Must "Service With a Smile" Be Stressful? The Moderating Role of Personal Control for American and French Employees

Alicia A. Grandey and Glenda M. Fisk Pennsylvania State University

Dirk D. Steiner Université de Nice–Sophia Antipolis

Suppressing and faking emotional expressions depletes personal resources and predicts job strain for customer-contact employees. The authors argue that personal control over behavior, in the job and within the national culture, provides compensatory resources that reduce this strain. With a survey study of 196 employees from the United States and France, the authors supported that high job autonomy buffered the relationship of emotion regulation with emotional exhaustion and, to a lesser extent, job dissatisfaction. The relationship of emotion regulation with job dissatisfaction also depended on the emotional culture; the relationship was weaker for French customer-contact employees who were proposed to have more personal control over expressions than U.S. employees. Theoretical and research implications for the emotion regulation literature and practical suggestions for minimizing job strain are proposed.

Keywords: emotional labor, emotion regulation, burnout, emotional exhaustion, autonomy, control

Emotion regulation, or the self-regulation of feelings and expressions, is critical to work motivation, goal-directed behavior, and impression management. In particular, regulation of expressions, also known as surface acting (Grandey, 2000; Hochschild, 1983) and as response-focused emotion regulation (Gross, 1998a, 1998b), is critical in organizational settings. Certain employees often interact with the public-job recruits, clients, customers, or patients-and must manage the impressions of the company as a whole by appearing friendly and hiding negative emotions (Ashforth & Humphrey, 1993; Grove & Fisk, 1989). Unfortunately, the extent to which employees engage in this regulation is associated with stress-related physiological arousal (Butler et al., 2003; Gross & Levenson, 1993, 1997) and job strain in the form of poor work attitudes and job burnout (Brotheridge & Grandey, 2002; Brotheridge & Lee, 2002; Grandey, 2003; Grandey, Tam, & Brauburger, 2002; Pugliesi, 1999; Schaubroeck & Jones, 2000).

However, previous research on emotion regulation and strain has typically relied on (a) survey studies of employees who are student workers, in low status service occupations, and/or in North American organizations or (b) laboratory research in which participants are instructed to regulate expressions. We believe that these approaches may amplify the detrimental effects of emotion regulation because the emotion regulation is done by persons who

Correspondence concerning this article should be addressed to Alicia A. Grandey, 520 Moore Building, Department of Psychology, Pennsylvania State University, University Park, PA 16802. E-mail: aag6@psu.edu

previous theories on the role of control in motivation and stress, we propose that personal control buffers employees against the strain of emotion regulation. In this study, we examine the extent of personal control in two ways: (a) perceived job autonomy (Hackman & Oldham, 1976) and (b) the emotional culture (Gordon, 1989). We examine each of these individually and in combination as moderators of the relationship between emotion regulation and strain. By attending to the boundaries of the relationship between emotion regulation and strain, we inform emotion regulation theory as well as suggest practical implications for the increasingly global economy. Emotion Regulation and Control

also have a low level of personal control over their expressions. Consistent with Hochschild's (1983) ideas of *emotional labor* and

The term *control* can refer to both regulation of one's own behavior (self-control, personal control) and external demands on behavior (controlled behavior, control over others). This dual usage can create confusion, particularly when discussing emotion regulation. In fact, the term *emotion control* has been used to refer to both self-regulatory processes (Kanfer, Ackerman, & Heggestad, 1996; Kanfer & Heggestad, 1997) and managerial attempts to shape expressive behavior of employees (Fineman, 2001). We use the terms *emotion regulation* to refer to the process of modifying one's own emotions and expressions and *personal control* to describe the extent of freedom or choice one has over his or her own behavior. These two concepts are described more below. Figure 1 shows our proposed model.

Emotion Regulation

Organizational researchers have long been interested in how employees regulate themselves to meet work-related goals, or self-regulation (Carver & Scheier, 1982; Kanfer et al., 1996; Locke, Frederick, Lee, & Bobko, 1984). A subset of this field is the study of emotion regulation: "the processes by which individ-

Alicia A. Grandey and Glenda M. Fisk, Department of Psychology, Pennsylvania State University; Dirk D. Steiner, Laboratoire de Psychologie Expérimentale et Quantitative, Université de Nice–Sophia Antipolis, Nice, France.

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Figure 1. Hypothesized model. H = hypothesis.

uals influence which emotions they have, when they have them, and how they experience and express these emotions" (Gross, 1998b, p. 275). People engage in emotion regulation because it contributes to obtaining desired outcomes; as stated by Kanfer and Kantrowitz (2002):

Emotion regulation may be undertaken for a number of goals or purposes. The most obvious purposes are reduction of subjective distress and reduction in the frequency of unacceptable emotionrelated behaviors However, emotion regulation may also be undertaken to accomplish nonemotional or instrumental goals. (pp. 439–440)

In fact, regulating emotional expressions has been shown to contribute to such instrumental goals as obtaining a job, gaining social support, and achieving higher performance ratings and tips (Clark, Pataki, & Carver, 1996; Fox & Spector, 2000; Kristof-Brown, Barrick, & Franke, 2002; Pugh, 2001; Tidd & Lockard, 1978).

Types of emotion regulation. Emotion regulation can be categorized into the self-regulation of (a) feelings, also called antecedent-focused emotion regulation, and (b) expressions, also known as response-focused emotion regulation (Gross, 1998a). Antecedent-focused emotion regulation refers to modifying initial feelings by changing the situation or the cognitions of the situation. Response-focused emotion regulation refers to modifying behavior once emotions are experienced by suppressing, faking, or amplifying an emotional response (Grandey, 2000). Response-focused regulation is particularly critical in understanding the job strain of customer-contact employees because (a) expressions are what influence the observer (in this case, the customer or client); (b) employees may modify expressions at work without needing to regulate feelings; and (c) regulation of expressions—but not regulation of feelings-has been linked to stress outcomes (e.g., Brotheridge & Lee, 2002; Grandey, 2003). Thus, this study focused on response-focused emotion regulation.

