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Group & Organization Management 2009 34: 143 originally published online 4 February 2009

DOI: 10.1177/1059601108331217

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>> Version of Record - Mar 11, 2009

OnlineFirst Version of Record - Feb 4, 2009

What is This?

Group & Organization
Management
Volume 34 Number 2
April 2009 143-160
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10.1177/1059601108331217
http://gom.sagepub.com
hosted at
http://online.sagepub.com

## **Abusive Supervision and Employee Emotional Exhaustion**

## **Dispositional Antecedents** and Boundaries

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The authors examined the relationship between subordinates' core self-evaluations and supervisors' abusive supervision. Furthermore, they examined whether subordinates' perceived coworker support and subordinates' susceptibility to emotional contagion moderated the relationship between supervisors' abusive supervision and subordinates' emotional exhaustion. They analyzed data from 290 subordinates who had immediate supervisors using hierarchal multiple regression. Results show that core self-evaluations were negatively related to abusive supervision, whereas abusive supervision was positively related to emotional exhaustion. Both perceived coworker support and susceptibility to emotional contagion moderated the relationship between abusive supervision and emotional exhaustion. It is surprising that the moderating effect of perceived coworker support showed an unexpected pattern such that a stronger relationship between abusive supervision and emotional exhaustion existed when coworker social support was high. The authors conclude with a discussion of these findings.

**Keywords:** abusive supervision; emotional exhaustion; core self-evaluations; susceptibility to emotional contagion; perceived coworker support

**Authors' Note:** This research was supported by the National Science Council of Taiwan (Grant 94-2416-H-031-013). We would like to thank two anonymous reviewers for comments on an earlier version of the article. Correspondence concerning this article should be addressed to Tsung-Yu Wu, Department of Psychology, Soochow University, 70 Linxi Rd., Shilin, Taipei, Taiwan 111, Republic of China; e-mail: wu5815@ms15.hinet.net.

For the past decade, issues pertaining to "negative behaviors" in organizations have gained researchers' interest (Griffin & Lopez, 2005), such as counterproductive work behavior (Fox & Spector, 2005), organizational misbehavior (Vardi & Wiener, 1996), and deviant work-place behaviors (Robinson & Bennett, 1995). The growing research interest in negative behaviors in organizations has led to a shift of the focus of leadership literature from mere effective leadership behaviors to both positive and negative sides of leadership (Wu, 2008). Studies of ineffective leadership have examined punitive or aggressive leadership behaviors, such as petty tyranny (Ashforth, 1994), toxic leaders (Lipman-Blumen, 2005), and abusive supervision (Tepper, 2000, 2007). In the present study, we focus on Tepper's abusive supervision, which refers to the manifestation of dysfunctional leadership behaviors toward subordinates such as ridiculing subordinates, blaming subordinates for things they do not do, and expressing anger without reasons (Tepper, 2000).

Tepper's (2000) pioneering work was the first study that systematically examined abusive supervision. Over the years, he has developed a valid measure of abusive supervision and continued clarifying the definition and consequences of abusive supervision (see Tepper, 2007). Tepper and colleagues' research on abusive supervision has demonstrated that it reduces employees' job and life satisfaction, organizational commitment, and organizational citizenship behaviors. Abusive supervision also increases employee resistance, negative affect, emotional exhaustion, and family—work conflict (Duffy, Ganster, & Pagon, 2002; Tepper, 2000; Tepper, Duffy, Henle, & Lambert, 2006; Tepper, Duffy, Hoobler, & Ensley, 2004; Tepper, Duffy, & Shaw, 2001; Tepper, Henle, Lambert, & Giacalone, 2008; Zellars, Tepper, & Duffy, 2002). Based on previous findings, it is obvious that abusive supervision leads to harmful outcomes to organizations and their members and thus warrants continued academic and practical concerns.

Although deleterious consequences of abusive supervision on subordinates are generally recognized in the literature, there are few studies examining the antecedents of abusive supervision. Although some studies have examined the role of justice perception as a precursor of abusive supervision (Aryee, Chen, Sun, & Debrah, 2007; Tepper et al., 2006), we found no study that investigated how subordinates' dispositional factors may influence the way they perceive abusive supervision. To narrow this gap in the literature of abusive supervision, we explore meaningful dispositional factors that may be important in such perceptions. Specifically, we identify core self-evaluations (Judge, Erez, Bono, & Thoresen, 2003; Judge, Locke, & Durham, 1997) as a set of important personality traits that affects an individual's reaction to abusive supervision. The

core self-evaluations construct represents individuals' fundamental assessments of their own self-values, abilities, and competencies (Judge et al., 1997), and core self-evaluations have shown to be positively associated with job satisfaction and life satisfaction (Judge et al., 2003; Judge, Locke, Durham, & Kluger, 1998). From an interactionist perspective, an individual's self-related concepts can influence not only his or her social information processing (Tafarodi, 1998) but also how other individuals will treat him or her in social interactions (Taylor, Lerner, Sherman, Sage, & McDowell, 2003). However, we found no empirical research that has examined how core self-evaluations affect the way an employee perceives interpersonal interactions, particularly within the power dynamics integral to organizational hierarchies. Therefore, it is worthwhile to explore the core self-evaluations concept as the antecedent of abusive supervision.

