Test of a Model Linking Employee Positive Moods and Task Performance

Wei-Chi Tsai  
National Chengchi University

Chien-Cheng Chen  
National Taipei University of Technology

Hui-Lu Liu  
Charlotte Costume Jewellery Design Workshop

Past empirical evidence has demonstrated that employees’ positive mood states predict task performance. This study extends previous research by proposing and testing a model that examines mediating processes underlying the relationship between employee positive moods and task performance. Two longitudinal studies used data collected from 306 (Study 1) and 263 (Study 2) insurance sales agents in Taiwan. The results showed that employee positive moods predicted task performance indirectly through both interpersonal (helping other coworkers and coworker helping and support) and motivational (self-efficacy and task persistence) processes.

Keywords: positive moods, task performance, interpersonal helping, work motivation

The issue of mood states at work has gained increasing attention from organizational scholars (e.g., Fisher, 2002; George & Brief, 1996; George & Zhou, 2002; Rhoades, Arnold, & Jay, 2001). Scholars have come to see the importance of this variable (Brief & Weiss, 2002) and have connected it to key organizational outcome variables, such as employee task performance (e.g., Totterdell, 1999, 2000). Employee mood states can be broadly categorized into positive and negative moods (Watson & Tellegen, 1985). The present study focuses on positive moods, not negative moods, for two reasons: First, positive moods have been found to be associated with daily events, such as social activities (Watson, 1988). Given the social nature of the job examined in the present study (i.e., insurance sales), positive moods may be particularly relevant for task performance (George, 1989). Second, in the research literature, the effects of positive and negative moods have not always been found to be parallel or symmetrical (Isen, 1999), which indicates that negative moods may not necessarily predict employee task performance through our proposed mediators (introduced later) as positive moods do. Thus, a full investigation of the effects of negative moods is beyond the scope of this article.

Past studies have generally demonstrated that positive moods can enhance employee task performance (Erez & Isen, 2002; Totterdell, 1999, 2000). However, we do not yet fully understand the intricacies embedded within the mechanisms. Furthermore, we have yet to precisely model the process by which positive moods lead to individual work outcomes in organizational settings (Brief & Weiss, 2002). Using a diverse sample including office workers and retail clerks, Fisher (2002) showed that positive moods predicted employees’ displays of helping behaviors toward coworkers and customers. George (1991) conducted a study on salespeople of a large retail store and found that employees with higher positive moods were more likely to provide assistance to their coworkers and customers; the assistance provided to customers, in turn, helped to boost the store’s sales, as observed a month later. Taken together, findings from these studies seem to imply that positive moods can predict employee task performance through interpersonal processes.

The present study is designed to address several gaps in the literature. For example, the works of George (1991) and Fisher (2002) have implications for the important role of helping behavior in the mood–performance linkage. However, the focus of their research was mainly on employees’ helping behaviors toward others. This study therefore takes a closer look at helping behaviors by differentiating helping other coworkers from coworker helping and support (i.e., the extent to which employees receive help and support from their coworkers). Moreover, we examine these two variables in a longitudinal context. This allows us to examine the interpersonal interaction among employees over time. Finally, in addition to interpersonal mediators, this study examines motivational mediating variables, including self-efficacy and task persistence. It has been argued that “understandings of work motivation that fail to consider human emotion are incomplete” (Seo, Feldman Barrett, & Bartuneck, 2004, p. 424). Although preliminary empirical evidence linking employee positive moods and motivational variables has begun to accumulate (e.g., Erez & Isen, 2002), the present study, according to our knowledge, represents one of the first attempts to empirically test the interpersonal and motivational mediating processes simultaneously in one research design.
This has the advantage of testing the whole model at once and accounting for all other effects of the variables. The theoretical model is presented in Figure 1.