Resource depletion from emotion regulation. Various researchers have argued that emotion regulation requires the expenditure of a limited pool of cognitive and energy resources (Baumeister, Bratslavsky, Muraven, & Tice, 1998; Brotheridge & Lee, 2002; Grandey, 2000; Richards & Gross, 1999). As stated by Forgas and Vargas (1999), emotion maintenance and regulation are important goals that "probably occupy a disproportionately important role in regulating our everyday behavioral strategies and take up a great deal of our mental resources" (p. 139). In particular, response-focused emotion regulation may drain cognitive (e.g., attention) and motivational (e.g., energy, persistence) resources because it requires continual monitoring and modification of expressions (Gross, 1998a, 1998b; Richards & Gross, 1999; Wegner, Erber, & Zanakos, 1993). In fact, experimental research has shown that those instructed to suppress emotions increase some signs of physiological arousal and self-reported strain compared with those not under these instructions (Butler et al., 2003; Gross & Levenson, 1993, 1997; Sideman & Grandey, 2003). Other experiments have shown that emotion regulation decreases participants' cognitive and motivational resources on the basis of their performance on subsequent tasks (e.g., Baumeister et al., 1998; Muraven & Baumeister, 2000; Richards & Gross, 1999, 2000).

Job strain and emotion regulation. An increase in arousal and decrease in resources provide mechanisms for why responsefocused emotion regulation at work increases signs of job strain, such as emotional exhaustion and job dissatisfaction (Grandey, 2000; Hochschild, 1983; Morris & Feldman, 1996). Emotional exhaustion is a key dimension of job burnout that specifically refers to a sense of energy depletion from work (Maslach & Jackson, 1981; Wright & Cropanzano, 1998). Job dissatisfaction refers to a negative attitude toward the job, which is more likely if employees feel that the required work behaviors drain personal resources that are needed in other domains of life (e.g., energy; Pugliesi, 1999; Wharton & Erickson, 1993). In fact, for customercontact employees, response-focused emotion regulation tends to be positively related to health problems, burnout, and job dissatisfaction (Brotheridge & Grandey, 2002; Brotheridge & Lee, 2002; Grandey, 2003; Pugliesi, 1999; Schaubroeck & Jones, 2000).

Personal Control as a Moderator

Self-regulated behaviors may be conducted as an expression of oneself, or they may be "pressured and coerced by intrapsychic and environmental forces and thus do not represent true choice" (Deci & Ryan, 1987, p. 1024). Though emotion regulation is often used synonymously with *self*-control (Baumeister et al., 1998; Muraven & Baumeister, 2000), emotion regulation can also be externally controlled or driven. In fact, previous studies on emotion regulation have tended to examine emotion regulation in conditions that are externally controlled, either by experimenters' instructions and monitoring or by surveying young or low-status employees. The same behaviors may have a different effect when they are performed by personal choice.

We propose that personal control buffers the relationship of emotion regulation to negative outcomes. In general, human beings strive to be in charge of their own behaviors rather than be controlled by others: "The need for self-determination, or autonomy, is the desire to be the origin of one's own behavior, to be free, to choose one's course of action for one's self" (Skinner, 1995, p. 10). When this need is met, it can have both direct and indirect effects on employee outcomes (Frese, 1989). Directly, a sense of control or autonomy provides affective, motivational, and cognitive resources, such as positive moods, intrinsic interest, and focused attention, respectively (DeCharms, 1968; Deci & Ryan, 1985; Spector, 1986). Indirectly, personal control has been shown to have a buffering effect against threatening or draining situations (Folkman, Lazarus, Gruen, & DeLongis, 1986; Friedland, Keinan, & Regev, 1992; Ganster & Fusilier, 1989; Glass et al., 1973; Karasek, 1979; Shirom, Melamed, & Nir-Dotan, 2000). Personal

control thus provides resources that compensate for situations that would otherwise be draining or depleting.

Given that emotion regulation has been shown to increase stress and drain cognitive and motivational resources and that personal control acts as a buffer against stress and *provides* similar resources, a sense of personal control should decrease the strain of emotion regulation. In this study, we examined two indicators of control as moderators of the strain of emotion regulation: job autonomy and emotional culture.

Job autonomy. Job autonomy has been defined as "the degree to which the job provides substantial freedom, independence, and discretion to the individual in scheduling the work and determining the procedures to be used in carrying it out" (Hackman & Oldham, 1976, p. 258). Job autonomy is a component of classic models of work stress, motivation, and attitudes (Hackman & Oldham, 1976; Karasek, 1979). Research has demonstrated that employees who have more job autonomy have more positive affect, internal motivation, and self-confidence compared with those with less job autonomy (Adelmann, 1987; Champoux, 1991; Hackman & Oldham, 1976; Saavedra & Kwun, 2000). Thus, we propose that a high level of job autonomy provides resources that counteract the depletion of resources from emotion regulation and serves to buffer the employee against strain.

Though greater job autonomy might directly impact the emotion regulation performed, job autonomy does not necessarily reduce the need to control tempers or solicit positive feelings in others. For example, in one study of Canadians, those with objectively high job autonomy (e.g., managers) reported regulating expressions with the public as frequently as employees in objectively lower autonomy jobs (e.g., service workers; Brotheridge & Grandey, 2002). Furthermore, the interest in developing the emotional intelligence of managers (e.g., George, 2000) has shown that even the most autonomous employees need to emotionally regulate. We argue that job autonomy is likely to modify the outcomes of emotion regulation to a greater extent than does the frequency with which it is performed.

Previous theorists have proposed job autonomy as a moderator of the strain of emotion regulation at work (Grandey, 2000; Hochschild, 1983), but few studies have tested this idea. One study of U.S. bank and hospital employees found that those with emotional labor jobs (jobs likely to require engaging in emotion regulation with the public) who reported high job control were less burned out and more satisfied than those with less job control; this effect was weaker for those in less emotionally demanding jobs (Wharton, 1993). On the other hand, the proposed moderating effect did not emerge in a study of U.S. university employees (Pugliesi, 1999); however, this may be due to the measure of job control that seemed to focus on the extent of voice in decision making. Our study examined the moderating role of job autonomy with a more established measure and with a wider sampling of occupations and organizations than have been used previously. On the basis of the theoretical idea that job autonomy provides resources that compensate for those drained by emotion regulation, we expected the following:

Hypothesis 1a: The positive relationship of response-focused emotion regulation with burnout would be weaker for employees with high job autonomy than low job autonomy.