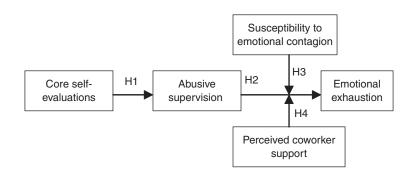
One common negative consequence of abusive supervision is psychological distress in the form of emotional exhaustion (Duffy et al., 2002; Tepper, 2000). Emotional exhaustion is the core element of burnout (Maslach, 1982) and is related to job performance and turnover (Witt, Andrews, & Carlson, 2004; Wright & Cropanzano, 1998). Therefore, it has been the focus of studies on organizational stress (Sullivan & Bhagat, 1992). Tepper (2000, 2007) has suggested that abusive supervision and emotional exhaustion are positively related, and this relationship may depend on other individual difference factors and contextual factors such as personality, job mobility, and work context. In this study, we examine whether an individual difference variable, emotional contagion, and a situational variable, coworker support, moderate the aforementioned relationship between abusive supervision and emotional exhaustion. We predict that the relationship between abusive supervision and emotional exhaustion is stronger for employees (a) whose emotions are easily influenced by other people's emotions (high susceptibility to emotional contagion) and (b) who perceive themselves as having little support from coworkers. Figure 1 presents the conceptual model of the present study.

In short, the present study aims to examine the relationship between core self-evaluations and abusive supervision and to investigate the moderating roles that emotional contagion and coworker support have in the relationship between abusive supervision and employee emotional exhaustion.

## **Abusive Supervision**

As mentioned earlier, Tepper (2000) defined abusive supervision as "subordinates' perceptions of the extent to which supervisors engage in the sustained display of hostile verbal and nonverbal behaviors, excluding

Figure 1 Conceptual Model Demonstrating the Predictor Consequence, and Moderators of Abusive Supervision



physical contact" (p. 178). Tepper's abusive supervision is similar to the concept of emotional abuse originally proposed by Keashly and her colleagues (Keashly, 1998; Keashly, Trott, & MacLean, 1994). Emotional abuse refers to hostile verbal and nonverbal behaviors, excluding physical contact, directed by one or more persons to another (Keashly et al., 1994, p. 342). According to Keashly and Harvey (2005), in the workplace, an individual may face continuously sarcastic ridicule or scornful attitudes from certain coworkers or supervisors. Although these verbal and nonverbal behaviors are not physical attacks or sexual assault, they can chronically torture the individual psychologically when these behaviors become constant in the workplace. Therefore, it is appropriate to describe these negative behaviors with the word abuse because such a term can discriminate itself from other hostile behaviors that involve physical contact. Besides, the word abuse can vividly describe the severity and long-term effects of the above negative behaviors. Another core assumption of emotional abuse proposed by Keashly and her colleagues is that studies and theories concerning emotional abuse are based on the perspective of victims. That is, emotional abuse reflects victims' subjective experiences, and therefore emotional abuse must be measured from the target's experiential perspective (Keashly & Harvey, 2005, p. 206).

In accordance with this conception of emotional abuse, Tepper (2000) pointed out several important features for his conceptualization of abusive

supervision. First, similar to emotional abuse, abusive supervision is a subjective perception of employees. As a result, different employees may have different perceptions of the same behaviors from the same manager, and what one employee considers hostile behavior from a supervisor may be acceptable behavior to another employee. A second feature of abusive supervision is that, consistent with the long-term nature of emotional abuse, the demonstration of abusive supervision is also ongoing, not just occasional. In other words, the hostile behaviors that characterize abusive supervision are common elements in the daily interactions between the supervisor and the subordinate. Finally, the hostile behaviors can be verbal or nonverbal; however, these behaviors do not include physical contact. In Tepper's framework, only the supervisor's taunts and mocking (verbal behaviors) or rude gestures (nonverbal behaviors) are categorized as abusive supervision. This categorization is also similar to emotional abuse (Keashly et al., 1994), which includes only nonphysical hostile behaviors that indicate intent to harm over a period of time and exclude physical harmful behaviors. Although physical abuse intentionally performed by members of organizations may be more acute and harmful than verbal assault (Robinson & Bennett, 1995), nonphysical abuse happens more often than physical violence, and employees who experience more nonphysical abuse have lower job satisfaction (Keashly et al., 1994). Therefore, Tepper argued that it is more meaningful to include only nonphysical abuse in his concept of abusive supervision.

Because researchers have proposed many other constructs similar to abusive supervision, it is necessary to compare the differences between them and also to explicate the distinctiveness of abusive supervision. First, both abusive supervision and petty tyranny (Ashforth, 1994) account for the negative attitudes or the negative behaviors of supervisors toward subordinates, and these negative attitudes and negative behaviors often lead to discomfort for the subordinate. However, Ashforth (1994) emphasized that the motivation underlying such negative attitudes and negative behaviors was supervisors' intentions to display power or to take control over subordinates, not necessarily to be hostile. On the contrary, Tepper (2000) indicated that a subordinate's perception of a supervisor's hostile intentions is a necessary condition for abusive supervision. In short, the presence of the supervisor's hostile behaviors is a critical element for an employee to experience abusive supervision.

Another concept similar to abusive supervision that has received much attention from practitioners is that of the toxic leader (Lipman-Blumen,

2005), which refers to leaders who undertake many destructive behaviors (e.g., leaving their followers worse off than they found them, violating human rights or their supporters) and who display certain dysfunctional personal qualities (e.g., lack of integrity, enormous egos, insatiable ambition and power), and these negative behaviors tend to have severe and enduring harm on their followers (Lipman-Blumen, 2005, pp. 18-19). Although both constructs of abusive supervision and toxic leaders portray leaders' negative behaviors and their potential harm to subordinates, abusive supervision focuses merely on subordinates' subjective perceptions of supervisors' hostility. By contrast, the toxic leader construct focuses on leaders' behaviors, which are not always hostile toward subordinates. For example, a toxic leader may mislead followers by deliberately uttering untruth or may even treat his or her followers well but push them to hate or destroy others. Furthermore, the literature on toxic leaders not only describes the destructive behaviors of toxic leaders but also indicates potential personal characteristics of these behaviors, whereas abusive supervision has been focused only on a subordinate's subjective perceptions of the leaders' behaviors and does not attempt to identify potential personal characteristics behind these behaviors.

