collective team identification. In contrast, given high levels of leader negative mood, functional diversity was positively associated with information elaboration in teams. Furthermore, results showed that functional diversity was most strongly related to team performance when both leader positive mood and leader negative mood were high. This study highlights the value of examining seemingly contradictory leadership aspects in the effort to gain a fuller understanding of how to foster performance in diverse teams.

## Practitioner points

- To effectively lead diverse teams, leaders need to navigate between the need to promote unique ideas (i.e., information elaboration) and the simultaneous need to pull together diverse members towards a common identity.
- Leader mood addresses both of these needs. When the team leader exhibited a positive mood, team functional diversity was positively related to members' identification with the team. By contrast, when the team leader displayed a negative mood, team functional diversity was positively related to information elaboration.
- Over a 12-day period, diverse teams performed best when the leader showed both positive and negative mood.
- Leaders of diverse teams are required to be sensitive to the affective tone of their team and aware of how their emotional displays influence team members' moods and behaviours as well as team processes.

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Diversity, ‘a characteristic of a social grouping that reflects the degree to which there are objective or subjective differences between people within the group’ (van Knippenberg & Schippers, 2007, p. 519), holds great promise for teams (Jackson & Joshi, 2011). However, while evidence suggests that team diversity entails the potential to positively impact team outcomes (e.g., Jackson & Joshi, 2004; van der Vegt & Bunderson, 2005), a large body of research has shown that the average relationship between different types of team diversity and team performance is near zero and that the realization of these potential benefits is contingent on several moderating factors (e.g., Guillaume, Dawson, Otaeye-Ebede, Woods, & West, 2017; Joshi & Roh, 2009; van Dijk, van Engen, & van Knippenberg, 2012; van Knippenberg & Schippers, 2007; Wegge & Meyer, 2019). Researchers have distinguished between directly job-related, informational diversity on the one hand and not directly job-related, demographic diversity on the other (e.g., Jackson & Joshi, 2011; Joshi & Roh, 2009). In this study, we focus on the former – specifically, functional diversity, given that interdisciplinarity (i.e., people with different functional specialization backgrounds working together) is often argued to enable high levels of performance in teams working on complex tasks (Keller, 2001). Yet despite the intuitive appeal of this argument, in practice it appears to be difficult to leverage the positive potential of this type of diversity (e.g., Joshi & Roh, 2009; van Dijk *et al.*, 2012).

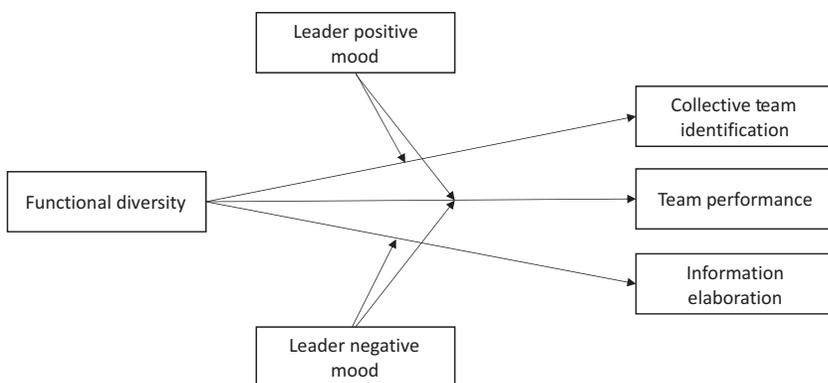
Leadership, in particular, has been argued to be an important contextual factor in unlocking the promise of team diversity (Guillaume *et al.*, 2017). However, the literature on how leadership can help teams gain from diversity is fragmented in that different researchers have typically focused on different leadership styles including empowering or transformational leadership (e.g., Greer *et al.*, 2012; Kearney & Gebert, 2009; Klein *et al.*, 2011; Nishii & Mayer, 2009; Shin & Zhou, 2007; Somech, 2006) and those leadership styles were found to have inconsistent effects in diverse teams. For example, some leadership styles that are typically positively related to team performance in general may at times even have detrimental effects in diverse teams, as Hmieleski and Ensley (2007) have shown for empowering leadership, and Somech (2006) has demonstrated for participative leadership. Thus, in the present paper, we shift the focus from leadership styles to leadership aspects that are not unique to any particular leadership style (Humphrey, Kellett, Sleeth & Hartman, 2008) and are commonly and regularly exhibited by all leaders, namely the expression of positive and negative moods, for example being excited and inspired or being scared and nervous. Moods are defined as positive or negative affective states that tend to be diffuse, have no specific target, and last from a few moments to as long as a few days (Barsade & Gibson, 2007). Affective reactions such as moods serve as immediate and powerful sources of guidance to followers (Bono & Ilies, 2006; Dasborough & Ashkanasy, 2002; Gaddis *et al.*, 2004; Humphrey, 2002), especially in a context of uncertainty, conflict and ambiguity that many diverse teams are likely to face (Wegge *et al.*, 2019; Williams & O’Reilly, 1998).

We posit that opposite and seemingly contradictory aspects of leadership – leader positive mood and leader negative mood – may both be useful in the effort to unlock the potential inherent in team diversity. First, drawing on theorizing on the social functions of emotions in the Emotions-as-Social-Information model (EASI; van Kleef, 2009; van Kleef, De Dreu, & Manstead, 2010; Visser, van Knippenberg, van Kleef, & Wisse, 2013), we propose that leader positive mood will counteract those negative affective reactions to social categorization that are viewed as responsible for the detrimental effects of diversity on team functioning. Moreover, we argue that leader positive mood will promote the positive reactions to functional differences that are viewed as an asset and a source of synergy for the team. To test this path, we focus on collective team identification as a key

indicator of social categorization and affective attachment in diverse teams (van Knippenberg, *et al.*, 2004). Collective team identification – that is, the emotional significance that the members of a team attach to their team membership (van der Vegt & Bunderson, 2005) – is essential for effective group functioning (e.g., leadership, motivation, group performance, Haslam, 2004). We posit that, given positive leader mood, diversity will be positively related to collective team identification. Second, we argue that a leader’s mood also conveys socially relevant information that is likely to influence team effort (cf. Sy, Cote, & Saavedra, 2005). Specifically, we posit that leader negative mood assists diverse teams in utilizing their greater pool of information, thus establishing a positive relationship between diversity and information elaboration – a variable that has been shown to be a proximal predictor of team performance (e.g., Hoever, van Knippenberg, van Ginkel, & Barkema, 2012; Homan *et al.*, 2007).

Finally, to directly test the argument that opposite and seemingly contradictory aspects may both be useful in the effort to unlock the potential inherent in team diversity, we examine the three-way interaction among diversity and positive and negative leader mood on team performance. Our rationale is based on the notion that diversity has both a positive potential (as identified by the information–decision-making perspective; e.g., van Knippenberg & Schippers, 2007) as well as a negative potential (as described by the social categorization perspective; Williams & O’Reilly, 1998) and that different, yet ultimately complementary factors are needed to foster the positive and at the same time curtail the negative effects of diversity. This latter line of reasoning is in accord with recent efforts to explain complex organizational phenomena by adopting a paradox perspective (e.g., Kearney, Shemla, van Knippenberg, & Scholz, 2019; Smith & Lewis, 2011; Zhang, Waldman, Han, & Li, 2015). We propose that the performance of diverse teams can best be enhanced if leaders exhibit both positive and negative moods in the course of a relevant performance episode. Our hypothesized relationships are summarized in Figure 1.

Our research makes two central contributions to the literature on diversity and leadership. First, by examining leader moods, we introduce a new perspective on the role that leaders play in leveraging the performance potential that diversity entails. Leader moods may underlie and influence broader leadership styles and more specific leadership communication. Thus, our work both complements and extends prior research on interactive effects of diversity and leadership on team outcomes by identifying a new



**Figure 1.** The moderating role of leader positive and negative mood on the relationship between functional diversity and team processes and outcomes.

avenue – leader mood – whereby leaders may help teams benefit from functional diversity. Second, our study adds to the nascent literature on how paradox perspectives enable a better understanding of how best to deal with organizational challenges (Smith & Lewis, 2011). We argue that opposite, but ultimately complementary aspects – positive and negative leader moods – have differential effects that together help to unlock the positive and curtail the negative potential of diversity.

### **Theoretical background and hypotheses**

#### *Team diversity and leadership*

In response to today's fast-paced change and mounting pressure to innovate, many organizations increasingly rely on teams that are diverse with respect to functional backgrounds (Tannenbaum, Mathieu, Salas, & Cohen, 2012). The utilization of functionally diverse teams provides organizations with the enlarged range of skills, knowledge, experiences, and perspectives that are needed to attain high levels of competitiveness on complex tasks and services. However, while diversity offers a potential for greater team performance, the realization of this potential is not assured (van Knippenberg & Schippers, 2007). The categorization elaboration model (CEM; van Knippenberg, *et al.*, 2004) posits that diversity does not automatically lead to either positive or negative effects, and that any diversity dimension can elicit both information/decision-making and social categorization processes. Importantly, the CEM suggests that negative consequences of diversity will only hamper team performance if social categorizations occur with respect to salient social categories and subsequently impede information elaboration. Based on this rationale, current research seeks to identify moderating and mediating variables that determine when and how team diversity benefits or hinders team outcomes. In this regard, leader behaviour is a particularly promising factor, since it is often leaders who have the power to create conditions that enable teams to work together in synergistic ways (e.g., Nishii & Mayer, 2009).

To date, however, only a limited number of studies have examined leadership as a contextual variable to advance our understanding of the relationship between diversity and team outcomes. Of those, the majority have examined the moderating impact of transformational leadership, reporting that work group diversity is positively associated with team performance (Kearney & Gebert, 2009), team creativity (Shin & Zhou, 2007) and team productive energy (Kunze & Bruch, 2010) when team leaders exhibit more transformational leadership. Another group of studies has examined the impact of leadership styles associated with transformational behaviours. For example, Homan and Greer (2013) showed that diverse teams function more effectively when leader consideration is high instead of low, and Greer *et al.* (2012) found that the effects of diversity are contingent on visionary leadership as well as on leaders' tendencies to categorize team members into ingroup and outgroup members. A final line of research on the role of leaders and leadership in diverse teams focuses on inclusiveness – that is, leader behaviours that encourage an appreciation for the disparate and diverse contributions of all members (Nemhard & Edmondson, 2006). Leader inclusiveness is argued to enhance diverse team performance through the strengthening of the perception of shared goals and by convincing followers that their different perspectives and ideas are genuinely respected and appreciated (Nishii & Mayer, 2009).