Hypothesis 1b: The negative relationship of response-focused emotion regulation and job satisfaction would be weaker for employees with high job autonomy than low job autonomy.

Emotional culture. Regional and national cultures have been shown to have different norms for emotional expressions (Bagozzi, Verbeke, & Gavino, 2003; Ekman, 1972; Ekman & Friesen, 1971; Matsumoto, 1990). Similarly, cultures vary in their expectations for regulating and expressing emotions in the workplace (Cooper, Doucet, & Pratt, 2003). Such differences are part of the emotional culture (Gordon, 1989). Previous research has shown that employment in countries with different emotional cultures influences the relationship of emotion regulation with customer service outcomes (Bagozzi et al., 2003). We expected employment in different emotional cultures to influence the relationship of emotion regulation and employee strain.

Using terminology from Turner (1976) regarding social identity, Gordon (1989) suggested that some cultures are more institutionally oriented, with strong norms about regulating emotions to fulfill institutional roles and standards, whereas other cultures are more impulsively oriented and value expressing unregulated emotions. These are considered alternative perspectives, though evidence suggests that persons within a culture can use either orientation depending on the context (Gordon, 1989). We expect that some cultures will have more rigid expectations for what are acceptable displays with the public (thus, more institutionally oriented), whereas others will be less comfortable with false displays and more accepting of negative displays (thus, more impulsively oriented). Though this may seem to argue that emotional culture contributes directly to the frequency of emotion regulation, "emotional culture does not always correspond closely to emotional behavior or feeling" (Gordon, 1989, p. 116; Hochschild, 1983). Instead, emotion culture is a way for employees to understand their and others' emotions, such that emotion regulation performed in an institutionally oriented culture may mean something different than would the same regulation performed in an impulsively oriented culture.

In particular, persons within cultures that tend to use an impulsive orientation to understand and evaluate social situations are likely to feel more personal control over expressions than are persons within cultures that tend to use an institutional orientation. Experiencing more personal control over emotions at the cultural level suggests more ownership of expressive and regulatory behavior, resulting in more intrinsic motivation and energy and more of a buffer against strain. Some might argue that the buffering effect should occur with an institutional orientation rather than an impulsive orientation because emotion regulation is then consistent with social expectations (Gordon, 1989). We agree that engaging in culturally prescribed expressive behaviors should induce positive reactions from observers within that culture; however, benefits from the social interaction should not reduce personal strain unless the behavior is personally owned (Deci & Ryan, 1985, 1987). As the relationship of emotion regulation and strain has been primarily demonstrated in emotional cultures that require adherence to "service with a smile," such as the United States and Canada (e.g., Brotheridge & Grandey, 2002; Grandey, 2003; Pugliesi, 1999), this relationship may actually be weaker if examined in more impulsive emotional cultures. Thus, we predicted the following:

Hypothesis 2a: The positive relationship of response-focused emotion regulation and burnout would be weaker for employees in impulsively oriented cultures than institutionally oriented cultures.

Hypothesis 2b: The negative relationship of response-focused emotion regulation and job satisfaction would be weaker for employees in impulsively oriented cultures than institutionally oriented cultures.

Job autonomy within the emotional culture. We have proposed that high job autonomy and a more impulsively oriented emotional culture provide more personal control compared with low job autonomy and an institutionally oriented emotional culture, respectively. Job autonomy is a proximate influence on employees, but its effect may be further modified by the distal influence of emotional culture (Earley & Francis, 2002). In other words, a three-way interaction can be predicted.

Employees with low job autonomy work under low personal control, with required tasks, display rules, and frequent monitoring. This proximate influence on personal control should mean a strong positive relationship between emotion regulation and strain regardless of culture. Alternatively, those with high job autonomy have comparatively fewer proximate constraints on work behavior. In this case, the distal emotional culture should make a difference, as the employee looks to the societal norms to determine appropriate behavior. High job autonomy employees working in an institutional emotional culture are likely to have less personal control in comparison with those working in an impulsive emotional culture (Gordon, 1989), though still more in comparison with those with low job autonomy overall. In contrast, employees with high personal control in the job domain as well as the emotional culture are more likely to feel behaviors are under personal volition and, thus, have a stronger buffer against strain. For this reason, we expected that the buffering effect of job autonomy would be stronger in an impulsively oriented culture than an institutionally oriented culture. We proposed a three-way interaction:

Hypothesis 3a: The positive relationship of emotion regulation and exhaustion would be weaker for those with high job autonomy than low job autonomy; this buffering effect would be stronger for employees in impulsively oriented compared with institutionally oriented cultures.

Hypothesis 3b: The negative relationship of emotion regulation and job satisfaction would be weaker for those with high job autonomy than low job autonomy; this buffering effect would be stronger for employees in impulsively oriented compared with institutionally oriented cultures.

Summary

We expected that response-focused emotion regulation with consumers would deplete the resources of the employee and predict two signs of strain—emotional exhaustion and job dissatisfaction. To be conservative in our estimates, we examined this relationship while controlling for negative affectivity, which has been shown to relate to emotion regulation, job satisfaction, and burnout (Brief, Burke, George, Robinson, & Webster, 1988; Brotheridge & Grandey, 2002; Necowitz & Roznowski, 1994). Our main purpose was to examine whether the extent of personal control, by providing cognitive and motivational resources, buffers against the depletion from emotion regulation. Personal control was examined as job autonomy and the emotional culture in which the employee works, and both two-way and three-way interactions were expected with the emotion regulation–strain relationship.