#### **Subordinate's Core Self-Evaluations**

According to Judge et al. (1997), the core self-evaluations concept is a broad trait integrating four important traits in the personality literature: (a) self-esteem: the most fundamental self-evaluation, reflecting one's appraisal of one's overall values; (b) generalized self-efficacy: the evaluation of one's capacities to perform well across a variety of situations; (c) neuroticism: the tendency to have a negative explanatory style and to focus on negative parts of oneself; and (d) locus of control: the belief about the relationship between one's behaviors and their outcomes. People with an internal locus of control believe that their own behaviors and efforts determine outcomes, whereas people with an external locus of control tend to attribute outcomes to factors beyond their control. Overall, core self-evaluations refer to the "basic, fundamental appraisal of one's worthiness, effectiveness, and capacity as a person" (Judge et al., 2003, p. 304).

Core self-evaluations may be negatively related to an employee's perception of abusive supervision. According to the self-consistency theory, individuals process social information in a self-consistent direction to protect themselves from disruptive changes in the organization of the self-concept. That is, social information that is congruent with one's self-concept may

receive more attention and may be remembered better than incongruent information (Bellezza, 1992; Best, Stapleton, & Downey, 2005). Similarly, Swann, Stein-Seroussi, and Giesler (1992) suggested that individuals tend to verify their self-concepts by approaching situations that can provide feedback to fit their self-concept. Core self-evaluations can influence the perception of work in the workplace (Judge et al., 1997). Employees with high core self-evaluations may tend to search for and classify workrelated information in such a way that leads them to draw positive conclusions about their work. On the contrary, individuals with low core selfevaluations tend to concentrate on negative aspects of their work. In fact, Judge, Bono, and Locke (2000) found that core self-evaluations were positively related to perceived job characteristics. Given that supervision can also be considered a perceived job facet (e.g., Spector, 1997) and that personal disposition may influence interpersonal information processes (DeHart, Pelham, & Murray, 2004), it is reasonable to assume that core self-evaluations will be positively associated with perceived leadership behaviors. Under the rationale of self-consistent theory and related evidence, a subordinate with low core self-evaluations may tend to focus on negative aspects of self to fit the negative self-concept. This focus, in turn, leads the subordinate to selectively pay attention to and remember a greater number of the negative aspects and the negative behaviors delivered by the supervisor and to report a greater number of abusive supervisor behaviors.

*Hypothesis 1 (H1):* Subordinates' core self-evaluations will be negatively related to abusive supervision.

#### **Emotional Exhaustion**

Emotional exhaustion occurs when the emotional demands exceed what an individual is able to afford during interpersonal interactions at work (Maslach, Schaufeli, & Leiter, 2001). When an individual chronically works under stress that is induced by interpersonal interactions, emotional exhaustion can further result in emotional overextension. Because leadership requires interpersonal interactions between the supervisor and the subordinate, abusive supervision may also induce emotional exhaustion in subordinates. According to the conservation of resources theory (Hobfoll, 1989), people have a basic tendency to obtain, retain, and protect their resources. Individuals experience psychological stress when confronted with the threat of resource loss, actual loss, or the failure of resource gain after the investment of resources. In the context of abusive supervision

where subordinates feel mistreated by supervisors, subordinates must expend a great deal of psychological effort to handle the interpersonal stressor. By doing so, the psychological resources of subordinates may be gradually consumed and become exhausted, which leads to the condition of emotional exhaustion.

As one would expect, evidence suggests that abusive supervision results in psychological discomfort. For example, subordinates' perceptions of mistreatment may induce unfavorable psychological consequences such as hostility, anxiety, or depression (Richman, Flaherty, Rospenda, & Christensen, 1992). Ashforth (1994) found that negative comments from a supervisor are related to the subordinate's frustration and resistance. Tepper (2000) indicated that as subordinates' perceptions of abusive supervision increase, so too do subordinate psychological discomforts such as depression, anxiety, and emotional exhaustion. Therefore, we hypothesize the following:

Hypothesis 2 (H2): Abusive supervision will be positively related to subordinates' emotional exhaustion.

## **Moderating Effect of Subordinates'** Susceptibility to Emotional Contagion

Emotional contagion refers to the degree to which an individual's emotions are influenced by others. According to the process of emotional contagion, when the individual sees another person displaying a certain emotion, the individual immediately mimics the facial expressions, voice, posture, and movement of the emotion displayer. This process of emotional contagion can prompt the individual to experience an emotion similar to that of the emotion displayer. However, individuals undergoing the process of emotional contagion are often not even aware of this process (Hatfield, Cacioppo, & Rapson, 1994).

Emotional contagion has also been conceptualized as an individual difference variable and been termed as "susceptibility to emotional contagion" (Doherty, 1997). Individuals with high susceptibility to emotional contagion are "infection-prone individuals" in the emotion-transmitting process, and their emotions are easily influenced by other people's emotions (Hatfield et al., 1994; Verbeke, 1997). That is, the higher the susceptibility to emotional contagion, the more likely it is that the individual will be "infected" by other people's emotions.