Although these findings underscore the importance of studying leadership as a moderator of the diversity–team outcomes relationship, previous research has focused on

broad leadership styles and mostly overlooked more common and narrower elements of leader influence (Guillaume et al., 2017). In this paper, we chose to look at the role of leaders in diverse teams beyond umbrella leadership constructs such as transformational leadership – which oftentimes comprise theoretically and/or empirically questionable combinations of elements (van Knippenberg & Sitkin, 2013). Specifically, we examine the moderating role of leader affective reactions, which are commonly and regularly exhibited by leaders and are not unique to any particular leadership style.

The literature distinguishes between three major types of affective reactions: *discrete emotions*, defined as short-lived emotions that are focused on a specific target or cause; dispositional *trait affect*, that is, a person's stable affective tendencies; and *moods*, conceptualized as positive or negative feelings that tend to be diffuse, have no specific target, and last from a few moments to as long as a few weeks (Barsade & Gibson, 2007). In this study, we focus on moods because – in contrast to the short-lived discrete emotions and invariant trait affect – their balance between variability and stability matches the temporal nature of team processes such as collective team identification and information elaboration.

Moods permeate the leadership process, both in terms of the emotions that leaders express and the importance of moods in defining and shaping team processes (Dasborough, 2006). Leaders, serving as a primary source of mood contagion (Sy & Choi, 2013; Sy et al., 2005), activate and regulate a team's moods because a primary function of mood is the coordination of social interactions and mutual understanding, which are critical for team members' ability to collaborate effectively. In the context of diverse teams, moods have been shown to be the vehicle through which diversity appraisals influence team processes and outcomes (Hentschel, Shemla, Wegge, & Kearney, 2013; Phillips & Lount, 2007). Moods influence how team members think and act by providing information that guides judgement and information processing.

Although leadership styles emphasize the importance of emotions in leadership effectiveness (Barsade & Gibson, 2007), they tend to be associated with either positive or negative moods (e.g., Tsai, Chen, & Cheng, 2009), and research on leadership styles often overlooks the possibility of leaders displaying opposing moods. Previous research on moods suggests that leader positive and negative moods are likely to have opposite effects. Specifically, positive team moods are thought to create an environment that positively influences identification and pro-social behaviours (George & Brief, 1992), whereas in reaction to negative mood, team members are likely to engage in more concentrated, detailed, and analytic processing of information (George & King, 2007). These contradictory effects correspond with the two forces at play in diverse teams. On the one hand, the effective management of diverse teams requires conditions that foster alignment and cohesion, such as a superordinate team identity (Shemla & Wegge, 2019; van Dick et al., 2008), shared objectives (Gaertner & Dovidio, 2000; van Knippenberg, Dawson, West, & Homan, 2011), goal interdependence (Wageman, 1995), and clear norms (Goncalo, Chatman, Duguid, & Kennedy, 2015). On the other hand, diverse teams also require conditions that encourage divergence and individuation such as psychological safety to speak up even when disagreeing with other team members (Kirkman, Cordery, Mathieu, Rosen, & Kukenberger, 2013), inclusive leadership and leader openness to different experiences (Troester, & van Knippenberg, 2012), and employee empowerment and involvement (Yang & Konrad, 2011). These streams of research pose a paradoxical challenge, because while actions that promote greater alignment between team members may reduce intergroup bias, the benefits of workgroup diversity, such as

creativity and elaboration, can only be attained when differences are preserved and encouraged to be made salient.

By examining the role of leader positive and negative mood, we follow Yukl's (2012: 76) advice: 'To understand why a leader is effective requires that we examine how different behaviors interact in a mutually consistent way'. Thus, by focusing on the moderating role of *both* positive and negative leader mood (separately and combined) in the diversity–outcomes relationship, our work extends extant research on the role of leadership in realizing the promise of diverse teams. Specifically, we argue that leadership behaviours and signals with seemingly opposite influences, specifically positive and negative mood, can have synergistic effects because their combination enables leaders to meet contradictory demands. We posit that leader positive and negative moods complement each other, with each of them curtailing the potential negative effects of a unitary focus on only one of the competing demands. It is important to note that we do not claim that leader positive mood and leader negative mood can or should be displayed simultaneously. Instead, we argue that they have a synergistic effect when each is displayed during a relevant performance period. In the following, we develop this line of reasoning with respect to the separate and combined effects of positive and negative leader mood on team processes and outcomes.

#### *The moderating role of leader mood*

To test the influence of leader mood on the diversity–outcomes relationship, we draw on the EASI model (van Kleef, 2009), which depicts the pathways through which emotions influence observers' behaviour. Specifically, the EASI model identifies two pathways: the *affective reactions pathway*, which includes processes in which emotional displays evoke reactions in others that influence their cognitions and behaviours; and the *inferential processes pathway*, whereby emotional displays convey socially relevant information about one's assessment of a certain situation (van Kleef, 2009; van Kleef *et al.*, 2010).

We posit that the interaction of both leader negative and positive mood is required in the effort to unlock the performance potential inherent in functionally diverse teams. More precisely, we propose first that the influence of leader mood through the affective reactions pathway moderates the relationship between team diversity and collective team identification. We then argue that the influence of leader mood through the inferential processes pathway moderates the relationship between team diversity and information elaboration. We focus on identification and information elaboration since, according to the CEM (van Knippenberg *et al.*, 2004), it would be expected that diverse teams perform better when the emotional attachment to the group prevents dysfunctional conflict and biases and when team members utilize the greater pool of information and expertise that such groups may have at their disposal (Guillaume *et al.*, 2017). Finally, we argue that a three-way interaction among team diversity and leader positive and negative mood can enhance team performance in diverse teams.

#### *The affective reactions pathway*

Collective team identification – that is, the emotional significance that the members of a team attach to their team membership (van der Vegt & Bunderson, 2005) – is a critical state in diverse teams because it determines whether members will be inclined to follow team norms, exert themselves on behalf of the team despite the differences, and favour the

whole group over the subgroup (e.g., van der Vegt & Bunderson, 2005). While this form of 'social glue' is especially important for the ability of diverse teams to facilitate harmonious and productive relations (Shemla & Wegge, 2019), the relationship between functional diversity and team identification may vary. On the one hand, the enhanced presence of differences in those teams make it possible that members would describe themselves in terms of their distinctive professional functions and adhere to the attitudes and norms associated with those functions, rather than perceive themselves as members of the overall group (Bezrukova *et al.*, 2009; Brewer, 1995; Roccas & Brewer, 2002).

On the other hand, there is also a potential for stronger team identification in functionally diverse teams compared with homogenous teams. The primary reason for the formation of functionally diverse teams is the necessity to broaden the range of information, knowledge, and skills, a necessity that is due to the complexity of the task that the team is assigned to perform. As such, differences resulting from functional specializations may be regarded as a source of contribution to the team, thus potentially leading to the perception of functionally diverse individuals as valued members of the team that are less likely to be categorized as outgroup members (Shemla, Meyer, Greer, & Jehn, 2016). Further, in teams with high functional diversity, compared with teams with low functional diversity, team members' potential contributions to the team are more obvious, given the unique knowledge, information, insights, and skills that their functional backgrounds provide. Thus, compared to, for example, demographically diverse teams, it is more obvious how these differences are relevant for and can be translated into team performance. As a result, the more directly task-related (potential and actual) contributions of functionally diverse team members are likely to promote collective team identification.

In line with this reasoning, prior research has shown that functional diversity, unlike other types of diversity, does appear to be positively related to team performance, on average (e.g., van Dijk *et al.*, 2012), even if the effect size is small and the direction and strength of the relationship appear to be strongly dependent on moderator variables (e.g., Kearney *et al.*, 2009; van der Vegt & Bunderson, 2005). Hence, among diversity attributes, functional diversity appears to be somewhat unique (in that it is the only one of the main diversity attributes that is on average positively related to team performance), and we argue that this is, in part, due to a stronger positive potential for team identification in functionally diverse teams, compared to teams that are diverse in other ways. We posit that the spreading of positive mood (but not negative mood) from the leader is likely to result in a positive relation between functional diversity and collective team identification.

According to the affective reactions pathway, leaders' moods evoke congruent moods in team members via emotional contagion processes (George, 1995; Sy, Cote, & Saavedra, 2005). The contagion of negative mood in teams has been shown to elicit dislike among team members, to reduce motivation for collaboration (van Kleef *et al.*, 2004a, 2004b) and increase competitive behaviour (van Kleef & Cote, 2007), and to encourage exclusion of members (van Beest, van Kleef, & van Dijk, 2008). In contrast, the contagion of positive mood evoked by the positive mood of the leader encourages positive pro-social behaviours that facilitate unity and identification with the team (George & Bettenhausen, 1990), facilitate cooperation among team members, and promote the adoption of working behaviours and attitudes that encourage unity and collaboration. These effects can help create a positive relation between functional diversity and team identification for two reasons. First, the positive mood of leaders helps to mitigate negative tensions and intergroup bias between the subgroups in diverse teams by reducing contentious and competitive behaviour and by facilitating unity (Carnevale & Isen, 1986; George &

Bettenhausen, 1990). Since diverse teams – compared with homogenous teams – are generally more likely to suffer from subgroup categorization and intergroup bias, these effects are likely to be stronger as diversity increases. Second, by increasing coordination (George & Bettenhausen, 1990; Sy *et al.*, 2005) and preference for collaboration among team members (Baron, Fortin, Frei, Hauver, & Shack, 1990), positive leader mood is likely to increase the importance and usefulness of functional differences and to bolster the linkage between functional differences members and their contribution to the team and thus to strengthen the engagement and identification of team members with the team. In sum, we therefore posit:

*Hypothesis 1.* Leader positive mood (but not negative mood) moderates the relationship between functional diversity and collective team identification, such that this relationship is positive when leader positive mood is high and negative when leader positive mood is low.