Theory and Hypotheses

Past research has generally found that people with higher positive moods tend to have better task performance. For example, Eisenberger, Armeli, Rexwinkel, Lynch, and Rhoades (2001) found a positive relationship between post office workers’ positive moods and in-role performance, as rated by supervisors. An experimental study by Hirt, Melton, McDonald, and Harackiewicz (1996) asked study participants to list similarities and differences between pairs of television shows until they no longer enjoyed the task. The results showed that happy participants performed significantly better on the task than did those participants with a sad or neutral mood. With a within-subject design, Totterdell (1999, 2000) recorded professional cricket players’ moods and performance using a pocket computer at different points in time over 4 days. He found that positive moods helped improve professional players’ self-rated performance as well as objective performance (e.g., the average number of runs a batter scored). Moreover, Thoresen, Kaplan, Barsky, Warren, and de Chermont (2003) metaanalyzed the relationship between individuals’ positive mood states and perceptions of personal accomplishments and found an uncorrected correlation of .43. In the following section, we introduce the proposed mechanisms linking employee positive moods and task performance.

Positive Moods → Helping Other Coworkers → Coworker Helping and Support

Positive moods have been found to enhance the displays of helping behavior (e.g., George, 1991). There are three possible reasons behind this finding. First, employees with positive moods are likely to recall more positive memories of their interactions with coworkers and thus to provide more helping behaviors (Ison, Shalker, Clark, & Karp, 1978). Second, employees with positive moods are more easily attracted to their coworkers (Bell, 1978), which increases the frequency of assistance they provide to them. Finally, people with positive moods consciously strive to maintain their positive feelings; they are more likely to help others to maintain their positive mood, particularly when the helping is pleasant in nature (Carlson, Charlin, & Miller, 1988).

Past empirical research has generally found positive moods to be helpful in bringing about more helping behaviors (e.g., Eisenberger et al., 2001; George, 1991; Ison, Clark, & Schwartz, 1976; Ison & Levin, 1972). For example, a field study by Eisenberger et al. (2001) showed that employees with higher positive moods were more likely to display helping behaviors (toward both coworkers and supervisors). An experiment by Ison and Levin (1972, Study 2) also demonstrated a positive effect of positive moods on interpersonal helping. Before the experiment began, researchers manipulated the mood of the customers by placing a coin in the coin-return slot of the public phone that the customers were using. After each customer finished the call, the research confederate intentionally walked in front of the customer and dropped a file to observe whether the customer was willing to help pick it up. Results showed that, when compared with people in neutral moods (i.e., no extra coins in the public phone), customers in positive moods were more likely to help people in their surroundings. It should be noted that some past research (e.g., Ison & Levin, 1972; Ison & Simmonds, 1978) has demonstrated that people in positive moods were more likely to help others only if this help would not harm their moods. However, findings from one recent meta-analysis (Lyubomirsky, King, & Diener, 2005) based on 17 experimental studies showed an uncorrected correlation of .37 between positive moods and interpersonal helping, which indicates that positive moods are generally helpful in facilitating helping behaviors.

Past research has indicated that people who received substantial help and support from their coworkers tend, in turn, to provide equivalent help (Bateman & Organ, 1983). This may be explained by the social exchange perspective (Blau, 1964). First, because of the functioning of the norm of reciprocity (Gouldner, 1960), there may be a sense of indebtedness to the coworkers who provided the help, which brings about an obligation to return the favor to reduce this sense of indebtedness (Greenberg, 1980). Second, the recipient’s reciprocal behavior may be motivated by his or her desire to

Figure 1. Hypotheses and path coefficients for the proposed model (Model 1). Standardized path coefficients are in parentheses. *p < .05. **p < .01.
receive future benefits from the help provider. Deckop, Cirka, and Anderson (2003) conducted a cross-sectional study and found that when employees perceived that they received a higher level of assistance from their coworkers, they demonstrated more helping behaviors toward their coworkers as well. In other words, when people provided more assistance to their coworkers, they were more likely to receive help in return (Vos, Buyens, & Schalk, 2003). Thus, the following is proposed:

**Hypothesis 1:** Helping other coworkers mediates the relationship between positive moods and coworker helping and support.

**Helping Other Coworkers → Coworker Helping and Support → Task Performance**

In keeping with Hypothesis 1, helping other coworkers may influence task performance through coworker helping and support. One form of coworker helping and support is instrumental support, defined as “tangible assistance such as physical assistance or aid in the form of advice or knowledge needed to complete a task” (Fenlason & Beehr, 1994, p. 158). Past research has indicated that such tangible assistance from coworkers reduces the obstacles employees face in carrying out their work and thus makes them more effective and improves their task performance (Van Scotter & Motowidlo, 1996). Podsakoff and MacKenzie (1997) also noted that employees become more productive when their coworkers help them learn necessary job skills.