In the context of abusive supervision where the supervisor's hostile behaviors are often accompanied by displays of negative emotions, subordinates with high susceptibility to emotional contagion will be more likely to imitate the negative facial expressions of the supervisor and ultimately to experience a negative emotion that is influenced by the hostile supervisors. It follows then that highly susceptible subordinates will be taking on additional emotional loads whenever they interact with hostile supervisors. This outcome increases the likelihood of emotional exhaustion for these subordinates. In fact, empirical evidence showed that individuals high in susceptibility to emotional contagion are more vulnerable to stress associated with jobs that have high emotional demands (Le Blanc, Bakker, Peeters, van Heesch, & Schaufeli, 2001). However, subordinates with low susceptibility to emotional contagion will not necessarily evoke negative emotions by the hostile supervisor through the emotional contagion process. As such, these subordinates will be less likely to experience emotional exhaustion. On the basis of the above inferences, we propose the following hypothesis:

Hypothesis 3 (H3): Subordinates' susceptibility to emotional contagion will moderate the relationship between abusive supervision and emotional exhaustion such that the relationship will be stronger for subordinates who have high susceptibility to emotional contagion.

## Moderating Effect of Subordinates' Perceived Coworker Support

Social support is a commonly studied variable in the literature of work stress. Social support refers to consideration, respect, or assistance from others, which creates the sense of being cared for, respected, valued, and part of the social group (Sarafino, 1997). Social support can be emotional (e.g., sympathy), affirmative (e.g., having one's thoughts and opinions recognized and supported), or tangible (e.g., provision of money, information, and advice) (Antonucci & Jackson, 1990). On the basis of studies on work stress, social support can mitigate the negative effects of stressors. This process is referred to as the "buffering hypothesis" of social support (Sarafino, 1997), which is supported by some research findings in organization settings (van Emmerik, Euwema, & Bakker, 2007).

In the workplace, both coworkers and supervisors are often the major providers of social support, who have a strong influence on employees' well-being (Ng & Sorensen, 2008). However, in the context of abusive supervision, employees may perceive only coworkers as sources of social support and consider that social support from coworkers may alleviate the negative results brought by abusive supervision (Duffy et al., 2002). In fact,

the cross-domain buffering hypothesis (Duffy et al., 2002) suggests that social support from one domain (e.g., coworker support) may buffer the negative consequences of the social undermining from another domain (e.g., abusive supervision). The study by Duffy et al. (2002) also found that employees with high coworker social support had reported fewer physical symptoms induced by the supervisor's social undermining behaviors than those employees low in coworker social support had. Moreover, on the basis of the conservation of resources theory, resource gain can compensate for resource loss. Given that social support from coworkers can be perceived as a type of resource gain, it may compensate for the resources lost through abusive supervision and may alleviate the resulting psychological discomfort (Hobfoll, 1989). According to the above inference and the research findings, we propose the following hypothesis:

Hypothesis 4 (H4): Subordinates' perceived coworker support will moderate the relationship between abusive supervision and emotional exhaustion such that the relationship will be stronger for subordinates who perceive less coworker support.

#### Method

## Sample and Procedure

We collected data from employees who had immediate supervisors using the following two methods. One source of data was through several undergraduate-level refresher courses for individuals who worked fulltime. We distributed and collected the completed questionnaires during the class. The other method was through personal contact. Our contacts, usually human resource mangers or specialists, distributed our questionnaires in their companies. To ensure confidentiality, each questionnaire had a return envelope with postage paid. After the respondents completed the questionnaires, they mailed the sealed questionnaires directly to the authors. To ensure the data collected from different methods could be combined, we conducted independent t tests to examine the major study variables and found no differences between the two groups, abusive supervision: t(288) = 1.56, p > .05; emotional exhaustion: t(286) = 0.52, p > .05; core self-evaluations: t(286) = -0.51, p > .05; susceptibility to emotional contagion: t(287) = -1.26, p > .05; coworker support: t(286) =-1.65, p > .05. Consequently, we combined the data collected from two different methods for hypothesis testing.

We distributed 454 questionnaires and received 295 questionnaires, for a return rate of 65%. After excluding 5 incomplete questionnaires, our sample for analysis was 290. The average age of the respondents was 35.16 years (SD = 8.47), the average tenure in the current organization was 84.87 months (SD = 78.76), and the average length of the participant's workbased relationship with the reported supervisor was 40.64 months (SD = 41.11). The gender composition of the respondents was 40.3% male, and 62.1% of the respondents had a supervisor of the same sex. Most respondents held a university (38.5%) or a college (36.6%) degree. Approximately 36.9% of the respondents held a position in administration, 18.6% were in a sales department, and 12.1% worked in customer services. Most respondents were in nonmanagement positions (62.8%), and about 14.1% of the respondents were first-line managers.

#### Measures

Core self-evaluations. We used the 12-item scale developed by Judge et al. (2003) to measure core self-evaluations on a 6-point Likert-type scale ranging from 1 (strongly disagree) to 6 (strongly agree). A sample item is, "I am confident I get the success I deserve in life." Because our respondents are Chinese, we translated all items into Chinese. To ensure the semantic equivalence, we took the back-translation approach suggested by Brislin (1980). One author first translated items into Chinese, and then the other author who is bilingual back translated the Chinese items into English. The internal consistency coefficient was .80 in the current study.

Abusive supervision. We used Tepper's (2000) 15-item scale to measure abusive supervision on a 6-point Likert-type scale ranging from 1 (I cannot remember him or her ever using this behavior with me) to 6 (He or she uses this behavior very often with me). An example item is, "My supervisor is rude to me." We back translated all items to ensure the semantic equivalence of the scale. The internal consistency coefficient was .95.

Emotional exhaustion. To measure emotional exhaustion, we used the same six-item measure that Tepper (2000) adopted from the Maslach Burnout Inventory (Maslach & Jackson, 1981). A sample item is, "I wondered if anything is worthwhile." All items were back translated to ensure the semantic equivalence of the scale. The respondents rated the frequency of each item using a 4-point scale ranging from 1 (never) to 4 (often). The internal consistency coefficient was .81 for this scale.