#### *The inferential processes pathway*

Information elaboration, a central behavioural construct in the CEM framework (van Knippenberg, *et al.*, 2004), is defined as ‘the exchange of information and perspectives, individual-level processing of the information and perspectives, the process of feeding back the results of this individual-level processing into the group, and discussion and integration of its implications’ (van Knippenberg, *et al.*, 2004, p. 1011). High functional diversity potentially allows for higher information elaboration due to the greater pool of task-relevant information and expertise that such teams have at their disposal. However, it is not simply the presence, but the *utilization* of the greater pool of task-relevant information that enables diverse teams to, at times, outperform homogeneous teams (Hoever *et al.*, 2012; Homan *et al.*, 2007; Kearney & Gebert, 2009; Kearney *et al.*, 2009). Nevertheless, increased diversity is likely to pose two particular challenges for teams engaged in information elaboration. First, since information shared by ingroup members is more likely to be carefully processed and more likely to influence the thoughts of the receiver than information shared by outgroup members (van Knippenberg, 1999), members in diverse teams may be less likely to share information with different others and may be less receptive to information from different others. Second, diverse teams are typically assumed to have less of a shared understanding to start with and therefore are more likely to focus on finding and establishing common ground (Kooij-de Bode, van Knippenberg, & van Ginkel, 2008). As a consequence, diverse teams are less likely to consider information that does not help in establishing common ground, which may lead them away from careful information elaboration.

We argue that leaders’ moods provide team members with performance-related information and a representation of the team’s social reality, and that this information influences the extent to which team members engage in elaborated processing of the full range of knowledge, experience, and perspectives that exists in the team. Based on the EASI model (van Kleef, 2009), observers’ behaviour may also be influenced through the inferential processes pathway, which pertains to the inferences drawn by observers from others’ emotions. This is in line with the mood-as-information-perspective, which holds that affect may inform an individual about the nature of a situation (Schwartz & Clore, 1983). Support for the idea that observers utilize others’ emotional expressions to inform their own behaviour comes from a diverse range of literatures, including research on

social referencing (e.g., Klinnert, Campos, Sorce, Emde, & Svejda, 1983), negotiation (van Kleef, De Dreu, & Manstead, 2004b), and social influence (e.g., Clark, Pataki, & Carver, 1996).

However, these studies indicate that observers infer different messages from negative and positive emotions or moods. Positive affective states carry the message that things are going well, and therefore, behaviour need not be changed. By contrast, team members infer from leaders' negative mood that there is a need for behavioural adjustment (Barsade & Gibson, 2007; Cacioppo & Gardner, 1999) and performance improvement (van Kleef, *et al.*, 2009). In other words, negative affective states convey the message that the current situation is unsatisfactory and that change is required (Mitchell, Boyle, Parker, Giles, Joyce, & Chiang, 2014). Leader negative moods signal to team members a suboptimal state of affairs and prompt observers to take remedial actions. Thus, leader negative moods encourage team members to adopt a bottom-up, detail-oriented, analytic approach to understanding situations, one more focused on understanding the data at hand and less focused on preexisting schemas, scripts, and top-down simplifying heuristics (Schwarz, Bless, & Bohner, 1991; Schwarz & Clore, 2003).

Such differential inferences, in turn, result in distinct behavioural responses. Specifically, leader positive mood may make it less likely that diverse teams overcome their proclivity to seek consensus information and prefer information received from ingroup members. Leader negative mood, on the other hand, reduces team members' reliance on assumed knowledge and increases more cautious, more motivated, and less biased information processing (Forgas & Koch, 2013; Goldenberg & Forgas, 2012). In reaction to leader negative mood, team members are therefore more likely to be attentive to details and consider multiple perspectives (George & King, 2007). Thus, we propose that in response to inferences drawn from negative leader mood, members of diverse teams are likely to engage in information elaboration. In sum, we posit:

*Hypothesis 2.* Leader negative mood (but not positive mood) moderates the relationship between functional team diversity and information elaboration, such that this relationship is positive when leader negative mood is high and negative when leader negative mood is low.

#### *Team diversity, leader mood, and team performance*

In the first two hypotheses, we propose that the moderating roles of leader positive and negative mood impact the relationship between functional diversity and collective team identification and information elaboration, respectively, in different ways. We argued that leader positive mood (but not leader negative mood) creates an environment that positively influences the relationship between functional diversity and identification. Moreover, we posited that leader negative mood (but not leader positive mood) promotes information elaboration in diverse teams. The possibility of such an incongruence of effects is of theoretical importance because past research on team diversity suggests that both of these elements, collective team identification and information elaboration, are vital factors in unlocking the potential of diverse teams. According to van Knippenberg *et al.* (2004), diverse teams must overcome social categorization and engage in information elaboration to mobilize the resources provided by their diversity of backgrounds, perspectives, and ideas.

These contradictory effects correspond with the two forces at play in diverse teams. On the one hand, diverse teams need alignment and cohesion, as can be fostered by, for example, a superordinate identity (van Dick *et al.*, 2008; Shemla & Wegge, 2019). On the other hand, diverse teams also require individual freedoms and divergence, as can be fostered by, for example, promoting psychological safety (Kirkman, Cordery, Mathieu, Rosen, & Kukenberger, 2013) and the leader's openness to different experiences (Troester, & van Knippenberg, 2012). These streams of research pose a paradoxical challenge. Promoting alignment and cohesion may reduce dysfunctional categorization, but the performance potential inherent in diversity can only be unlocked by utilizing differences.

The challenge of choosing from alternatives that seem to be mutually exclusive is not unique to the realm of moods. In fact, it is part of the either-or-perspective that is integral to many contingency leadership theories. By contrast, paradox perspectives (Smith & Lewis, 2011) explore how competing demands can both be addressed and how reconciling opposites can yield synergies. Specifically, this perspective posits that continuous efforts to meet divergent demands are required for sustainable success (Lewis, 2000a, 2000b; Zhang *et al.*, 2015). Applying this principle to the context of our study, we suggest that diverse teams are more likely to attain high levels of performance when leaders display both negative and positive moods. While it is unlikely that a leader could display both moods simultaneously, we argue that the display of both during a relevant performance period has a complementary effect. Together, the display of both leader positive and negative mood can help realize the positive potential of diversity. It is the combination of influences, one of which – leader positive mood – promotes unity and cohesion among team members in functionally diverse teams, while the other – leader negative mood – stimulates information elaboration. As a result of this combination, teams may succeed in leveraging the potential that functional diversity entails. Hence, we posit:

*Hypothesis 3.* There is a three-way interactive effect of functional diversity, leader positive mood, and leader negative mood on team performance. Specifically, the relationship between functional diversity and team performance will be most strongly positive at high levels of both leader positive mood and leader negative mood.

## **Methods**

### ***Sample and procedure***

Our initial sample consisted of 78 project teams in a large financial services firm specialized in advising corporations with regard to valuations, financial modelling, and mergers and acquisitions. Teams are assembled for the duration of a specific project, which usually lasts a few months. Although the projects may differ in terms of their content, the tasks that team members had to complete were generally similar and included data gathering and analysis, writing reports, and presenting solutions and recommendations to clients. As described below, we collected data from multiple sources over three measurement times. We have included in our final sample only those teams for which we have data from all three measurement times. Specifically, 12 out of the 78 teams that provided data in Time 1 did not respond in the following measurement times. Therefore, our final sample consisted of 304 individuals working in 66 teams. The average response

rate per team was 84%, and we had data from at least 79% of all team. The average team size was 4.92 ( $SD = 2.07$ ). The mean age was 31.89 years ( $SD = 4.63$ ) for team members and 36.55 years ( $SD = 6.43$ ) for team leaders. Of the team leaders, 64.2% were men and 35.8% were women; 51.5% of the team members were male and 48.5% were female. Mean organizational tenure was 3.26 years ( $SD = 0.70$ ).

We collected data from four different sources. Team functional diversity was measured based on objective data provided by the HR department; collective team identification and information elaboration were measured using self-ratings by team members; leader mood was rated by the team leaders; and team performance was rated by the clients. We measured the constructs of our model at three points in time. Specifically, at Time 1, the clients rated team performance (which we used as a control measure). On the same day, team leaders provided ratings of their mood. Four days later, at Time 2, we measured information elaboration and collective team identification. Finally, 1 week later (and 12 days after T1), the clients once again rated team performance. The clients were asked to evaluate the performance of the team with regard to the last 12 days since the first performance evaluation (T1).

## Measures

### Functional diversity

This type of diversity is an indicator of information and perspective variety in teams, which is of critical importance given the complex and ambiguous nature of the tasks that the teams in our sample had to complete. We calculated functional diversity based on data retrieved from company files that thus reflect the objective composition of the teams. The firm groups functional backgrounds using five categories that are associated with the different functional specializations of each employee (e.g., finance, HR, operations). The average number of functional backgrounds per team was 1.95 ( $SD = 0.69$ ).

Since we assume that functional diversity broadens the range of relevant knowledge, distinctive information, and unique experiences among unit members, it constitutes diversity in the form of variety (Harrison & Klein, 2007). Hence, we calculated this variable via Blau's (1977) index of heterogeneity:

$$1 - \sum p_i^2.$$

In the formula,  $p$  is the proportion of team members in a particular category and  $i$  is the number of categories represented in the team. The diversity index varies from 0 (perfectly homogenous team) to a maximum of 1 (perfectly heterogeneous team).

### Leader mood (positive and negative)

Leader mood (positive and negative) was measured with the Positive and Negative Affect Schedule (Watson, Clark, & Tellegen, 1988). The PANAS consists of twenty positive and negative affective adjectives that are associated with positive and negative mood. Team leaders were presented with a list of 20 adjectives and asked to 'indicate to what extent you have felt this way during the past day'. Moods were assessed on a five-point scale from 1 (*very slightly or not at all*) to 5 (*extremely*). Adjectives from the positive scale were, for example, 'excited', 'inspired', and 'active'; the negative scale included adjectives such as 'distressed', 'scared', and 'nervous'. The reliability of the positive and negative leader mood scales were  $\alpha = .86$  and  $\alpha = .89$ , respectively.