Emotional support (i.e., the actions of caring and providing encouragement to another person) represents another form of coworker helping and support. It has been suggested that coworker emotional support helps provide employees with opportunities for reassessment and adaptive responses to work stress (Kahn, Schneider, Jenkins-Henkelman, & Moyle, 2006) and allows them to recover from frustration at work, which reduces job burnout (Zellers & Perrew, 2001). This raises employees’ ability to take control over their work environment and maintain their available energy. Consequently, employees should be able to put greater effort into their work (Bakker, Demerouti, & Verbeke, 2004), thereby improving task performance.

There is some empirical evidence supporting the linkage between coworker helping and support, on the one hand, and task performance, on the other. Deckop et al. (2003), for example, found that employees who received more help from their coworkers were rated higher by supervisors for their in-role performance. In addition, a study on book salespersons by Beehr, Jex, Stacy, and Murray (2000) showed that employees produced higher book sales when they received more social support from their coworkers. Thus, the following is proposed:

**Hypothesis 2:** Coworker helping and support mediates the relationship between helping other coworkers and task performance.

**Positive Moods → Self-Efficacy → Task Persistence**

Findings from a number of experimental studies have provided some support for the existence of a positive association between people’s positive moods and task persistence. For example, in Erez and Isen’s (2002) study, participants were told before the experiment that they could withdraw at any time if they no longer wished to participate. Results showed that participants with positive moods continued longer into the experiment than did those with neutral moods. Martin, Ward, Achee, and Wyer (1993) asked college students to list the names of all the birds they could remember under no time limits, until they no longer enjoyed the task. The results showed that students with higher positive moods stayed at the task for a longer period of time.

One possible mediating mechanism linking positive moods and task persistence is self-efficacy. This has been defined as a personal judgment as to “how well one can execute courses of action required to deal with prospective situations” (Bandura, 1982, p. 122). People with good moods more easily recall the outstanding performance they once had (i.e., mood congruent memory effects; Bower, 1981). Furthermore, there is a tendency for them to use their positive mood as a piece of information to positively influence how they feel about their past performance (i.e., mood as information effects; Schwarz & Clore, 1988). This raises their expectations about their ability to complete tasks in the future and thus increases self-efficacy (Gist & Mitchell, 1992). An experimental study by Wright and Mischel (1982) manipulated the participants’ moods with audiotapes and found that, in comparison with neutral and negative mood conditions, positive moods increased people’s expectations of future performance, caused an overestimation of their past accomplishments, and produced more positive self-descriptions. Kavanagh and Bower (1985) manipulated participants’ moods by asking them to reminisce about the past. Results showed that participants with positive moods generated higher self-efficacy than those with negative or neutral moods.

Task persistence has been defined as the extent to which a person maintains the initially chosen behavior or duration of action (Seo et al., 2004). Scholars have pointed out that employees with higher self-efficacy set more difficult goals and, subsequently, display greater persistence in accomplishing them (Gist & Mitchell, 1992). An empirical study by Paglis and Green (2002) found that there was a positive correlation between leadership self-efficacy (i.e., managers’ judgment about the possibility of exerting leadership successfully) and the extent to which managers engaged in behaviors such as persisting in efforts aimed at improving unit effectiveness and pushing for changes within the unit. Similarly, Multon, Brown, and Lent’s (1991) meta-analytic study showed that the mean uncorrected correlation between student self-efficacy and various academic persistence measures (e.g., time spent on the task) was modestly positive ($r = .34, p < .05$). Thus, the following is proposed:

**Hypothesis 3:** Self-efficacy mediates the relationship between positive moods and task persistence.

**Self-Efficacy → Task Persistence → Task Performance**

Past research has confirmed the positive relationship between self-efficacy and task performance (e.g., Wood, Bandura, & Bailey, 1990). Stajkovic and Luthans’s (1998) meta-analysis showed a modest positive correlation between self-efficacy and task performance ($r = .38$ after correction for attenuation). Another meta-analysis, by Moritz, Feltz, Fahrbach, and Mack (2000),
examined the relationship between self-efficacy and sports performance. In this study, self-efficacy was found to correlate positively with various performance indicators (uncorrected \( r = .34, .47, \) and \( .44 \) for objective, subjective, and self-rated performance measures, respectively).