Susceptibility to emotional contagion. We measured susceptibility to emotional contagion with four items on a 6-point Likert-type scale ranging from 1 (strongly disagree) to 6 (strongly agree). We modified three of the four items from Doherty's (1997) Emotional Contagion Scale, and we developed the remaining item ourselves. We back translated the three modified items to ensure semantic equivalence. The four items are, "I clench my jaws and my shoulders get tight when I see the angry faces of the supervisor," "It irritates me to be around angry people," "I am tense when overhearing an angry quarrel," and "I feel uncomfortable when overhearing a quarrel from my supervisors' office." The internal consistency coefficient was .77 in this study.

Perceived coworker support. We used three items from Staw, Sutton, and Pelled's (1994) Coworker Support Scale, including "My coworkers give me the help I need to do my job," "I and my coworkers share news about important things that happen at the organization," and "I and my coworkers stick together." All items were measured on a 6-point Likert-type scale ranging from 1 (strongly disagree) to 6 (strongly agree). All items were back translated to ensure the semantic equivalence of the scale. The internal consistency coefficient was .81 for this scale.

Control variables. On the basis of previous studies on employees' reactions to interpersonal interaction (e.g., Burke & Richardsen, 2001; Cordes & Dougherty, 1993; Tsai, 2001), we examined our hypotheses while controlling for the following demographic variables: respondent tenure, respondent sex, respondent educational background, respondent organization rank, supervisor sex, the length of the working relationship between the respondent and the supervisor, and the sex combination between the respondent and the supervisor. We also controlled for the participant's positive affectivity (PA) and negativity affectivity (NA) because PA and NA are potentially confounding variables that may be related to employees' perceptions of stressors and psychological well-being in the workplace (Brotheridge & Grandey, 2002; Thoresen, Kaplan, Barsky, Warren, & deChermont, 2003). Similar to Zellars et al. (2002), we measured PA and NA with only eight items from the Positive and Negative Affect Schedule (PANAS; Watson, Clark, & Tellegen, 1988). Four items measured PA (enthusiastic, determined, excited, and interested), and the other four items measured NA (distressed, upset, afraid, and scared). We conducted a pilot study with 38 MBA students to ensure that the 8-item scale is representative of the original 20-item scale (10 items for PA and 10 items for NA). The correlation between the 4-item PA measure and the 10-item PA measure was .91 (p < .01), and the correlation between the 4-item PA measure and the 10-item PA measure was .84 (p < .01). On the basis of the correlation coefficients, we conclude that the short-version PANAS measure is representative of the long-version PANAS measure. To have respondents indicate how they generally felt, we asked them to use a 4-point scale, ranging from 1 (never) to 4 (strongly). All items were back translated to ensure the semantic equivalence of the scale. The internal consistency coefficients were .83 and .85 for PA and NA, respectively.

### **Analysis**

To ensure the construct validity of the studied variables, we first undertook a series of confirmatory factor analyses (CFAs) to evaluate the convergent and discriminant validities (Anderson & Gerbing, 1988) of the five major study variables consisting of core self-evaluations, abusive supervision, emotional exhaustion, susceptibility to emotional contagion, and perceived coworker support. We then used hierarchical regression to analyze all hypotheses. For H1 and H2, we entered the control variables before entering the independent variables. We followed the steps suggested by Baron and Kenny (1986) to test the moderating effects proposed by H3 and H4. To prevent the problem of collinearity, we centered the independent variables and the moderators while testing H3 and H4 (Aiken & West, 1991).

### Results

We examined the construct validity of the studied variables by demonstrating their convergent and discriminant validities, and the results of rival models supported the fact that the five studied constructs are distinct. Following Anderson and Gerbing's (1988) recommendations concerning convergent and discriminant validities, we formed a five-factor CFA model and found that all items had significant factor loadings on the factor identified a priori at a significance level of .05. Inspections of the fit indices indicated that although the chi-square was significant,  $\chi^2(730) = 1930.40$ , p < .05, other practical fit indices also fell within acceptable ranges (root mean square error of approximation = .09, standardized root mean square residual = .08, nonnormed fit index = .92, comparative fit index = .92, parsimony goodness of fit index = .64), suggesting the model was acceptable (Hu & Bentler, 1999).

We examined the discriminant validity with 10 chi-square difference tests that fixed the correlation between each pair of latent constructs. The chi-square differences with 1 degree of freedom ranged from 222.73 to 588.41. All 10 tests were significant and provided evidence for discriminant validity. In addition, we performed 16 chi-square difference tests to compare the five-factor model with all the other possible nested models (10 three-factor models, 5 two-factor models, and 1 one-factor model). The 16 chi-square differences tests were all significant, three-factor models:  $\chi^2(3)$  ranged from 464.30 to 1518.77, all p values < .05; two-factor models:  $\chi^2(6)$  ranged from 754.93 to 1709.15, all p values < .05; one-factor model:  $\chi^2(10) = 1759.97$ , p < .05). Results of these chi-square tests further support the discriminant validity of the five-factor model.

Table 1 shows the descriptive statistics and the correlation matrix for the study variables. Core self-evaluations were negatively related to abusive supervision (r = -.13, p < .05), whereas abusive supervision and emotional exhaustion were positively related to each other (r = .26, p < .01). Furthermore, core self-evaluations were positively related to perceived coworker support (r = .23, p < .01) but negatively related to susceptibility to emotional contagion (r = -.30, p < .01) and negatively related to susceptibility to emotional exhaustion (r = -.46, p < .01). The findings suggest that the higher the core self-evaluations, the higher the perceived coworker support, the lower the susceptibility to emotional contagion, and the lower the emotional exhaustion. Susceptibility to emotional contagion was positively related to emotional exhaustion (r = .32, p < .01), such that emotional exhaustion increases as the level of susceptibility to emotional contagion increases.