### *Collective team identification*

Members' identification with their team was assessed on a five-point scale ranging from 1 (*strongly disagree*) to 5 (*strongly agree*) developed by Mael and Ashforth (1992). We adapted the scale to the workplace by replacing the word 'school' with 'team' and used five of the six items. Sample items were, 'I am very interested in what others think about our team', and, 'This team's successes are my successes'. The scale had an internal consistency of  $\alpha = .92$ .

### *Information elaboration*

Information elaboration refers to the degree to which information is shared, processed, and integrated in group interaction (Homan, *et al.*, 2007). We measured elaboration using five items adapted from Homan *et al.* (2008) and Kearney and Gebert (2009). Sample items include 'The members of this team complement each other by openly sharing their knowledge'; and 'As a team, we try to use all available information'. The scale had an internal consistency of .86.

### *Team performance*

During a project, the team is directly supervised by the corporate client. We asked the manager assigned by the client to supervise the team to rate the respective team concerning its efficiency, quality of work, and overall achievements. The response format ranged from 1 ('very poor') to 7 ('excellent'). We chose this performance measure for two reasons. First, the firm designed this measure deliberately to make the performance of all teams comparable across clients. Second, this performance measure is a major determinant in the firm's design of feedback and goal setting processes, as well as in decisions regarding team composition, promotions, and bonuses.

### *Controls*

We used several control variables that previous studies have reported to be associated with the measures examined in this study. First, we controlled for two characteristics of the team, *team size* and *team longevity*. We measured team size as the objective number of team members, excluding the team leader. Team size has been found to affect the influence of diversity on team processes and outcomes (Curral, Forrester, Dawson, & West, 2001), as well as team performance and health (Wegge, Roth, Neubach, Schmidt, & Kanfer, 2008). We operationalized team longevity in terms of the time – in months – that a team has existed in its current composition. We preferred this measure over measuring the time since the beginning of the specific project because a few teams with the exact same composition had been assigned to other projects in the past. Moreover, we also controlled for positive and negative *leader affective trait* at T1. We measured leader affective trait with an online version of the PANAS (Watson, *et al.*, 1988). Each leader was asked to 'indicate to what extent you generally feel this way, that is, how you feel on the average'. Leader affective trait was assessed on a five-point scale from 1 (*very slightly or not at all*) to 5 (*extremely*). Leaders were presented with a list of 20 adjectives. Finally, since the experience and display of positive and negative moods may coincide (within the relevant time period of our study), we controlled for the effect of the non-focal mood in each hypothesis.

## Results

We report descriptive statistics and correlations in Table 1. Because collective team identification and information elaboration are conceptualized as ‘shared unit properties’ (Kozlowski & Klein, 2000, p. 30), our hypotheses require analysing the data at the team level. To test the appropriateness of conducting analyses at the team level, we calculated mean rwgs values (James, Demaree, & Wolf, 1984), which indicate the degree of agreement among members within teams, as well as two versions of the intraclass correlation coefficient to assess the ratio of between group to total variance (ICC1) and the reliability of average team perceptions (ICC2; Bliese, 2000). ICC(1) values above .10 represent at least a moderate influence of team membership and justify examination of rwgs values (LeBreton & Senter, 2008). Inter-rater agreement (rwgs) assesses within-team agreement for each team separately and should be at or above .70 (James, *et al.*, 1984). In our sample, ICCs and rwg were sufficient to aggregate our data to the team level. ICC(1) values for collective team identification and information elaboration were .14 and .23, respectively. The mean rwgs for information elaboration was .80, and the mean rwgs for collective team identification was .75. ICC(2) values for these constructs were .44 and .59, respectively. An ICC(2) value of .44 is considered relatively low. However, as low ICC(2)s decrease the chance of finding team-level relationships, our tests can thus be considered conservative (Bliese, 2000). We tested all hypotheses at the team level using hierarchical regression analysis with mean-centred predictor variables (Aiken & West, 1991).

Hypotheses 1 predicted that the relationship between team diversity and collective team identification would be moderated by positive leader mood (but not negative mood). Specifically, it was predicted that the interaction between diversity and positive leader mood would have a reversing form (Gardner, Harris, Li, Kirkman, & Mathieu, 2017), such that that the relationship between diversity and identification is positive when leader positive mood is high and negative when leader positive mood is low. The control

**Table 1.** Means, standard deviations, and correlations

Variable	Mean	SD	1	2	3	4	5	6	7	8	9	10
1. Team size	4.92	2.07	–									
2. Team longevity	3.23	0.70	.54	–								
3. Leader positive affective trait	3.55	0.33	-.13	-.20	–							
4. Leader negative affective trait	2.02	0.68	-.26*	-.27*	-.19	–						
5. Functional diversity	.50	0.24	-.03	.14	-.06	-.24	–					
6. Leader positive mood	3.28	0.54	.11	-.21	.27*	.17	-.08	–				
7. Leader negative mood	1.87	0.57	-.18	.03	.13	.05	.07	-.37**	–			
8. Elaboration	3.51	0.45	-.02	-.18	.24*	-.07	.01	-.36**	.20	–		
9. Identification	3.92	0.50	-.06	.02	.40**	-.14	-.05	.39**	-.22	.23	–	
10. Team performance	4.69	0.76	-.03	.10	.14	-.01	.01	.13	-.16	.13	.09	–

Note.  $N = 66$ . \* $p < .05$ ; \*\* $p < .01$ .

variables, team diversity, and leader mood explained 39% of the variance in collective team identification. Regression analyses (reported in Table 2, Model 1) revealed a significant interaction between team diversity and leader positive mood,  $b = .14$ ,  $t(56) = 2.25$ ,  $p < .05$ . This interaction added an additional 5% to the explained variance of team identification. In Figure 2, we graphed this interaction to aid in interpretation. To ascertain the nature of the interaction between team diversity and leader negative mood, we performed simple slopes analyses (Aiken & West, 1991). Since there are no specific values of leader positive mood that are inherently interpretable, we tested whether there is a significant association between functional diversity and collective identification at values of positive leader mood that correspond to the 10th and 90th percentiles of the distribution of this variable (Dawson, 2014). In support of our first hypothesis, we found a reversing form interaction such that when leader positive mood was high (90th percentile, corresponding to a score of 4), functional diversity was positively associated with collective team identification ( $b = .14$ ,  $t = 2.35$ ,  $p < .05$ ), whereas this relationship was negative when leader positive mood was low (10th percentile, corresponding to a score of 2.6;  $b = -.21$ ,  $t = -3.59$ ,  $p < .05$ ). The interaction of team diversity and leader negative mood was not significant (see Table 2, Model 2). Overall, these results are in line with Hypothesis 1.

Hypothesis 2 predicted that negative leader mood (but not positive mood) moderates the relationship between functional diversity and information elaboration. Specifically, we hypothesized that the interaction between functional diversity and negative leader mood will have a reversing form, such that the relationship between functional diversity and information elaboration is positive when leader negative mood is high and negative when leader negative mood is low. In the first step, the regression model included the controls, team diversity, and leader negative mood. In the second step, we added the interaction of negative leader mood with team functional diversity. The second step yielded a significant amount of explained variance over and above step 1 ( $\Delta R^2 = .07$ ; see Table 2, Model 3). As depicted in Figure 3, when leader negative mood was high (90th percentile, corresponding to a score of 2.7), functional diversity was positively related to information elaboration ( $b = .25$ ,  $t = 3.86$ ,  $p < .05$ ). By contrast, team diversity was negatively, albeit non-significantly, related to information elaboration when leader negative mood was low (10th percentile, corresponding to a score of 1.10;  $b = -.11$ ,  $t = -1.86$ , *n.s.*). Thus, instead of the expected reversing form of interaction, we found that negative leader mood accentuated the effect of functional diversity on information elaboration. The interaction of team diversity and leader positive mood was not significant (see Table 2, Model 4). Overall, these findings are in support of Hypothesis 2.

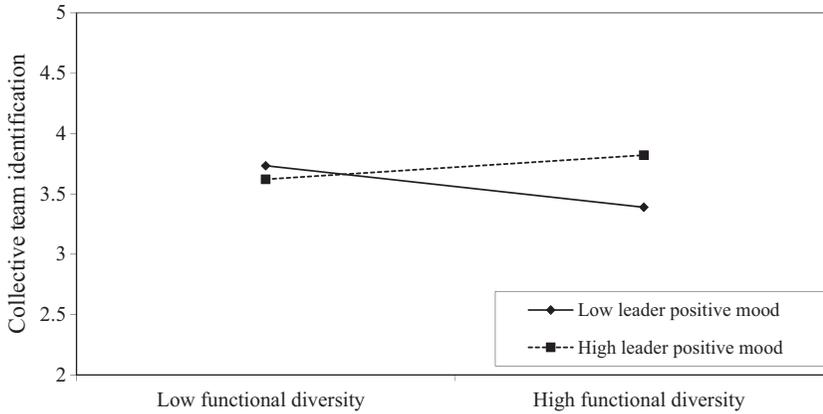
Finally, the results confirmed Hypothesis 3, which predicted a three-way interactive effect of functional diversity, leader positive mood, and leader negative mood on team performance. As expected, we found that the interaction among these three variables added significantly to the prediction of team performance ( $\Delta R^2 = .07$ ; see Table 3). As depicted in Figure 4, functional diversity was most strongly positively related to team performance when both leader positive mood and negative mood were high ( $b = .50$ ,  $t = 5.81$ ,  $p < .01$ ). A slope difference test (Dawson & Richter, 2006) shows that the high leader positive mood – high leader negative mood slope was significantly more positive than the high leader positive mood – low leader negative mood slope ( $t = 2.58$ ,  $p < .01$ ), the low leader positive mood – high leader negative mood slope ( $t = 3.21$ ,  $p < .001$ ), as well as the low leader positive mood – low leader negative mood slope ( $t = 5.15$ ,  $p < .001$ ).