Method

Emotional Culture

To test these hypotheses, we first identified two cultures that varied in their orientation toward emotions. An example of a culture with a strong institutional orientation toward emotion is the United States. There is a strong norm for Americans to act positively and hide negative feelings to garner good impressions (Schneider, 1981). For example, a qualitative study revealed that "Americans smile a lot in greeting and during formal introductions" (Hall & Hall, 1990, p. 142), and a survey study found that American students were more concerned with inhibiting anger than European and Asian students (Sommers, 1984). Furthermore, American employees who interact with the public are instilled with the "service with a smile" norm (Albrecht & Zemke, 1985). In a qualitative analysis of expectations for service encounters, Winsted (1997) found that themes of friendliness were typical in the U.S. analysis, though authentically caring was rated less important, showing expectation for response-focused regulation within the work role. Both employees and the public are aware of this expectation for smiling service (Albrecht & Zemke, 1985; Hochschild, 1983), creating high external demands for positive displays in encounters with the public.

An example of a country with a more impulsive orientation toward emotion is France. A manager of a U.S.-based hotel in Paris said about his employees "the French have a very emotional way to do things . . . this can be good and bad. The good side is that they can be very joyous and engaging. On the bad side, sometimes the French temper lashes out" (Hallowell, Bowen, & Knoop, 2002, p. 14), suggesting a more impulsive orientation compared with U.S. counterparts. Furthermore, in contrast to the "service with a smile" service culture in the United States, the French do not care for false informalities or "phony chumminess" (Hall & Hall, 1990, p. 117). In fact, the French have referred to the service culture in the United States as "la culture Mickey Mouse" (Hallowell et al., 2002, p. 19), demonstrating disdain for following institutional standards about emotions. Thus, we argue that the United States represents the more institutional orientation and France represents a more impulsive orientation toward emotional behavior in a work setting. It is important to recognize that both orientations can be used by members of any culture, depending on the context (Gordon, 1989); however, the evidence presented above suggests that the United States and France tend to apply different orientations when evaluating appropriate emotions for interactions with consumers, which is our focus here.

Participants and Procedures

Teams of undergraduate and graduate research assistants in the United States and France recruited participants from December 2002 to February 2003. Criteria for inclusion in the study were that participants (a) be over 18 years of age and *not* full-time students, (b) work over 16 hr a week in jobs that had contact with the public, and (c) not be restaurant servers, because of the differences in tipping norms in the two countries. A cover letter invited voluntary participation in a survey study on emotion requirements of work, with no mention of the cross-cultural comparison aspects of the study to minimize ethnocentric response bias. The research teams used various recruiting methods over a month-long period. In some cases, a snowball technique was used, such that persons known to the research

assistant were asked to recommend other participants. In other cases, the researcher requested participation from strangers: For example, one recruited travelers on an airplane, whereas another requested participation of employees at a mall. The U.S. research group recruited participants primarily in the eastern region of the country; the French research team recruited participants in the southern region of the country. Surveys were returned in a sealed envelope to the research assistant or mailed directly to the primary researcher in that country.

In the U.S. group, six researchers were each given 20 surveys to distribute, making 120 respondents possible, of which 116 were returned. Two French research assistants sought 50 respondents each, and 99 were completed. In total, 215 of 220 surveys (98%) were returned. After respondents who did not meet all of the criteria were screened out, 196 respondents provided usable surveys (89% of original sample), with 101 from the United States and 95 from France. Table 1 shows the demographics and occupational status of participants by country. Overall, there were 120 female respondents (61%) and 76 male respondents (39%), and 150 (76.5%) were employed full-time. On average, they worked 39.53 hr per week (SD = 11.16) and had held their jobs for over 8.5 years (M = 106months, SD = 113.71). The two samples did not statistically differ in the number of hours worked per week, t(195) = 1.37, p > .10 (difference 95%) confidence interval [CI] = -5.32, 0.99) or job tenure, t(193) = 1.25, p >.10, (difference 95% CI = -.52.36, 11.81) with country explaining 1.00% and 0.08% of the variability, respectively. Respondents held a wide variety of jobs that were characterized into one of six occupational groups on the basis of established categories (www.bls.gov; see Table 1).

Instruments

To minimize consistency biases, we asked respondents to respond to each set of items on different response scales. See descriptions below for the response scales.

Response-focused emotion regulation. Several scales measure response-focused emotion regulation or surface acting, but they tend to focus on either suppressing negative emotions or faking positive ones. We created a composite with two suppressing emotion items and five faking emotion items (Brotheridge & Lee, 2003; Grandey, 2003). Examples are "I resist expressing my true feelings" and "I fake a good mood." The instructions asked the respondent "when interacting with the public (customers, clients, patients) how often do you actually *do* the following behaviors during a typical work day?," and the response scale ranged from 1 (*never/not at all*) to 5 (*always/constantly*). A principal-components analysis yielded one factor that met traditional criteria (eigenvalues >1.0). Alpha coefficients for these items were .89 for the U.S. sample and .83 for the French sample.

Job autonomy. The revised version of the three-item measure of job autonomy (Idaszak & Drasgow, 1987) from the Job Diagnostic Survey

Table 1

Frequencies of Demographic and Occupational Categories by Country

(Hackman & Oldham, 1975) was used. Items refer to the extent of "independence and freedom," ability to "decide *on my own*" [italics in original], and "personal initiative or judgment" in how one's work is done. Responses were on a 5-point agreement scale ($\alpha_{U.S.} = .84$, $\alpha_{France} = .88$).

Emotional exhaustion. The Job-Related Exhaustion Scale (Wharton, 1993) provided a measure of emotional exhaustion, the primary dimension of job burnout (Lee & Ashforth, 1996; Wright & Cropanzano, 1998). The six items refer to the frequency (0 = never felt this way, 6 = felt this way every day) of feeling "emotionally drained" and "burned out," for example ($\alpha_{U.S.} = .89$, $\alpha_{France} = .85$).

Job satisfaction. Job satisfaction can be measured as a global construct or as attitudes toward various facets of the job (Brief, 1998). For our purposes, we were interested in a global affective evaluation of the job. A three-item global satisfaction scale was used from the Michigan Organizational Assessment Questionnaire (see Spector, 1997). Responses were reported on a 1 (*strongly disagree*) to 5 (*strongly agree*) scale, and items were "In general, I like my job," "Generally speaking, I like working here," and "In general, I do not like my job" (reverse coded; $\alpha_{U.S.} = .88$, $\alpha_{France} = .81$).