Table 2 presents the results of several regression analyses. H1 was supported, as core self-evaluations were negatively related to abusive supervision after we controlled for demographic variables, PA, and NA ( $\beta = -.17$ , p < .05). H2 also received support as abusive supervision was positively related to emotional exhaustion after we controlled for the effects of demographic variables, PA, and NA ( $\beta = .24$ , p < .01).

We examined the proposed moderating effect (H3 and H4) by entering variables in the regression equation in the following order: control variables, predictor variables, moderators, and interaction terms. The interaction between abusive supervision and perceived coworker support significantly predicted emotional exhaustion ( $\beta$  = .19, p < .01). Figure 2 presents the moderating effect of perceived coworker support on the relationship between abusive supervision and emotional exhaustion. It is surprising that

Table 1
Means, Standard Deviations, and Correlations

Variable	M	QS	1	2	3	4	5	9	7	8	6	10	11 12		13	14
1. Sex of subordinate <sup>a</sup>																
2. Sex of supervisor <sup>a</sup>			.38**													
3 Sex combination <sup>b</sup>			.43**	30**												
4. Tenure	84.88	78.76	12*	20**	.02											
5. Time length of	40.64	41.11	07	.02	01	.39**										
working together																
6. Education of	3.30	0.85	14*	.02	- 60	0927**29**	29**									
subordinate°																
7. Position of	2.47	1.048	13*	03	05	80.	9.	.13*								
subordinate <sup>d</sup>																
8. Positive affectivity	11.32	2.31	07	90	.02	01	14*	80.	.18** (.83)	(.83)						
9. Negative affectivity	8.48	2.62	02	03	.03	90.	02	05	01	.17** (.85)	(.85)					
10. Core self-evaluations	46.92	88.9	13*	12*	90:	.05	05	.12	.18**		.40**28** (.80)	(08.)				
11. Abusive supervision	27.59	12.92	17**	90	03	60	80:	03	.05	08	.10	13*	(.95)			
12. Perceived	13.62	2.30	02	15**	.03	.03	20**	.11	00:	.25**	00.	.23**	17** (.81)	(.81)		
coworker support																
13. Susceptibility to	14.46	3.44	.05	00.	.10	01	12*	11.	90	02	.30**	.30**30**	90:	.10 (77)	(77)	
emotional contagion																
14. Emotional exhaustion 14.16	14.16	3.08	00	.0203	03	60	12*	.15**0517**	05	.17**	.42**	.42**46** .26**06	.26**	90:-	.32** (.81)	(.81)
Note: N = 200 Values on the diagonal are Cranbach's or Dhi carrelation was commuted for three naminal variables related to say	he diago	nal are (	docdaor	, o D	i	lotion	moo sea	nted fo	r three	lenimon	Aldeiney.	o related	40 04			

Note: N = 290. Values on the diagonal are Cronbach's  $\alpha$ . Phi correlation was computed for three nominal variables related to sex.

a. Gender was coded as 1 = men and 2 = women.

b. Gender combination was coded as 1 = same gender and 2 = opposite gender.

c. Education was coded as 1 = junior high school and below, 2 = senior or professional high school, 3 = bachelor's degree, 4 = graduate degree. d. Position was coded as 1 = staff, 2 = low-level manager, 3 = midlevel manager, 4 = high-level manager.

<sup>\*</sup>p < .05. \*\*p < .01.

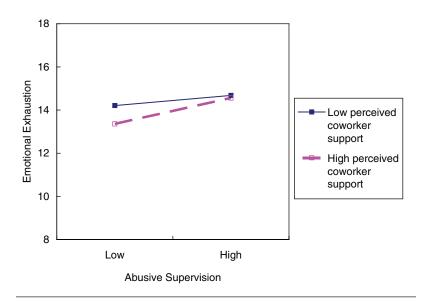
Table 2 **Results of Regression Analyses** 

	Abusive	Emotional	Emotional
Variable	Supervision	Exhaustion	Exhaustion
Control variables			
Sex of subordinate	25**	.00	.01
Sex of supervisor	02	.01	.02
Sex of pair	.09	.01	.00
Tenure	20**	02	02
Length of time working together	.08	09	09
Education of subordinate	08	.14*	.14*
Position of subordinate	.11	01	02
Positive affectivity	15*	27**	27**
Negative affectivity	.12	.48**	.49**
$\Delta R^2$	.11**	.28**	.29**
Predictors			
Core self-evaluation	17*		
Abusive supervision (AS)		.24**	.24**
$\Delta R^2$	.02*	.05**	.05**
Moderators			
Perceived coworker support (PCS)			.00
Susceptibility to emotional contagion (EC)			.18**
$\Delta R^2$			.03**
Interactions			
$AS \times PCS$			.19**
$AS \times EC$			12*
$\Delta R^2$			.04**
Overall R <sup>2</sup>	.13	.33	.41
Adjusted R <sup>2</sup>	.09	.31	.27
F value	3.44**	11.71**	11.20**
df	10, 233	10, 233	14, 227

<sup>\*</sup>p < .05. \*\*p < .01.

the pattern of the moderating effect was the opposite of the hypothesized direction. As shown in Figure 2, the negative relationship between abusive supervision and emotional exhaustion was stronger at the higher levels of perceived coworker support than at the lower levels of perceived coworker support. Because the direction of interaction effect is not consistent with our prediction, our data failed to support H3.