Table 2. Results of regression analyses

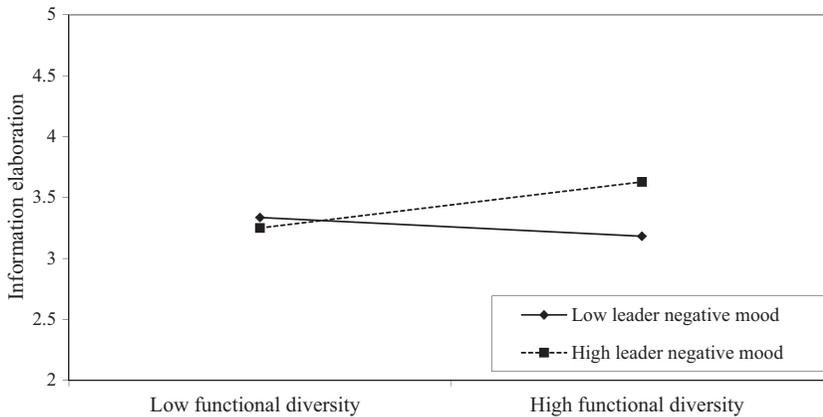
Variable	Model 1: Collective team identification		Model 2: Collective team identification		Model 3: Information elaboration		Model 4: Information elaboration	
	Step 1	Step 2	Step 1	Step 2	Step 1	Step 2	Step 1	Step 2
<b>Control</b>								
Team size	-.04 (.05)	-.05 (.05)	-.05 (.05)	-.05 (.05)	-.02 (.06)	-.02 (.05)	-.02 (.05)	-.02 (.06)
Team longevity	.01 (.06)	.02 (.06)	.02 (.06)	.01 (.06)	-.05 (.06)	-.05 (.06)	-.04 (.06)	-.04 (.06)
Leader positive affective trait	.18 (.06)*	.19 (.06)*	.18 (.06)*	.19 (.06)*	.09 (.06)	.09 (.06)	.07 (.06)	.08 (.06)
Leader negative affective trait	-.08 (.06)	-.07 (.06)	-.08 (.06)	-.09 (.06)	-.00 (.06)	-.02 (.06)	-.00 (.06)	-.00 (.06)
Performance T1	.00 (.08)	-.01 (.07)	.00 (.08)	-.02 (.08)	.05 (.08)	.03 (.07)	.05 (.08)	.05 (.08)
Leader positive mood			.09 (.06)	.08 (.06)	.10 (.06)	.09 (.06)	.06 (.06)	.06 (.06)
Leader negative mood	-.10 (.06)*	-.11 (.06)						
<b>Main predictors</b>								
Functional diversity (FD)	-.01 (.05)	-.04 (.05)	-.01 (.05)	.00 (.06)	.03 (.06)	.06 (.06)	.03 (.06)	.02 (.06)
Leader positive mood (LPM)	.09 (.06)	.08 (.06)					.10 (.06)*	.10 (.06)*
Leader negative mood (LNM)			-.10 (.06)	-.14 (.06)*	.06 (.06)	.09 (.06)*		
<b>Interactions</b>								
FD × LPM		.14 (.06)*						-.04 (.07)
FD × LNM				.11 (.06)				.13 (.07)*
R <sup>2</sup>	.39	.44	.36	.38	.43	.50	.43	.44
ΔR <sup>2</sup>		.05*		.02		.07*		.00

Note. N = 66; unstandardized beta coefficients are reported along with standard errors in parentheses.

\*.05; \*\*.01.



**Figure 2.** The moderating role of positive leader mood on the relationship between functional diversity and collective team identification.



**Figure 3.** The moderating role of negative leader mood on the relationship between functional diversity and information elaboration.

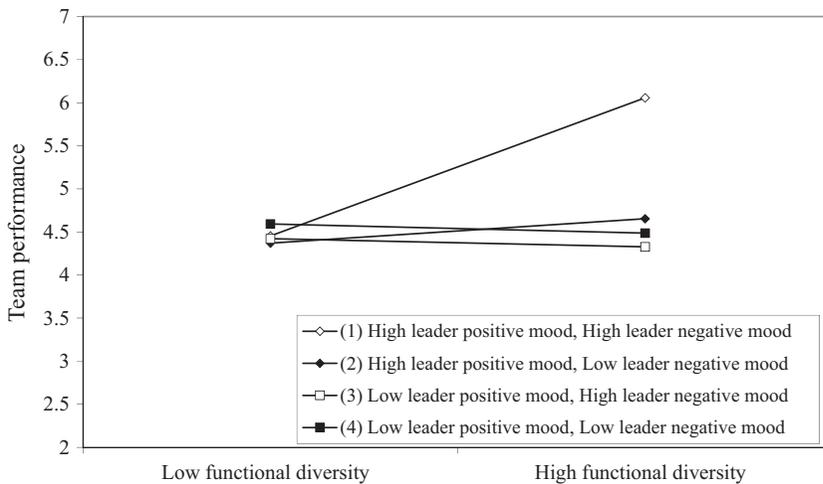
## Discussion

Integrating theory and research on team diversity, leader mood, and the social functions of emotions, we proposed that leader positive and negative mood moderate the effects of team functional diversity on collective team identification and information elaboration, as well as on team performance. As predicted, we found that, when leader positive mood was high, functional diversity was positively related to collective team identification (but not information elaboration), whereas when leader negative mood was high, functional diversity was positively related to information elaboration (but not collective team identification). Furthermore, the results showed that functional diversity was most strongly related to team performance when both leader positive mood and leader negative mood were high.

**Table 3.** Results of regression analyses

Variable	Model 1: Team performance		
	Step 1	Step 2	Step 3
<b>Control</b>			
Team size	-.04 (.10)	-.04 (.10)	-.02 (.10)
Team longevity	.16 (.15)	.15 (.15)	.15 (.15)
Leader positive affective trait	.13 (.10)	.14 (.10)	.10 (.11)
Leader negative affective trait	-.02 (.11)	-.05 (.11)	-.05 (.11)
Performance TI	.05 (.08)	.08 (.08)	.06 (.07)
<b>Main predictors</b>			
Functional diversity (FD)	.00 (.10)	.03 (.11)	.07 (.11)
Leader positive mood (LPM)	.04 (.11)	.05 (.12)	.07 (.12)
Leader negative mood (LNM)	-.13 (.11)	-.18 (.12)	-.11 (.13)
<b>Interactions</b>			
FD × LPM		.01 (.12)	.04 (.12)
FD × LNM		.11 (.13)	.14 (.13)
FD × LPM × LNM			.24 (.13)*
$R^2$	.28	.32	.39
$\Delta R^2$		.04	.07*

Note.  $N = 66$ ; unstandardized beta coefficients are reported along with standard errors in parentheses. \*.05; \*\*.01.



**Figure 4.** A three-way interaction effect of functional diversity, leader positive mood, and leader negative mood on team performance.

### Theoretical implications

Within the context of team diversity research, our study is noteworthy in several respects. Our findings add support to the contingency approach in the diversity literature (van Knippenberg, *et al.*, 2004) by illustrating that the impact of functional

team diversity depends on contextual conditions such as leader moods. On the basis of our findings, we would argue that leaders' moods play a role in helping to unlock the benefits of functional team diversity. In this regard, our findings also add to a nascent body of literature examining the moderating effects of leadership on the relationship between team diversity, team processes, and team outcomes (Guillaume *et al.*, 2017). We add to and go beyond prior research by showing that the impact of a team leader on the effects of diversity can be found even in the display of moods and thus goes beyond specific leadership behaviours or styles that had been examined previously. Our study thus underscores the importance of leaders in leveraging the potential of team diversity.

The extant literature on how leadership can help teams benefit from diversity is fragmented in that it is difficult to discern a common thread in this research. For example, some leadership styles that are typically positively related to team performance in general may at times have detrimental effects in diverse teams (Hmieleski & Ensley, 2007; Somech, 2006). Our research advances knowledge on when leadership is more or less likely to help leverage the potential inherent in diverse teams.

Towards this end, our main finding concerns the incongruent effects of positive and negative leader mood on the relationship between team diversity and collective team identification and information elaboration. Our findings suggest that, over a relevant performance period, incongruent influences may complement each other, such that together they can help realize the positive potential of diversity. Hence, the contribution of our paper goes beyond identifying two novel moderators of the link between functional diversity and team performance by developing a model that could help to integrate findings in the literature on how best to lead diverse teams. This model explains that effective leadership of diverse teams requires opposing but ultimately complementary leader influences. It is the *combination* of influences, some of which – such as positive mood – promote unity and cohesion among team members, whereas others – such as negative mood – stimulate the elaboration and utilization of information that in turns help diverse teams to outperform homogenous teams. The finding that the combination of high leader positive mood with high leader negative mood results in a positive relationship between functional diversity and team performance provides further evidence for the idea that opposing and complementary influences benefit diverse teams (Gebert, Boerner, & Kearney, 2010; Pratt, 1998; van der Vegt & Bunderson, 2005; van Knippenberg & van Schie, 2000).

Finally, our study also contributes to research on emotions as social information. Specifically, we operationalized the two pathways described in the EASI model (van Kleef, 2009) using core constructs of the CEM and tested them by drawing on previous diversity research. Our results lend support to the principles described in the EASI model, namely that moods can exert interpersonal influence by providing information to observers. Furthermore, our study extends previous research on the social functional perspective of emotions in general and on the EASI model in particular by applying its principles to general moods rather than discrete emotions. Similarly, while most previous research on emotions as social information has been conducted in the laboratory, our sample comprised real-life organizational teams. This point is important because it illustrates that emotions can exert an influence on observers as predicted by the EASI model even in a 'noisy' environment (van Kleef, 2009), in which multiple emotions are being expressed and each team member has the potential to act as an expresser as well as an observer of emotions.

### **Managerial implications**

Given that team diversity holds potential for both benefiting and impairing team outcomes (van Knippenberg & Schippers, 2007), leaders may wish to enhance the performance of their teams by curtailing the threats and fostering the advantages that are inherent in functionally diverse teams. To that end, our findings suggest that leaders are well advised to be cognizant of how they might reconcile two opposing forces in the team. While leaders of diverse teams are required to stimulate the sharing and exchange of information, at the same time they also need to foster unity and cohesion among team members. In other words, our study reveals a unique aspect of leading diverse teams, namely that leaders need to navigate between the need to promote and enable unique ideas and views while at the same time uniting diverse team members under a common purpose. In this study, we find one particular example of how leaders can realize the promise of diverse teams by encouraging both of these forces.