In keeping with Hypothesis 3, self-efficacy may improve task performance through increasing task persistence. Locke and Kristof (1996) pointed out that when people display a higher level of task persistence, the gap between current performance and an individual’s own standard gradually decreases, until the performance actually meets the goal. Van Scotter and Motowidlo (1996) also argued that job dedication (a construct similar to task persistence) can prompt employees to work diligently and search for effective ways to solve problems they run into at work, thus improving task performance. Van Scotter and Motowidlo’s study on U.S. Air Force technicians found a positive correlation \( (r = .48, p < .01) \) between employees’ self-rated job dedication and task performance as rated by their supervisors. Aryee, Chen, and Buds war (2004) examined employees of a newspaper institution in India and found a positive correlation \( (r = .66, p < .01) \) between the employees’ job dedication (e.g., persistence in overcoming obstacles to complete a task) and supervisor-rated task performance. In addition, in an experiment by Hirt et al. (1996) in which participants were asked to compare the differences between two television shows, the researchers found a positive correlation \( (r = .31, p < .01) \) between the length of time the participants spent comparing and the number of answers they gave. Thus, the following is proposed:

\[ \text{Hypothesis 4: Task persistence mediates the relationship between self-efficacy and task performance.} \]

Coworker Helping and Support \( \rightarrow \) Task Persistence

In this study, we do not treat the interpersonal and motivational mediation processes as totally independent. There are two reasons for our assertion that there may be a positive relationship between two of the mediating variables (i.e., coworker helping and support and task persistence). First, past research has demonstrated that the work environment becomes more pleasant and satisfying when coworkers provide sufficient instrumental aid or emotional support. In this case, employees perceive higher job satisfaction (Schaubroeck & Fink, 1998) and raise their psychological identification with the present job (Brooke & Price, 1989), which, in turn, produces greater task persistence. Second, employees with higher coworker support are more likely to increase their direct attachment to their coworkers and, through them, their indirect attachment to the organization (Mossholder, Settoon, & Henegan, 2005). This feeling of attachment toward their organization encourages employees to demonstrate a greater willingness to contribute to their organization by displaying a higher level of effort or persistence in tasks (Meyer, Becker, & Vandenberghe, 2004). An empirical study by Bakker, Demerouti, and Schaufeli (2005) showed that employees who received more help from their coworkers displayed a higher level of vigor at work (i.e., they persisted even when things were not going well), thereby providing initial support for the positive association between coworker helping and support and task persistence. Thus, the following is proposed:

\[ \text{Hypothesis 5: Coworker helping and support is positively related to task persistence.} \]

The Present Model

In contrast to previous research, in which data on employee mood states and work outcomes were generally collected at one single point in time (e.g., George & Zhou, 2002; Madjar, Oldham, & Pratt, 2002), our data were collected longitudinally. This was done in part to test whether positive mood as a state can produce a lasting effect on employee task performance. Why can positive moods be expected to influence performance several weeks later? Diamond and Aspinwall (2003) claimed that positive affective states may enhance effective coping, such as the investigation of alternative behavioral approaches or the facilitation of positive reinterpretation and reframing of one’s problems. Strategies such as these may lead to better overall adjustment over time to various stressful events and, as a result, to higher task performance.

Fredrickson’s (2001) broaden-and-build theory is also useful in explaining why the relationship may hold. She argued that a positive mood state broadens people’s thought–action repertoires, which, in turn, function as personal resources or reserves to be drawn on for future use. For example, a variety of resources can be built by joy and playfulness. Consider adults enjoying a basketball game in the gym. Their immediate motivation may be simply hedonic—to enjoy the moment—but they are developing physical (e.g., coordination), intellectual (e.g., problem-solving skills), psychological (e.g., optimism), and social resources (e.g., friendships and social support networks) simultaneously. Although the present model is not meant to test Diamond and Aspinwall’s (2003) or Fredrickson’s models, the mediating variables examined in the present study (e.g., coworker helping and support, self-efficacy) can perhaps be considered as forms of personal resources (i.e., social and psychological resources, respectively, in Fredrickson’s terms) that have accrued during positive mood states. Employees can then draw on these resources to produce subsequent high task performance. In sum, the present research involves two studies. Study 1 was conducted to test the hypotheses derived from our theoretical model, while Study 2 was intended to address the methodological concern about the model’s lack of dispositional affect variables as controls.