Figure 2 Moderating Effect of Perceived Coworker Support on the Relationship Between Abusive Supervision and Emotional Exhaustion

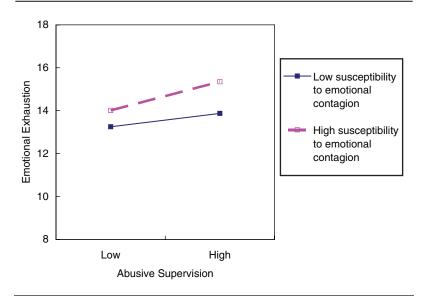


The interaction between abusive supervision and susceptibility to emotional contagion significantly predicted emotional exhaustion ( $\beta = -.12$ , p < .05). Figure 3 presents the moderating effect that susceptibility to emotional contagion has on the relationship between abusive supervision and emotional exhaustion. Consistent with our prediction, the negative relationship between abusive supervision and emotional exhaustion was stronger at the high level of susceptibility to emotional contagion than at the low level of susceptibility to emotional contagion. H4 was supported.

#### Discussion

In undertaking this study, we set out to identify both individual difference antecedents of abusive supervision and boundary conditions of the relationship between abusive supervision and employee emotional exhaustion. Our findings suggest that (a) core self-evaluations are negatively associated with abusive

Figure 3
Moderating Effect of Susceptibility to Emotional
Contagion on the Relationship Between Abusive
Supervision and Emotional Exhaustion



supervision, (b) emotional exhaustion increases as abusive supervision increases, and (c) the relationship between abusive supervision and subordinate emotional exhaustion is contingent on both perceived coworker support and subordinate susceptibility to emotional contagion.

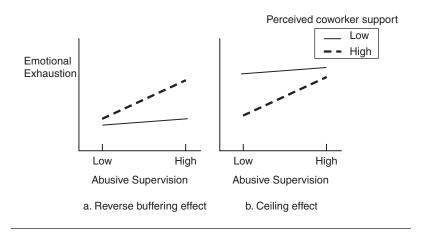
Previous studies on core self-evaluations have focused generally on the relationship between core self-evaluations and employee work behaviors and attitudes such as job performance (Erez & Judge, 2001; Judge & Bono, 2001; Judge et al., 2003), job satisfaction (Judge, Bono, Erez, & Locke, 2005; Judge et al., 2003), and stress (Best et al., 2005). These studies have provided evidence for a criterion validation of the core self-evaluations traits. At the same time, however, these studies were limited in that they did not account for how core self-evaluations relate to interpersonal interactions, especially the interactions between the supervisor and the subordinate. Along the same line, past research in abusive supervision emphasized the consequences of abusive supervision (e.g., Tepper, 2000; Zellars et al., 2002) and overlooked how individual difference antecedents may relate to

abusive supervision, particularly the role that the subordinate plays in the occurrence of abusive supervision. Using an interactionist perspective, researchers can associate employees' core self-evaluations with social interactions and social perceptions in the workplace. Through its use of the above constructs, our study filled in the literature's gaps concerning abusive supervision and core self-evaluations.

One unexpected finding of the current study is the moderating effect that perceived coworker support has on the relationship between abusive supervision and employee emotional exhaustion. We found that, in contrast to our prediction, the positive relationship between abusive supervision and emotional exhaustion was stronger at the higher levels of perceived coworker support than at the lower levels of perceived coworker support. We offer two different perspectives to interpret this finding.

The first interpretation is the reverse buffering effect, which indicates that when perceived coworker support is high, the positive relationship between abusive supervision and emotional exhaustion becomes stronger. That is, high perceived coworker support exacerbates the level of emotional exhaustion induced by abusive supervision. The reverse buffering effect is not uncommon in studies of organizational stress (Glaser, Tatum, Nebeker, Sorenson, & Aiello, 1999; Sullivan & Bhagat, 1992). One reason that may lead to this reverse buffering effect is that the support from coworkers may remind individuals of negative aspects of the work environment, and this reminder may aggravate the discomfort (LaRocco, House, & French, 1980). For example, when an employee experiences abusive supervision, coworkers' support or consolation may remind the employee of the unpleasant experience and allow (or even encourage) his or her exploring, reliving, or wallowing in the negativity. Furthermore, without constructive action plans, complaining to coworkers may only escalate the negative feelings toward abusive supervision rather than resolve the issue. However, if the reverse buffering effect is supported, not only should a weaker relationship between abusive supervision and emotional exhaustion be found in the low perceived coworker support condition, but also emotional exhaustion in the low perceived coworker support condition should be lower than emotional exhaustion in the high perceived coworker support condition regardless of the level of abusive supervision (Glaser et al., 1999), as shown in Figure 4a. This is because, for an individual who experiences a high level of abusive supervision, when there is not much coworker support such as talking about the negative experience to remind the individual of the unpleasant experience, the individual will be less likely to be led to a severe level of emotional exhaustion.

Figure 4
The Hypothetical Figures Demonstrating
the Concepts of Reverse Buffering Effect and Ceiling Effect



The second interpretation is the ceiling effect (Stahl & Caligiuri, 2005), which suggests that the stress level of individuals who lack coworker support is stronger and more frequent than for individuals who receive coworker support (Fimian, 1986). It is possible that individuals who have low perceived coworker support may already experience emotional exhaustion at a certain level. Consequently, any further upward increment in abusive supervision might not result in a significant increase in the level of emotional exhaustion for individuals who have low coworker support. For individuals with perceived coworker support, the positive relationship between stressor (abusive supervision) and stress level (emotional exhaustion) is just a typical positive stressor-strain relationship predicted by a general stress model. In other words, if the ceiling effect is occurring, there should be a stronger positive relationship between abusive supervision and emotional exhaustion in the high perceived coworker support condition. However, in the low perceived coworker support condition, the relationship between abusive supervision and emotional exhaustion should be weaker. Furthermore, regardless of the level of abusive supervision, the level of emotional exhaustion should be stronger in the low perceived coworker support condition than in the high perceived coworker support condition. This is because individuals in the low perceived coworker support condition have reached a certain degree (ceiling) of their emotional exhaustion, as shown in Figure 4b.