Negative affectivity. The 10 negative emotion terms (e.g., *hostile*, *upset*) from the Positive and Negative Affect Schedule (PANAS; Watson, Clark, & Tellegen, 1988) were included with dispositional instructions: "rate the extent you generally feel this way, on average, <u>in any situation</u>" [underline in original] with a scale from 1 (*very slightly or not at all*) to 5 (*extremely*; $\alpha_{U.S.} = .84$, $\alpha_{France} = .83$).

Translation Process and Measurement Equivalence

We followed previously established protocols to ensure that the survey had similar meaning across the two countries (Hofstede, 1980) and followed a four-step process: (a) Alicia A. Grandey designed the survey with scales in English, (b) the survey was translated from English to French by native French speakers, (c) the items were cross-translated back to English by a bilingual native English speaker, and (d) the items were reviewed by Alicia A. Grandey and Dirk D. Steiner to determine whether the crosstranslations held their original meanings. A few minor adjustments in word choice were made on the basis of this process prior to the survey being completed by participants in either country.

It was necessary to statistically demonstrate measurement equivalence (MEQ) before testing our hypotheses, as "it is often difficult to interpret observed group mean differences meaningfully without MEQ" (Raju & Ellis, 2002, p. 173). MEQ shows that the relationship between the construct of interest and the observed measure is similar across groups; if this is not demonstrated, any group differences might be due to measurement issues rather than the proposed mechanisms. The most critical comparison is that the factor loadings for the constructs are invariant across groups (Marsh,

Variable	U.S.	France	Examples
Women/men	67/34	53/42	
Part-time/full-time	26/75	20/75	
Professional specialty, n/%	20/20	18/19	Architect, attorney, librarian, counselor, registered nurse, dental hygienist, engineer, photographer
Executive, administrative, managerial, n/%	19/19	15/16	School administrator, bank manager, construction manager, gift shop manager
Service, n/%	17/17	15/16	Massage therapist, manicurist, beauty salon operator, service associate, hotel clerk, customer service representative, housekeeping
Sales, n/%	15/15	14/15	Phone sales, real estate sales, retail associate, pet store clerk, cashier, news vendor
Technicians and technical support, $n/\%$	17/17	22/23	Accountant, electrical technician, pharmacist assistant, photo lab technician, security guard, patient mobility technician
Administrative support/clerical, n/%	10/10	7/8	Bank teller, staff assistant, administrative assistant, secretary

1995). A two-group confirmatory factor analysis was conducted in AMOS 5.0 with a four-factor measurement model of the focal variables (emotion regulation, job autonomy, emotional exhaustion, and job satisfaction). Covariation among the constructs and factor loadings were freely estimated. Constraining the factor loadings to be equal across the two groups did not significantly change the fit, $\Delta \chi^2(\Delta 15, N = 194) = 22.91, p > .05;$ factor loadings (λ) for each group were moderate to strong (.55 to .94), and the fit indices were similar for the constrained model ($\chi^2/df = 1.99$, CFI = 0.85, root-mean-square error of approximation [RMSEA] = .07) and unconstrained model ($\chi^2/df = 2.01$, CFI = 0.85, RMSEA = .07). Thus, the measurement model was determined to be invariant across the two cultures.

Results

Descriptive Analyses

Table 2 shows the means, standard deviations, and bivariate correlations for participants of each country. Emotional exhaustion was the only study variable that differed significantly by culture. Emotional exhaustion was significantly higher for the U.S. employees than the French employees, t(94) = 4.15, p < .01, difference 95% CI = 0.41, 1.16, with emotional culture explaining 8%of the variance. The employee's country explained less than 1% of the variability in job satisfaction, t(194) = 0.16, p > .10, difference 95% CI = -0.23, 0.27, and job autonomy, t(194) = 1.24, p > .10, difference 95% CI = -0.48, 0.11. As expected, emotion regulation was not more frequent in the more institutionally oriented culture (United States) than the impulsively oriented culture (France) t(195) = 0.58, p > .10, difference 95% CI = -0.16, 0.29, with country explaining less than 1% of the variability in emotion regulation. It is important to note that negative affectivity also did not significantly vary by country, t(192) = 0.00, p > .10, difference 95% CI = -0.15, 0.15, ruling out group differences in affective disposition as an alternative explanation for any moderating effects of emotional culture. In both samples, negative affectivity was significantly correlated with burnout and job satisfaction (p < .01). Other individual characteristics (gender, occupation, part-time/full-time work status, hours per week, job tenure) were not related to the outcomes (see Table 2) and are not included in further analyses. As expected, emotion regulation had a small to moderate relationship with job autonomy ($r_{\rm US} = -.18$, $r_{\text{France}} = -.23$), supporting that job autonomy can be examined as a moderator rather than solely an antecedent of emotion regulation.

Table 2					
Bivariate	Correlations	of Study	Variables	by	Country

Regression Analyses

In all analyses, negative affectivity, emotion regulation, job autonomy, and emotional culture (United States = 1, France = 2) were entered in the first step, followed by all three two-way interaction terms, and finally the three-way interaction term. Prior to forming interaction terms, emotion regulation and job autonomy were centered to minimize multicollinearity concerns (Aiken & West, 1991). A significant change in the variance explained by the regression step and a significant beta coefficient for an interaction term constitutes a moderating effect (Aiken & West, 1991; Baron & Kenny, 1986). See Table 3 for results.

Emotional exhaustion. The four variables entered in the first step explained 36% of the variance in emotional exhaustion (p <.01), with negative affectivity, emotional culture, job autonomy, and emotion regulation each having a significant effect (p < .01). In the second step, the three two-way interactions were entered, explaining an additional 4.1% of the variance in emotional exhaustion (p < .01). The interaction term of emotion regulation and job autonomy was significant (B = -0.25, SE = .08, p < .01), providing supporting evidence for Hypothesis 1a. The simple slopes of emotion regulation on emotional exhaustion were separately graphed for the participants who were above high levels (+1 SD) and below low levels (-1 SD) of job autonomy (Aiken & West, 1991). As shown in Figure 2, emotion regulation was positively related to burnout for those lower than average in job autonomy; this relationship was weakened for employees who were higher than average in job autonomy, as predicted. The interaction term of emotion regulation and emotional culture was not significant (B = -0.31, SE = .20, p > .10) and did not support Hypothesis 2a. Finally, the three-way interaction had a negligible effect ($R^2 = .00, p > .10$) and did not support Hypothesis 3a.