Study 1

Method

Participants

Participants in this study consisted of 306 sales agents and their immediate supervisors from five insurance companies in Taiwan. Eighty-two of the sales agents (26.8%) were male. Their mean age was 37.8 years, and the mean job tenure was 5.10 years. On average, 1 supervisor assessed the task performance of 2.74 sales agents in this study.

In a review article, Isen and Baron (1991) noted that positive moods are helpful in enhancing task performance when the tasks require both flexibility and taking a proactive problem-solving approach in negotiation. Therefore, we chose insurance sales agents as the participants in the present study. According to the U.S. Occupational Information Network database, insurance sales
agents’ work activities can be characterized as follows: collecting extensive information to meet customers’ diverse needs, analyzing information and evaluating results to solve problems and to choose the best solution, and establishing and maintaining good interpersonal relations with customers. These activities seem to require a large degree of flexibility and problem solving on the part of insurance sales agents.

Procedure

In this study, we measured constructs with different sources (e.g., sales agents rated their own positive moods, and supervisors rated sales agents’ task performance) to reduce the possibility of same-source bias. We first obtained permission and support from the firm’s management for data collection. We then distributed and collected the questionnaires in the insurance agents’ daily meetings. During this process, all participants were guaranteed confidentiality. Table 1 shows the details for the measurement design of this study. As indicated in Table 1, a longitudinal design was used. At Time 1 (T1), sales agents were asked to recall and evaluate their positive moods, self-efficacy, and helping behaviors directed at their coworkers over the previous week. Three weeks later (T2), a second questionnaire was administered. On the basis of the employee questionnaires obtained at T1, the immediate supervisors of the employees were identified and asked to evaluate the participants’ task performance. At the same time, employees who had completed the first-wave questionnaire were asked to rate their task persistence, the help and support received from their coworkers, and their level of goal attainment over the previous month. Those cases without complete matched data across the two time points and those sales agents whose job tenure was less than 6 months were removed from the study. As a result, we had a final usable sample of 306 sales agents, and this represented a valid return rate of 64.9%.

The issue of choosing an appropriate time lag between the measurements of positive moods and task performance should be noted. In Staw, Sutton, and Pelled’s (1994) research, an 18-month time lag existed between the period when the positive mood was measured and the time performance was assessed. However, an individual’s moods, by definition, produce shorter term effects (Watson, Clark, & Tellegen, 1988). Therefore, it is somewhat problematic to attribute task performance to employees’ positive mood states 18 months earlier. In fact, Staw et al. (1994) noted in their study that they might have measured positive moods as a trait (e.g., optimism) rather than as a state. Alternatively, George (1991) explored the influence of salesclerks’ positive moods on sales performance as observed a month later; consequently, the short-lasting nature of moods could be better grasped. Furthermore, Wright and Staw (1999) argued that there must be an overlap in the time when moods and performance are measured if one is to conclude that the between-subjects variations in performance are caused by moods. Thus, in this study, we took care to place a 3-week gap between the measurements of positive moods and task performance while ensuring a 1-week overlap between the two.

Measures

This study used scales that have been used previously in studies of English speakers. All scale items were translated into Chinese and back-translated by two bilingual (English–Chinese) speakers to ensure semantic equivalence. Lee, Jones, Mineyama, and Zhang (2002) showed that Chinese participants were more likely than were their North American counterparts to use the midpoint on a Likert scale. This may be due to the fact that people with a more collectivist orientation are more likely to respond on the basis of group norms. Following the approach adopted by Hui, Lee, and Rousseau (2004), who also conducted their research with a Chinese sample, we dropped the midpoint option to reduce the influences of such response biases. Thus, unless otherwise noted, all variables were measured with a 4-point Likert scale with the following anchors: 1 = strongly disagree, 2 = somewhat disagree, 3 = somewhat agree, and 4 = strongly agree.