We found that high levels of leader positive mood facilitate a positive link between team diversity and collective team identification, whereas high levels of leader negative mood coincided with a positive relationship between diversity and information elaboration. These incongruent effects of positive and negative moods suggest that leaders need to adapt their behaviours to their teams' respective needs at a certain time. Most important, our findings suggest that, over a relevant performance period, diverse teams benefit most from leaders who can foster conditions that facilitate both identification and elaboration. To do so effectively, leaders are required not only to be sensitive to the affective tone of their team at any given moment, but also to be aware of how their emotional displays influence team members' moods and behaviours as well as team processes. Thus, leaders are well advised to monitor and regulate their emotions in line with situational demands. Doing so apparently enables leaders to better leverage the performance potential that diversity entails.

### **Limitations and directions for future research**

We acknowledge several limitations of this study. First, we focused on the influence of leaders' moods on team processes and outcomes. However, these processes are likely to be reciprocal. In particular, it is possible that team members' moods influence leader mood or that the impact of emotions has a multidirectional, repetitive, and cyclical form. While we cannot rule out the possibility of more complex forms of affective influence, based on previous research it is reasonable to assume that the most central and important direction of emotional influence is indeed the one from the leader to his or her followers. Due to their central role in the team, leaders possess higher status and more power than followers and thus have more possibilities to influence team processes (Anderson & Berdahl, 2002) and team members' emotions (Anderson, Keltner, & John, 2003; Schraub, Micheli, Shemla & Sonntag, 2014). Furthermore, individuals lower in the hierarchy are generally more attentive to their superiors' nonverbal behaviours and are quick to detect their leader's affective state (Lewis, 2000a, 2000b). Hence, it seems reasonable to assume that team members are more strongly influenced by their leader's emotions than vice versa. Nevertheless, there may be instances in which a team member other than the official leader occupies a central and influential position within the team. At any rate, future research would benefit from examining more complex patterns of emotional influence within teams.

A second limitation of this study pertains to the issue of causality and timing. First, it is possible that the very composition of the teams influenced their collective mood. For

instance, it is conceivable that some of the challenges that tend to be more pronounced in diverse teams (e.g., lower trust, higher conflict, lower satisfaction, etc.) would be a source of negative mood for leaders in their own right. Second, it may be that the importance of positive mood (and in extension unity and cohesion) versus negative mood (and in extension information processing and integration) may vary depending on the maturity of the team or its performance stage. The issue of timing and causality may be especially relevant in the case of newly founded diverse teams, where leaders may be facing the question of whether to prioritize cohesion and unity over information elaboration.

A final weakness of this study concerns the measurement of the key variables in our model, including leader moods, information elaboration, and collective team identification only once. Conducting longitudinal research by collecting data on these variables at multiple points in time could shed light on the process by which leader mood variability engenders a more positive influence in diverse teams. Our results show that leader mood variability may help unlock the performance potential of teams by engendering complementary influences on team members. While negative and positive leader mood may signal contrasting messages when displayed simultaneously, over time they may complement each other. As Li *et al.* (2018) recently showed, variability and change over time in diverse teams may have unique effects that may go unnoticed when looking at teams with a single snapshot. In this regard, a longitudinal research design could help uncover the impact of duration, order, timing, and intensity of leader mood variability on team processes and outcomes in diverse teams.

In conclusion, our research opens up an interesting new avenue for the literature that examines how leaders can bring to fruition the potential benefits of functional diversity. Whereas prior work has focused on leadership behaviours and styles, we took a different approach and showed the promise of also considering leader moods in the effort to understand how best to lead diverse teams. We hope that future research will take up this thread and investigate independent as well as joint influences of moods and behaviours and thus paint a more holistic picture of how leaders affect diverse teams.

## Conflicts of interest

All authors declare no conflict of interest.

## Author contribution

Meir Shemla: Conceptualization, Data curation, Formal analysis, Methodology, Writing – original draft; Eric Kearney: Conceptualization, Writing – original draft; Jürgen Wegge: Conceptualization, Supervision, Writing – original draft; and Sebastian Stegmann: Conceptualization, Writing – original draft.

## Data Availability Statement

Research data are not shared.

## References

- Aiken, L. S., & West, S. G. (1991). *Multiple regression: Testing and interpreting interactions*. Thousand Oaks, CA: Sage.

- Anderson, C., & Berdahl, J. L. (2002). The experience of power: Examining the effects of power on approach and inhibition tendencies. *Journal of Personality and Social Psychology*, *83*, 1362–1377. <https://doi.org/10.1037//0022-3514.83.6.1362>
- Anderson, C., Keltner, D., & John, O. P. (2003). Emotional convergence between people over time. *Journal of Personality and Social Psychology*, *84*, 1054–1068. <https://doi.org/10.1037/0022-3514.84.5.1054>
- Baron, R. A., Fortin, S. P., Frei, R. L., Hauver, L. A., & Shack, M. L. (1990). Reducing organizational conflict: The role of socially-induced positive affect. *The International Journal of Conflict Management*, *1*, 133–152. <https://doi.org/10.1108/eb022677>
- Barsade, S. G., & Gibson, D. E. (2007). Why does affect matter in organizations? *Academy of Management Perspectives*, *21*, 36–59. <https://doi.org/10.5465/amp.2007.24286163>
- Bezrukova, K., Jehn, K. A., Zanutto, E. L., & Thatcher, S. M. B. (2009). Do workgroup faultlines help or hurt? A moderated model of faultlines, team identification, and group performance. *Organization Science*, *20*, 35–50. <https://doi.org/10.1287/orsc.1080.0379>
- Blau, P. M. (1977). *Inequality and heterogeneity*. New York, NY: Free Press.
- Bliese, P. D. (2000). Within-group agreement, nonindependence, and reliability: Implications for data aggregation and analysis. In K. J. Klein & S. W. Kozlowski (Eds.), *Multilevel theory, research, and methods in organizations* (pp. 349–381). San Francisco, CA: Jossey-Bass.
- Bono, J. E., & Ilies, R. (2006). Charisma, positive emotions and mood contagion. *The Leadership Quarterly*, *17*, 317–334. <https://doi.org/10.1016/j.leaqua.2006.04.008>
- Brewer, M. B. (1995). Managing diversity: The role of social identities. In S. E. Jackson & M. N. Ruderman (Eds.), *Diversity in work teams research paradigms for a changing workplace* (pp. 47–68). Washington, DC: American Psychological Association.
- Cacioppo, J. T., & Gardner, W. L. (1999). Emotion. *Annual Review of Psychology*, *50*, 191–214. <https://doi.org/10.1146/annurev.psych.50.1.191>
- Carnevale, P. J. D., & Isen, A. M. (1986). The influence of positive affect and visual access on the discovery of integrative solutions in bilateral negotiation. *Organizational Behavior and Human Decision Processes*, *37*, 1–13. [https://doi.org/10.1016/0749-5978\(86\)90041-5](https://doi.org/10.1016/0749-5978(86)90041-5)
- Clark, M. S., Pataki, S. P., & Carver, V. H. (1996). Some thoughts and findings on self-presentation of emotions in relationship. In G. J. O. Fletcher & J. Fitness (Eds.), *Knowledge structure in close relationships: A social psychological approach* (pp. 247–274). Mahwah, NJ: Erlbaum.
- Currall, L. A., Forrester, R. H., Dawson, J. F., & West, M. A. (2001). It's what you do and the way that you do it: Team task, team size, and innovation-related group processes. *European Journal of Work and Organizational Psychology*, *10*, 187–204. <https://doi.org/10.1080/13594320143000627>
- Dasborough, M. (2006). Cognitive asymmetry in employee emotional reactions to leadership behaviors. *Leadership Quarterly*, *17*, 163–178. <https://doi.org/10.1016/j.leaqua.2005.12.004>
- Dasborough, M. T., & Ashkanasy, N. M. (2002). Emotion and attribution of intentionality in leader-member relationships. *The Leadership Quarterly*, *13*, 615–634. [https://doi.org/10.1016/S1048-9843\(02\)00147-9](https://doi.org/10.1016/S1048-9843(02)00147-9)
- Dawson, J. F. (2014). Moderation in management research: What, why, when, and how. *Journal of Business Psychology*, *29*, 1–19. <https://doi.org/10.1007/s10869-013-9308-7>
- Dawson, J. F., & Richter, A. W. (2006). Probing three-way interactions in moderated multiple regression: Development and application of a slope difference test. *Journal of Applied Psychology*, *91*, 917. <https://doi.org/10.1037/0021-9010.91.4.917>
- Forgas, J. P., & Koch, A. (2013). Mood effects on cognition. In M. D. Robinson, E. R. Watkins & E. Harmon-Jones (Eds.), *Handbook of emotion and cognition*. New York, NY: Guilford.
- Gaddis, B., Connelly, S., & Mumford, M. D. (2004). Failure feedback as an affective event: Influences of leader affect on subordinate attitudes and performance. *The Leadership Quarterly*, *15*, 663–686. <https://doi.org/10.1016/j.leaqua.2004.05.011>
- Gaertner, S. L., & Dovidio, J. F. (2000). *Reducing intergroup bias: The common ingroup identity model*. Philadelphia, PA: Psychology Press.