Job satisfaction. The four variables in the first step explained 39% of the variance in job satisfaction (p < .01). Negative affectivity and job autonomy were significant predictors (p < .01); emotional culture (p > .10) and emotion regulation (p > .05)were not. The entry of the three two-way interactions increased the variance explained in job satisfaction by a significant 3.3% (p <.05). However, the results do not fully support either Hypothesis 1b or 2b because neither the interaction of emotion regulation with job autonomy (B = 0.09, SE = .05, p = .086) nor its interaction

Variable $M_{\rm U}$	U.S.	$SD_{\rm U.S.}$	$M_{\rm Fr}$	$SD_{\rm Fr}$	1	2	3	4	5	6	7	8	9
1. Negative affectivity 1.	.60	.52	1.60	.53		04	16	.08	14	10	.10	.54**	35**
2. Gender ^a					.15		.36**	30**	.10	.03	.09	06	.09
3. PT/FT ^b					.13	.18		50**	03	.06	09	15	.13
4. Hours per week 38.	.48	9.33	40.65	12.71	20*	31*	72**		.27*	.23*	.16	.04	.11
5. Job tenure (months) 96.	.23	103.41	116.50	123.34	10	11	15	.23*		.29**	10	05	.18
6. Job autonomy 3.	.74	1.04	3.92	1.05	34**	19	20*	.12	.07		23*	31**	.51**
7. Emotion regulation 2.	.73	0.77	2.66	0.84	.30**	04	02	.06	.01	18		.20	13
8. Emotional exhaustion ^c 2.	.35	1.47	1.56	1.14	.43**	05	.03	.04	.07	27**	.37**		50**
9. Job satisfaction 4.	.23	0.94	4.21	0.83	26**	05	06	.06	.03	.64**	33**	50^{**}	

Note. Correlations for the U.S. sample (n = 101) are below the diagonal, correlations for the French sample (n = 95) are above the diagonal. ^a 1 = male, 2 = female. ^b 1 = full-time (FT), 2 = part-time (PT). ^c Means are significantly different (p < .01).

* p < .05. ** p < .01.

	Emot	ion exhaus	stion	Job satisfaction			
Independent variables	В	SE	ΔR^2	В	SE	ΔR^2	
Step 1: Main effects			.358**			.390**	
Negative affectivity	0.99**	.16		-0.28 * *	.10		
Emotional culture ^a (EC)	-0.72^{**}	.16		-0.11	.10		
Job autonomy (JA)	-0.22**	.08		0.46**	.05		
Emotion regulation (ER)	0.31**	.10		-0.12^{+}	.06		
Step 2: Two-way interactions			.041**			.033*	
$\hat{E}R \times JA$	-0.25 **	.08		0.09^{+}	.05		
$ER \times EC$	-0.31	.20		0.23^{+}	.13		
$EC \times JA$	-0.08	.16		-0.14	.10		
Step 3: Three-way interaction			0			.004	
$ER \times JA \times EC$	-0.06	.17		-0.12	.11		
Total R^2			.40		.43		
Adjusted R^2			.37		.40		

Table 3Moderated Regression Analysis

Note. B represents the unstandardized regression coefficients for each step in the regression equation.

^a Emotional culture: 1 = United States, 2 = France.

^{\dagger} p < .10. * p < .05. ** p < .01.

with emotional culture (B = 0.23, SE = .13, p = .075) met traditional levels of significance. As the entry of the set of two-way interactions explained a significant and nontrivial 3.3% of the variability in job satisfaction, and the probability values of the predicted terms suggest a systematic (albeit weak) effect, we graphed the predicted interactions to explore their form (see Figure 3). Consistent with our reasoning in Hypothesis 1b, the negative relationship between emotion regulation and job satisfaction was weaker for employees with high job autonomy compared with low job autonomy. The interaction of emotional culture with emotion regulation was also in the predicted direction (Hypothesis 2b). The negative relationship between emotion regulation and job satisfaction was weaker in the impulsively oriented emotional culture (France) than in the more institutionally oriented emotional culture (United States). Thus, though the effects of the individual two-way interactions were too small to be significant, their form supports our propositions. Finally, the addition of the three-way interaction



Figure 2. Graph of the Emotion Regulation \times Job Autonomy interaction on emotional exhaustion.

had a nonsignificant effect ($R^2 = .004$, p > .10) and did not support Hypothesis 3b.

Discussion

Regulating emotions at work is important to meet instrumental and interpersonal goals (Kanfer & Kantrowitz, 2002); for



Figure 3. Exploratory graphs of the Emotion Regulation \times Job Autonomy and Emotion Regulation \times Emotional Culture interactions on job satisfaction.

customer-contact employees, such goals include producing customer satisfaction and loyalty (Pugh, 2001; Tsai, 2001). Unfortunately, recent evidence has suggested that the more employees modify their emotional expressions, the more they experience stress, burnout, and job dissatisfaction (e.g., Brotheridge & Lee, 2002, 2003; Butler et al., 2003; Erickson & Wharton, 1997; Grandey, 2003; Gross & Levenson, 1993, 1997; Pugliesi, 1999). Similarly, we found a significant positive relationship between response-focused emotion regulation and emotional exhaustion with a wide sample of occupations from two nations. Of importance, this significant relationship existed even when we controlled for negative affectivity, which differs from previous results (Brotheridge & Grandey, 2002). Emotion regulation was also associated with job satisfaction, though this effect seemed to be weaker because of differences in the emotional culture (see Table 2). Overall, these results are consistent with theories proposing that regulating emotional expressions drains energy and motivational resources (Brotheridge & Lee, 2002; Grandey, 2000; Muraven & Baumeister, 2000). We extended the previous literature by examining a boundary condition of this effect, and the results provide both theoretical and practical implications.