Because the moderating effect that perceived coworker support has on the relationship between abusive supervision and emotional exhaustion shown in Figure 2 is similar to Figure 4b, we believe that the ceiling effect, rather than the reverse buffering effect, may be a more appropriate interpretation of our finding.

#### **Limitations and Directions for Future Research**

Several limitations and directions for future studies should be addressed. First, the current study is not free from problems associated with common method variance, as we collected data from a single source at a single point in time. However, after we excluded the effects of positive affect and negative affect, which serve as surrogates for method variance (Podsakoff, MacKenzie, Lee, & Podsakoff, 2003), the predictors and interactions still had significant relationships with outcome variables. In addition, our CFA results provided support for the discriminant validity of the studied variables. Moreover, some of our findings were interaction effects, and interaction effects cannot be explained according to the viewpoint that statistical artifacts result from common method variance (Schaubroeck & Jones, 2000). Taken together, we believe that the above reasons decrease the likelihood that common method variance was a major factor in our findings. Nevertheless, a longitudinal research design or the use of dyadic data would be preferable approaches to the study of abusive supervision.

Second, we examined only the role that core self-evaluations play in abusive supervision. Future studies should examine the role of other antecedents, both individual differences and contextual factors, in abusive supervision. Potential antecedents include the Big Five personality traits of the supervisor–subordinate dyad, work conditions such as autonomy, job routinization, and formalization, and the interaction quality between the supervisor and the subordinate.

Third, because abusive supervision concerns only subordinates' subjective perceptions of supervisors' mistreatment, our study might not reflect the actual frequency of the supervisors' mistreatment of employees. This possible weakness might limit our findings' managerial implications. However, by aggregating perceptions of members of a workgroup, we can obtain a shared consensus regarding the extent to which a supervisor practices abusive supervision. Although the shared perceptions of abusive supervision might not necessarily equal the actual frequency of the supervisors' mistreatment of employees, such a shared perception has a greater

managerial implication. When members of a workgroup generally perceive that their supervisor frequently demonstrates behaviors of abusive supervision, organizations can initiate certain supervisor-focused programs to prevent recurrence of abusive supervision.

Another approach to the above issues is to follow Ostroff, Kinicki, and Clark's (2002) method by randomly splitting a work unit into two groups. Researchers can use the responses from one group of subordinates to measure abusive supervision and can use the responses from the other group of subordinates to measure outcome variables such as burnout. This approach would enable researchers to identify any consensus that the subordinates exhibit regarding a single supervisor's mistreatment of them. Furthermore, this approach could help illuminate the cross-level interaction between a subordinate's perception of supervisor abuse and the subordinate's burnout. Future research should also examine the psychological process through which abusive supervision affects emotional exhaustion. Tepper (2000) identified organizational justice as an important mediating mechanism between abusive supervision and emotional exhaustion. However, other potential mediating mechanisms such as attributions or perceived organizational climate deserve more research attention. Furthermore, the mediating mechanisms through which personality traits such as core self-evaluations affect abusive supervision merit investigation.

One last future research direction is the examination of whether effective and ineffective leadership behaviors present either two different constructs or the two extremes along the spectrum of one concept. Past studies have shown that both effective and ineffective leadership behaviors are predictive of employees' psychological well-being and job performance. However, no research has examined whether effective and ineffective leadership behaviors can be distinguished from each other. Furthermore, whether these leadership behaviors share the same antecedents, mediators, consequences, and boundaries remains unknown. The aforementioned research issues can be addressed in future studies on abusive supervision.

From a practical perspective, one valuable finding in our study is that an employee's evaluation of his or her value as a person can shape his or her perception of abusive supervision and even facilitate employee burnout. To improve such a situation, organizations can develop training sessions that might increase employees' core self-evaluations. Because previous research has suggested that self-efficacy can be enhanced through training (Saks, 1995), training in self-efficacy might increase employees' core self-evaluations and might further lessen employees' perceptions of abuse and induce employees' job performance and job satisfaction. Furthermore, our study found that

employees' susceptibility to emotional contagion exaggerates the predictive effect of perceived negative interpersonal events, such as abusive supervision, on emotional exhaustion. Organizations may provide training programs that teach emotional regulation tactics to help employees from exaggerating their negative emotions that were induced by workplace affective events. For example, attentional deployment (e.g., try to focus attention on the job task or happy things) or cognitive change (e.g., try to reevaluate the meaning of abusive supervision to self from a different point of view) might prevent employees from suffering these negative events by redirecting their focus to positive aspects of their working environment (Grandey, 2000; Grandey & Brauburger, 2002).

In conclusion, the study explored the relationship between subordinates' core self-evaluations and supervisors' abusive supervision. Furthermore, we investigated the moderating roles that subordinates' perceived coworker support and subordinates' susceptibility to emotional contagion played on the abusive supervision—emotional exhaustion relationship. The research findings contribute to the abusive supervision literature by demonstrating that employees' self-evaluations affect their perception of abusive supervision. Also, emotional contagion is more than an emotional influence process; it can serve as a tendency to influence the relationship between abusive supervision and its consequences. Finally, the moderating effect of social support on the relationship between abusive supervision and emotional exhaustion might take form in a way that is different from the predictions specified by the buffering hypothesis.

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