- Gardner, R. G., Harris, T. B., Li, N., Kirkman, B. L., & Mathieu, J. E. (2017). Understanding “It depends” in organizational research: A theory-based taxonomy, review, and future research agenda concerning interactive and quadratic relationships. *Organizational Research Methods*, 20(4), 610–638. <https://doi.org/10.1177/1094428117708856>.
- Gebert, D., Boerner, S., & Kearney, E. (2010). Fostering team innovation: Why is it important to combine opposing action strategies? *Organization Science*, 21, 593–608. <https://doi.org/10.1287/orsc.1090.0485>
- George, J. M. (1995). Leader positive mood and group performance: The case of customer service. *Journal of Applied Social Psychology*, 25, 778–794. <https://doi.org/10.1111/j.1559-1816.1995.tb01775.x>
- George, J. M., & Bettenhausen, K. (1990). Understanding prosocial behavior, sales performance, and turnover—a group-level analysis in a service context. *Journal of Applied Psychology*, 75, 698–709. <https://doi.org/10.1037/0021-9010.75.6.698>
- George, J. M., & Brief, A. P. (1992). Feeling good-doing well: A conceptual analysis of the mood at work-organizational spontaneity relationship. *Psychology Bulletin*, 112, 310–329. <https://doi.org/10.1037/0033-2909.112.2.310>
- George, J. M., & King, E. B. (2007). Potential pitfalls of affect convergence in teams: Functions and dysfunctions of group affective tone. In E. A. Mannix, M. A. Neale & C. P. Anderson (Eds.), *Research on managing groups and teams*, Vol. 10 (pp. 97–123). Oxford, UK: Elsevier.
- Goldenberg, L., & Forgas, J. P. (2012). Can happy mood reduce the just world bias? Affective influences on blaming the victim. *Journal of Experimental Social Psychology*, 48, 239–243. <https://doi.org/10.1016/j.jesp.2011.07.007>
- Goncalo, J. A., Chatman, J. A., Duguid, M. M., & Kennedy, J. A. (2015). Creativity from constraint? How political correctness influences creativity in mixed-sex work groups. *Administrative Science Quarterly*, 60(1), 1–30. <https://doi.org/10.1177/0001839214563975>
- Greer, L. L., Homan, A. C., de Hoogh, A. H. B., & den Hartog, D. N. (2012). Tainted visions: The effects of visionary leader behaviors and leader categorization tendencies on the financial performance of ethnically diverse teams. *Journal of Applied Psychology*, 97, 203–213. <https://doi.org/10.1037/a0025583>.
- Guillaume, Y. R. F., Dawson, J. F., Otaye-Ebede, L., Woods, S. A., & West, M. A. (2017). Harnessing demographic differences in organizations: What moderates the effects of workplace diversity? *Journal of Organizational Behavior*, 38, 276–303. <https://doi.org/10.1002/job.2040>
- Harrison, D. A., & Klein, K. J. (2007). What’s the difference? Diversity constructs as separation, variety, or disparity in organizations. *Academy of Management Review*, 32, 1199–1228. <https://doi.org/10.5465/amr.2007.26586096>
- Haslam, A. (2004). *Psychology of organizations* (2nd ed.). London, UK: Sage.
- Hentschel, T., Shemla, S., Wegge, J., & Kearney, E. (2013). Perceived diversity is bad for team functioning: The role of shared emotions as a mediator and diversity beliefs as a moderator. *Small Group Research*, 44(1), 33–61. <https://doi.org/10.1177/1046496412470725>
- Hmieleski, K. M., & Ensley, M. D. (2007). A contextual examination of new venture performance: Entrepreneur leadership behavior, top management team heterogeneity, and environmental dynamism. *Journal of Organizational Behavior*, 28, 865–889. <https://doi.org/10.1002/job.479>
- Hoever, I. J., van Knippenberg, D., van Ginkel, W. P., & Barkema, H. G. (2012). Fostering team creativity: Perspective taking as key to unlocking diversity’s potential. *Journal of Applied Psychology*, 97, 982–996. <https://doi.org/10.1037/a0029159>
- Homan, A. C., & Greer, L. L. (2013). Considering diversity: The positive effects of considerate leadership in diverse teams. *Group Processes & Intergroup Relations*, 16, 105–125. <https://doi.org/10.1177/1368430212437798>
- Homan, A. C., Hollenbeck, J. R., Humphrey, S. E., Van Knippenberg, D., Ilgen, D. R., & Van Kleef, G. A. (2008). Facing differences with an open mind: Openness to experience, salience of intragroup differences, and performance of diverse work groups. *Academy of Management Journal*, 51, 1204–1222. <https://doi.org/10.5465/amj.2008.35732995>

- Homan, A. C., van Knippenberg, D., Van Kleef, G. A., & De Dreu, C. K. W. (2007). Bridging faultlines by valuing diversity: Diversity beliefs, information elaboration, and performance in diverse work groups. *Journal of Applied Psychology, 92*, 1189–1199. <https://doi.org/10.1037/0021-9010.92.5.1189>
- 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](https://doi.org/10.1016/S1048-9843(02)00140-6)
- Humphrey, R. H., Kellett, J. B., Sleeth, R. G., & Hartman, N. S. (2008). Research trends in emotion and leadership. In N. M. Ashkenazi & C. L. Cooper (Eds.), *Research companion to emotion in organizations* (pp. 455–464). Northampton, UK: Edward Elgar Publishing.
- Jackson, S. E., & Joshi, A. (2004). Diversity in social context: A multi-attribute, multilevel analysis of team diversity and sales performance. *Journal of Organizational Behavior, 25*, 675–702. <https://doi.org/10.1002/job.265>
- Jackson, S. E., & Joshi, A. (2011). Work team diversity. In S. Zedeck (Ed.), *APA handbooks in psychology. APA handbook of industrial and organizational psychology*, Vol. 1. Building and developing the organization, (pp. 651–686). Washington, DC: American Psychological Association. <https://doi.org/10.1037/12169-020>
- James, L. R., Demaree, R. G., & Wolf, G. (1984). Estimating within-group interrater reliability with and without response bias. *Journal of Applied Psychology, 69*, 85–98. <https://doi.org/10.1037/0021-9010.69.1.85>
- Joshi, A., & Roh, H. (2009). The role of context in work team diversity research: A meta-analytic review. *Academy of Management Journal, 52*, 599–627. <https://doi.org/10.5465/amj.2009.41331491>
- Kearney, E., & Gebert, D. (2009). Managing diversity and enhancing team outcomes: The promise of transformational leadership. *Journal of Applied Psychology, 94*, 77–89. <https://doi.org/10.1037/a0013077>
- Kearney, E., Gebert, D., & Voelpel, S. C. (2009). When and how diversity benefits teams: The importance of team members' need for cognition. *Academy of Management Journal, 52*, 581–598. <https://doi.org/10.5465/amj.2009.41331431>
- Kearney, E., Shemla, M., van Knippenberg, D., & Scholz, F. A. (2019). A paradox perspective on the interactive effects of visionary and empowering leadership. *Organizational Behavior and Human Decision Processes, 155*, 20–30. <https://doi.org/10.1016/j.obhdp.2019.01.001>
- Keller, R. T. (2001). Cross-functional project groups in research and new product development: Diversity, communications, job stress, and outcomes. *Academy of Management Journal, 44*, 547–59. <https://doi.org/10.2307/3069369>
- Kirkman, B. L., Cordery, J. L., Mathieu, J., Rosen, B., & Kukenberger, M. (2013). Global organizational communities of practice: The effects of nationality diversity, psychological safety, and media richness on community performance. *Human Relations, 66*, 333–362. <https://doi.org/10.1177/0018726712464076>
- Klein, K. J., Knight, A. P., Ziegert, J. C., Lim, B.-C., & Saltz, J. L. (2011). When team members' values differ: The moderating role of team leadership. *Organizational Behavior and Human Decision Processes, 114*, 125–136. <https://doi.org/10.1016/j.obhdp.2010.08.004>
- Klinnert, M. D., Campos, J. J., Sorce, J. F., Emde, R. N., & Svejda, M. (1983). Emotions as behavior regulators: Social referencing in infants. In R. Plutchik & H. Kellerman (Eds.), *Emotion theory, research, and experience: Emotions in early development*, Vol. 2 (pp. 57–68). New York, NY: Academic Press.
- Kooij-de Bode, H. J. M., van Knippenberg, D., & van Ginkel, W. P. (2008). Ethnic diversity and distributed information in group decision making: The importance of information elaboration. *Group Dynamics: Theory, Research, and Practice, 12*, 307–320. <https://doi.org/10.1037/1089-2699.12.4.307>
- Kozlowski, S. W. J., & Klein, K. J. (2000). A multilevel approach to theory and research in organizations: Contextual, temporal, and emergent processes. In K. J. Klein & S. W. J. Kozlowski (Eds.), *Multilevel theory, research, and methods in organizations: Foundations, extensions, and new directions* (pp. 3–90). San Francisco, CA: Jossey-Bass.

- Kunze, F., & Bruch, H. (2010). Age-based faultlines and perceived productive energy: The moderation of transformational leadership. *Small Group Research*, *41*, 593–620. <https://doi.org/10.1177/1046496410366307>
- LeBreton, J. M., & Senter, J. L. (2008). Answers to 20 questions about interrater reliability and interrater agreement. *Organizational Research Methods*, *11*, 815–852. <https://doi.org/10.1177/1094428106296642>
- Lewis, M. (2000a). Exploring paradox: Toward a more comprehensive guide. *Academy of Management Review*, *25*, 760–776. <https://doi.org/10.5465/amr.2000.3707712>
- Lewis, M. (2000b). When leaders display emotion: how followers respond to negative emotional expression of male and female leaders. *Journal of Organizational Behavior*, *21*, 221–234. [https://doi.org/10.1002/\(SICI\)1099-1379\(200003\)21:2<221:AID-JOB36>3.0.CO;2-0](https://doi.org/10.1002/(SICI)1099-1379(200003)21:2<221:AID-JOB36>3.0.CO;2-0)
- Li, J., Meyer, B., Shemla, M., & Wegge, J. (2018). From being diverse to becoming diverse: A dynamic team diversity theory. *Journal of Organizational Behavior*, *39*, 956–970. <https://doi.org/10.1002/job.2272>
- Mael, F., & Ashforth, B. E. (1992). Alumni and their alma-mater – A partial test of the reformulated model of organizational identification. *Journal of Organizational Behavior*, *13*, 103–123. <https://doi.org/10.1002/job.4030130202>
- Mitchell, R., Boyle, B., Parker, V., Giles, M., Joyce, P., & Chiang, V. (2014). Transformation through tension: The moderating impact of negative affect on transformational leadership in teams. *Human Relations*, *67*, 1095–1121. <https://doi.org/10.1177/0018726714521645>
- 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*, 941–966. <https://doi.org/10.1002/job.413>
- Nishii, L. H., & Mayer, D. M. (2009). Do inclusive leaders help to reduce turnover in diverse groups? The moderating role of leader-member exchange in the diversity to turnover relationship. *Journal of Applied Psychology*, *94*, 1412–1426. <https://doi.org/10.1037/a0017190>
- Phillips, K., & Lount, R. (2007). The affective consequences of diversity and homogeneity in groups. In E. Mannix, M. Neale & C. Anderson (Eds.), *Research on managing groups and teams*, Vol. 10 (pp. 1–20). Greenwich, CT: JAI Press.
- Pratt, M. G. (1998). To be or not to be? Central questions in organizational identification. In D. A. Whetten & P. C. Godfrey (Eds.), *Identity in organizations: Building theory through conversations* (pp. 171–207). Thousand Oaks, CA: SAGE.
- Roccas, S., & Brewer, M. B. (2002). Social identity complexity. *Personality and Social Psychology Review*, *6*, 88–106. [https://doi.org/10.1207/S15327957PSPR0602\\_01](https://doi.org/10.1207/S15327957PSPR0602_01)
- Schraub, E. M., Micheli, A., Shemla, M., & Sonntag, K. (2014). The role of leader emotion management and team conflict for team members' proactive behavior: A multilevel perspective. *European Journal of Work and Organizational Psychology*, *23*, 263–276. <https://doi.org/10.1080/1359432X.2012.728700>
- Schwarz, N., Bless, H., & Bohner, G. (1991). Mood and persuasion – Affective states influence the processing of persuasive communications. *Advances in Experimental Social Psychology*, *24*, 161–199. [https://doi.org/10.1016/S0065-2601\(08\)60329-9](https://doi.org/10.1016/S0065-2601(08)60329-9)
- Schwarz, N., & Clore, G. (2003). Mood as Information: 20 Years Later. *Psychological Inquiry*, *14*(3), 296–303.
- Shemla, M., Meyer, B., Greer, L. L., & Jehn, K. A. (2016). A review of perceived diversity in teams: Does how members perceive their team's composition impact team processes and outcomes? *Journal of Organizational Behavior*, *37*, 89–106. <https://doi.org/10.1002/job.1957>
- Shemla, M., & Wegge, J. (2019). Managing diverse teams by enhancing team identification: The mediating role of perceived diversity. *Human Relations*, *72*, 755–777. <https://doi.org/10.1177/0018726718778101>
- Shin, S. J., & Zhou, J. (2007). When is educational specialization heterogeneity related to creativity in research and development teams? Transformational leadership as a moderator. *Journal of Applied Psychology*, *92*, 1709–1721. <https://doi.org/10.1037/0021-9010.92.6.1709>