Summary of Results

We proposed that a sense of control over one's own behaviors provides personal resources that compensate for resources lost through regulation, thus reducing strain (Folkman et al., 1986; Glass et al., 1973; Karasek, 1979). In particular, we examined personal control in two ways: (a) as a perceived characteristic of the work environment (low or high job autonomy) and (b) as the emotional culture in which the employee works (United States or France). The most robust finding was that when employees believed that they had autonomy in their job behaviors, emotion regulation that was otherwise exhausting was not associated with exhaustion at all. Job autonomy enhances personal resources such as positive affect and intrinsic motivation (e.g., Hackman & Oldham, 1976; Saavedra & Kwun, 2000; Spector & Jex, 1991), which may replace similar resources lost by emotion regulation. Though the interaction effect of emotion regulation and job autonomy predicting job satisfaction was weaker than it was for burnout, the form of the interaction was in the predicted direction. Employees who had less job autonomy tended to be more dissatisfied with the job the more frequently they regulated emotional expressions at work; employees with more job autonomy were satisfied regardless of emotion regulation.

We also proposed that the emotion regulation–strain relationship might be stronger for employees working in a culture with an institutional orientation toward emotion (Gordon, 1989), such as the United States, where expressions are commoditized for the public (Hochschild, 1983). The emotional culture in France is less rigid regarding the expected expressions, and French culture has been shown to dislike coerced and fake expressions. This evidence suggests that France has a more impulsive orientation (Gordon, 1989), which permits more personal control over expressive behaviors. The distal influence of emotional culture did not change the emotion regulation–burnout relationship beyond the more proximal effect of job autonomy. However, emotional culture was a weak moderator of the relationship of emotion regulation with job satisfaction. The frequency of emotion regulation was negatively related to job satisfaction for employees in the more institutionally oriented emotional culture, whereas there was no relationship between emotion regulation and job dissatisfaction for those in the more impulsively oriented emotional culture. Employees in more impulsive cultures are less likely to suppress or fake emotions to follow institutional norms, instead doing it by choice to meet their own interpersonal or instrumental goals. As such, they should have more ownership and intrinsic motivation from their emotion regulation (Deci & Ryan, 1985), thus reducing the link with job dissatisfaction. In general, emotional culture at the national level is a very distal predictor of human behavior (Earley & Francis, 2002); thus, this effect is notable.

Finally, we did not find support for our proposed three-way interaction, which tested whether the relationships between emotion regulation and strain depended on the level of both measures of personal control. Instead, the buffering effects of autonomy and of emotional culture seemed to work independently, as shown by the two-way interactions. Alternatively, we may have found null results because of limited power to find three-way interactions or the distal nature of emotional culture measured at the country level. Future directions are discussed below.

Alternative Explanations and Limitations

Rather than personal control, an alternative explanation for the significant buffering effect of job autonomy on exhaustion is that this perception represents other job-related resources. Because our sample included managers and professionals, it is possible that the buffering effect of job autonomy is actually due to occupational status, which provides more prestige, job scope, and wages compared with lower status employees (Glomb, Kammeyer-Mueller, & Rotundo, 2004; Spector & Jex, 1991). To examine this possible explanation, we compared the professional and managerial occupations and the other four lower status occupations (see Table 1). As expected, the managerial/professional occupations (N = 71)were significantly higher in perceived job autonomy (M = 4.29, SD = 0.75) than the other occupations (N = 118, M = 3.57, SD =3.61); t(187) = 4.45, p < .01, difference 95% CI = 0.42, 0.95, and occupational status explained 10.5% of the variability in perceived job autonomy. To rule out the possibility that the interaction effects were due to occupational status rather than personal control, we retested the job autonomy interactions with the lower status employees (N = 118; see Table 1). The entry of the two-way interactions ($\Delta R^2 = .054, p < .05$) and the Emotion Regulation \times Job Autonomy interaction term (B = -0.26, SE = .11, p < .05) showed that the buffering effect was still significant for those with lower occupational status.

Though the form of the effects tended to go in the predicted direction, the buffering effect of an impulsive emotional culture was weak. If our theoretical reasoning is correct, researchers should find stronger effects if they (a) select cultures that are more extreme in their emotion cultures or (b) examine more proximate cultural influences. To the first point, we chose two countries to represent different emotional cultures while having work-related similarities (e.g., both capitalistic, value service, and reasonably strong economies); however, it may be that the countries do not differ in emotional culture to a substantial degree. Other countries might have more distinct emotional cultures than the ones we chose; for example, some Asian cultures are known for high expectations to control emotions as part of institutional roles (e.g., China), whereas some European cultures are known for their impulsive expressivity (e.g., Italy). Researchers have also identified other aspects of the emotional culture that may also be useful in selecting comparative countries (e.g., Cooper, et al., 2003). To the second point, using nations as a proxy for emotional culture is a very distal and abstract measure; a more proximate measure of emotional culture might be more effective (Earley & Francis, 2002). For example, organizational cultures have been shown to vary in expectations for emotional expression (Fineman, 2001; Martin, Knopoff, & Beckman, 1998; Van Maanen & Kunda, 1989), and the northern and southern regions of both France and the United States are recognized as having different emotional cultures. Future research should examine cultural-level personal control in different ways.

Though all the data collected were self-reported, several factors minimize shared method variance as an explanation for our results. First, we controlled for a factor that has been shown to inflate relationships in stress and emotions research: negative affectivity (Brief et al., 1988; Brotheridge & Grandey, 2002; Burke, Brief, & George, 1993). Second, we designed our survey so that each variable used a different response scale to minimize consistency and response biases (Podsakoff, MacKenzie, Lee, & Podsakoff, 2003). Third, interaction effects are less likely to be explained by common method variance than linear relationships. To further combat response biases, future researchers may want to use a more specific frequency response scale (e.g., once a day, twice a week) for emotion regulation than the general frequency scale used here (never, always). Another concern is that the causal direction of the relationships cannot be determined; however, experimental research has shown that emotion regulation increases subsequent arousal and strain (Butler et al., 2003; Gross & Levenson, 1993, 1997).