- Smith, W. K., & Lewis, M. W. (2011). Toward a theory of paradox: A dynamic equilibrium model of organizing. *Academy of Management Review*, *36*, 381–403. <https://doi.org/10.5465/amr.2009.0223>
- Somech, A. (2006). The effects of leadership style and team process on performance and innovation in functionally heterogeneous teams. *Journal of Management*, *32*, 132–157. <https://doi.org/10.1177/0149206305277799>
- Sy, T., & Choi, J. N. (2013). Contagious leaders and followers: Exploring multi-stage mood contagion in a leader activation and member propagation (LAMP) model. *Organizational Behavior and Human Decision Processes*, *122*, 127–140. <https://doi.org/10.1016/j.obhdp.2013.06.003>
- Sy, T., Cote, 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>
- Tannenbaum, S. I., Mathieu, J. E., Salas, E., & Cohen, D. (2012). Teams are changing: Are research and practice evolving fast enough? *Industrial and Organizational Psychology: Perspectives on Science and Practice*, *5*(1), 2–24.
- Troester, C., & van Knippenberg, D. (2012). Leader openness, nationality dissimilarity, and voice in multinational management teams. *Journal of International Business Studies*, *43*, 591–613. <https://doi.org/10.1057/jibs.2012.15>
- Tsai, W.-C., Chen, H.-W., & Cheng, J.-W. (2009). Employee positive moods as a mediator linking transformational leadership and employee work outcomes. *The International Journal of Human Resource Management*, *20*, 206–219. <https://doi.org/10.1080/09585190802528714>
- van Beest, I., van Kleef, G. A., & van Dijk, E. (2008). Get angry, get out: The interpersonal effects of anger communication in multiparty negotiation. *Journal of Experimental Social Psychology*, *44*, 993–1002. <https://doi.org/10.1016/j.jesp.2008.02.008>
- van der Veegt, G. S., & Bunderson, J. S. (2005). Learning and performance in multidisciplinary teams: The importance of collective team identification. *Academy of Management Journal*, *48*, 532–547. <https://doi.org/10.5465/amj.2005.17407918>
- van Dick, R., van Knippenberg, D., Hagele, S., Guillaume, Y. R. F., & Brodbeck, F. C. (2008). Group diversity and group identification: The moderating role of diversity beliefs. *Human Relations*, *61*, 1463–1492. <https://doi.org/10.1177/0018726708095711>
- van Dijk, H., van Engen, M. L., & van Knippenberg, D. (2012). Defying conventional wisdom: A meta-analytical examination of the differences between demographic and job-related diversity relationships with performance. *Organizational Behavior and Human Decision Processes*, *119*, 38–53. <https://doi.org/10.1016/j.obhdp.2012.06.003>
- van Kleef, G. A. (2009). How emotions regulate social life: The Emotions as Social Information (EASI) Model. *Current Directions in Psychological Science*, *18*, 184–188. <https://doi.org/10.1111/j.1467-8721.2009.01633.x>
- van Kleef, G. A., & Coˆte, S. (2007). Expressing anger in conflict: When it helps and when it hurts. *Journal of Applied Psychology*, *92*, 1557–1569. <https://doi.org/10.1037/0021-9010.92.6.1557>
- van Kleef, G. A., De Dreu, C. K. W., & Manstead, A. S. R. (2004a). The interpersonal effects of anger and happiness in negotiations. *Journal of Personality and Social Psychology*, *86*, 57–76. <https://doi.org/10.1037/0022-3514.86.1.57>
- van Kleef, G. A., De Dreu, C. K. W., & Manstead, A. S. R. (2004b). The interpersonal effects of emotions in negotiations: A motivated information processing approach. *Journal of Personality and Social Psychology*, *87*, 510–528. <https://doi.org/10.1037/0022-3514.87.4.510>
- Van Kleef, G. A., De Dreu, C. K. W., & Manstead, A. S. R. (2010). An interpersonal approach to emotion in social decision making: The emotions as social information model. *Advances in Experimental Social Psychology*, *42*, 45–96. [https://doi.org/10.1016/S0065-2601\(10\)42002-X](https://doi.org/10.1016/S0065-2601(10)42002-X)
- van Kleef, G. A., Homan, A. C., Beersma, B., van Knippenberg, D., van Knippenberg, B., & Damen, F. (2009). Searing sentiment or cold calculation? The effects of leader emotional displays on team performance depend on follower epistemic motivation. *Academy of Management Journal*, *52*, 562–580.

- van Knippenberg, D. (1999). Social identity and persuasion: Reconsidering the role of group membership. In D. Abrams & M. A. Hogg (Eds.), *Social identity and social cognition* (pp. 315–331). Oxford, UK: Blackwell.
- van Knippenberg, D., Dawson, J. F., West, M. A., & Homan, A. C. (2011). Diversity faultlines, shared objectives, and top management team performance. *Human Relations*, *64*, 307–336. <https://doi.org/10.1177/0018726710378384>
- van Knippenberg, D., De Dreu, C. K. W., & Homan, A. C. (2004). Work group diversity and group performance: An integrative model and research agenda. *Journal of Applied Psychology*, *89*, 1008–1022. <https://doi.org/10.1037/0021-9010.89.6.1008>
- van Knippenberg, D., & Schippers, M. C. (2007). Work group diversity. *Annual Review of Psychology*, *58*, 515–541. <https://doi.org/10.1146/annurev.psych.58.110405.085546>
- van Knippenberg, D., & Sitkin, S. B. (2013). A critical assessment of charismatic – Transformational leadership research: Back to the drawing board? *The Academy of Management Annals*, *7*(1), 1–60. <https://doi.org/10.1080/19416520.2013.759433>
- van Knippenberg, D., & van Schie, E. C. M. (2000). Foci and correlates of organizational identification. *Journal of Occupational and Organizational Psychology*, *73*, 137–147.
- Visser, V. A., van Knippenberg, D., van Kleef, G. A., & Wisse, B. (2013). How leader displays of happiness and sadness influence follower performance: Emotional contagion and creative versus analytical performance. *The Leadership Quarterly*, *24*, 172–188. <https://doi.org/10.1016/j.leaqua.2012.09.003>
- Wageman, R. (1995). Interdependence and group effectiveness. *Administrative Science Quarterly*, *40*, 140–80. <https://doi.org/10.2307/2393703>
- Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect – The PANAS Scales. *Journal of Personality and Social Psychology*, *54*, 1063–1070. <https://doi.org/10.1037/0022-3514.54.6.1063>
- Wegge, J., Jungbauer, K. L., & Shemla, M. (2019). When inspiration does not fit the bill: Charismatic leadership reduces performance in a team crisis for followers high in self-direction. *Journal of Management and Organization*, 1–18. <https://doi.org/10.1017/jmo.2019.64>
- Wegge, J., & Meyer, B. (2019). Age-diversity and age-based faultlines in teams: Understanding a Brezel phenomenon requires a Brezel theory. *Work, Aging and Retirement*, *6*, 8–14. <https://doi.org/10.1093/workar/waz017>
- Wegge, J., Roth, C., Neubach, B., Schmidt, K. H., & Kanfer, R. (2008). Age and gender diversity as determinants of performance and health in a public organization: The role of task complexity and group size. *Journal of Applied Psychology*, *93*, 1301–1313. <https://doi.org/10.1037/a0012680>
- Williams, K., & O'Reilly, C., III. (1998). Demography and diversity in organizations: A review of forty years of research. In R. I. Sutton & B. M. Staw (Eds.), *Research in organizational behavior*, Vol. 20 (pp. 77–140). Greenwich, CT: JAI Press.
- Yang, Y., & Konrad, A. M. (2011). Diversity and organizational innovation: The role of employee involvement. *Journal of Organizational Behavior*, *32*, 1062–1083. <https://doi.org/10.1002/job.724>
- Yukl, G. (2012). Effective leadership behavior: What we know and what questions need more attention. *Academy of Management Perspectives*, *26*, 66–85. <https://doi.org/10.5465/amp.2012.0088>
- Zhang, Y., Waldman, D., Han, Y. L., & Li, X. B. (2015). Paradoxical leader behavior in people management: Antecedents and consequences. *Academy of Management Journal*, *58*, 538–566.