Theory and Research Implications

We used the processes of resource allocation, depletion, and compensation (e.g., Kanfer & Ackerman, 1989; Muraven & Baumeister, 2000) to explain the relationship of emotion regulation with strain. Our results suggest that this is a useful approach that seems to be applicable to different cultures and occupations. Furthermore, the role of job autonomy providing compensatory resources also seems to be generalizable across occupations and cultures. Future research should examine other sources of resource compensation that may serve to buffer this relationship for these employees. For example, just as cognitive ability can act as a resource for cognitively taxing tasks (Kanfer & Ackerman, 1989), perhaps emotional intelligence acts as an emotional resource for emotional labor jobs (Arvey, Renz, & Watson, 1998; Wong & Law, 2002). Experience or tenure in emotionally demanding jobs might also build up one's emotional resources (Muraven & Baumeister, 2000).

Our research has implications for future experimental studies of the resource depletion approach to emotion regulation. Previous experiments have manipulated instructions to suppress emotions and have shown that stress increases (e.g., Butler et al., 2003; Gross & Levenson, 1993) and cognitive performance suffers (e.g., Baumeister et al., 1998; Richards & Gross, 1999, 2000) compared with no suppression instructions. However, these studies confounded personal control and emotion regulation; it is unclear whether high emotion regulation was detrimental compared with low emotion regulation because of the regulation performed or because of the lack of personal control over the regulation. Future experiments need to separately examine conditions of personal control and emotion regulation; for example, researchers might cross conditions of direct instructions for emotion regulation with social circumstances that could induce emotion regulation spontaneously.

Though our results provide evidence consistent with resource allocation theories, we did not directly test the mechanisms of this approach. In particular, we did not measure the specific resources that are depleted or gained. Previous experimental researchers have shown resource depletion with performance on subsequent tasks (e.g., Baumeister et al., 1998). Another approach that has traditionally not been used to study emotion regulation is the concurrent-task approach used in cognitive psychology.¹ In this approach, the participant performs the primary task (i.e., emotion regulation), while simultaneously performing a secondary task. The assumption is that the response time to complete the secondary task suggests the extent to which resources were depleted from emotion regulation (see Ruthruff, Pashler, & Klaassen, 2001, for a review and critique of this method). The researcher could manipulate different types of secondary tasks to see what types of resources are being most used by emotion regulation (e.g., attention, persistence, energy). One suggestive study showed that when participants interacted with a hostile confederate, the requirement to regulate emotions decreased performance on mathematic functions performed concurrently, compared with participants whose emotion regulation was under personal control (Sideman & Grandey, 2003). The impact of emotion regulation on concurrent versus subsequent tasks, and the types of resources that might be differentially depleted during versus after regulation, needs more attention in future research.

Finally, we focused on faking and suppression of emotional expressions, but there are other forms of emotion regulation that need examination to support the utility of the resource allocation model for understanding emotion regulation. Researchers have shown that amplifying or exaggerating positive emotions at work can have a positive effect on job satisfaction (e.g., Côté & Morgan, 2002); based on the ideas of personal control, these positive effects should be less likely when behaviors are coerced. Examining whether this effect occurs because of an increase in personal resources or because of other effects such as cognitive dissonance and overjustification (Festinger & Carlsmith, 1959) or facial feedback (Soussignan, 2002) would be an interesting and important contribution. Furthermore, we did not examine the effect of antecedent-focused emotion regulation, or deep acting, which has typically not had a significant relationship with strain. It may be that the effect of modifying felt emotions on strain depends on personal control (e.g., whether one is working in a setting that has strong feeling rules; Hochshchild, 1983) or perhaps on different mechanisms such as one's skill at regulating emotions. Experimental or in vivo research is especially needed to discern between

¹ Alicia A. Grandey thanks an anonymous reviewer and her colleague Rich Carlson for their insights on this topic.

the types of regulation and whether the boundary conditions differ for each.

Practical Implications

With the current global economy, cultural differences in work emotions are important to understand. Emotional displays of customer-contact employees are controlled in the United States directly through formal organizational policies as well as norms communicated and monitored by customers and coworkers (Rafaeli & Sutton, 1987; Van Maanen & Kunda, 1989). In our findings, employees in the U.S. "Mickey Mouse culture" (Hallowell et al., 2002, p. 19) had higher overall mean levels of job burnout and a somewhat stronger relationship between emotion regulation and job dissatisfaction than their counterparts in a less controlling service culture. Management in the United States needs to consider the costs and benefits of the explicit emotional demands on customer-contact personnel. Furthermore, as companies outsource their service functions overseas and export companies to other countries, managers need to be aware of the potential strain on employees (and negative reactions from local customers) if they require emotional displays that are incongruent with cultural norms. Case studies similarly confirm that emotion norms need to be carefully communicated and justified as part of the organizational culture in such situations (Hallowell et al., 2002).

Employees who frequently engage in response-focused emotion regulation with customers and have low job autonomy are at risk for burnout. Burnout, particularly emotional exhaustion, is associated with lower performance, higher absences, and turnover (Grandey, Dickter, & Sin, 2004; Lee & Ashforth, 1996; Wright & Cropanzano, 1998). Identifying employees' typical frequency of emotion regulation and the emotional events that invoke such regulation would allow for targeted interventions. Our results suggest that if managers in the United States and France were to enhance employees' perceptions of job autonomy the reduction in burnout would be notable. Perceptions of autonomy are only moderately related to objective autonomy (Spector & Jex, 1991); in our study, even the perceptions of autonomy among lower status service workers buffered strain. Management can help employees perceive that they have control over their behavior even if major structural or policy changes are not possible. For example, managers should avoid overt attempts to control employees' displays through promotions (e.g., buttons that read "If I do not smile you get this dollar!"; Hochschild, 1983), overly specific display expectations (e.g., maintain 3 s of eye contact with customers; Curtis, 1998), and rigid rules about necessary behaviors (e.g., 3-min bathroom breaks; Grandey et al., 2004). Allowing employees to feel more autonomy over their work behaviors provides personal resources so that "service with a smile" can be less stressful.

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