Positive moods. Ten positive affect terms (e.g., excited, enthusiastic) from the Positive and Negative Affect Schedule (Watson et al., 1988) were used to measure this construct. As some researchers (e.g., Larsen & Diener, 1992; Wright & Staw, 1999) have argued that the Positive and Negative Affect Schedule does not fully capture the hedonic aspects of individuals’ moods, we followed Watson and Clark’s (1997) suggestion by adding four terms that represent hedonic components: cheerful, delighted, happy, and joyful. The results of a principal-axis-factoring exploratory factor analysis of this 14-item measure suggested a one-factor solution that explained 53.4% of the variance, with all item loadings over .60. The Cronbach’s alpha was .94.

It has been argued that people’s mood states may last for a few days or even weeks (Larsen, 2000; Watson, 2000). Thus, when measuring moods, we followed the time frame adopted by George (1991) and Madjar et al. (2002) by asking sales agents to indicate the extent to which each of the terms described how they had felt “during the past week” on a 4-point Likert scale ranging from 1 to 4.

Table 1

Measurement Design for Study 1

<table>
<thead>
<tr>
<th>Variable</th>
<th>Time 1</th>
<th>Time 2</th>
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<tbody>
<tr>
<td>Positive moods</td>
<td>X</td>
<td></td>
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<tr>
<td>Helping other coworkers</td>
<td></td>
<td>X</td>
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<tr>
<td>Coworker helping/support</td>
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<tr>
<td>Self-efficacy</td>
<td>X</td>
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<tr>
<td>Task persistence</td>
<td></td>
<td>X</td>
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<tr>
<td>Self-rated goal attainment</td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Supervisor rating</td>
<td></td>
<td>X</td>
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</tbody>
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Note. Data were collected at two time periods: Time 1 (initial) and Time 2 (3 weeks after Time 1).

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1 Those sales agents were still in the stage of learning company products and selling skills and, as a result, would uniformly produce poor performance. As the restriction of range on employee task performance may reduce the statistical power needed for testing the hypotheses (Schmidt, Hunter, & Urry, 1976), we decided to drop those cases.

2 However, C. Chen, Lee, and Stevenson (1995) showed that their research findings remained similar regardless of whether the midpoint option was retained or dropped, which indicates that controlling the participants’ response styles, as we have done in the present research, may only exert a very small influence on the research findings.
We acknowledge that there may be memory biases involved when people are asked to report their moods retrospectively. However, Parkinson, Briner, Reynolds, and Totterdell (1995) showed that, for most of their study participants, mood ratings for the whole previous week were quite close to the average daily mood ratings, providing some support for the validity of such a 1-week retrospective measure. This 1-week time frame, although appropriate to measure positive mood states (Thoresen et al., 2003), might have captured the participants’ mid-range mood states, which fall between mood at the moment and traits in stability (George & Zhou, 2002).

Helping other coworkers. Although the salary of insurance sales agents in Taiwan is primarily based on individual sales, employee helping behaviors directed toward coworkers are generally encouraged. Specific forms of helping behaviors may include sharing experiences with coworkers during daily meetings, helping coworkers complete relevant administrative paperwork, and helping orient new coworkers. Sales agents were asked to rate their altruistic behaviors toward their coworkers “over the last week” with three items from Coleman and Borman (2000; i.e., “I helped other organization members,” “I cooperated with other organization members,” and “I assisted coworkers with personal matters”). In addition, we included one item from Organ and Konovsky (1989): “I oriented new people even though it was not required.” The Cronbach’s alpha for this item was .88.

Coworker helping and support. Four items from Podsakoff, Ahearne, and MacKenzie (1997) were used to measure the extent to which employees received help and support from their coworkers over the past month. Sample items included “My colleagues helped me out if I fell behind in my work” and “My colleagues provided me with encouragement when I was down.” The Cronbach’s alpha for this measure was .86.

Self-efficacy. Riggs, Warka, Babasa, Betancourt, and Hooker’s (1994) 10-item scale was used to measure an employee’s task-specific efficacy. Since in this study self-efficacy was considered as a state affected by an individual’s positive moods, it was necessary to provide a time frame for the participants to refer to when completing the self-efficacy measure. As a result, we asked sales agents to assess retrospectively their general belief about the extent to which they could complete their task assignments “over the last week.” Sample items of this measure included “I had confidence in my ability to do my job,” “I doubted my ability to do my job” (reverse scored), and “I had been very proud of my job skills and abilities.” The Cronbach’s alpha for this measure was .81. Although self-efficacy has commonly been administered to assess the current state of the individuals, evidence has shown that scores from a retrospective measure of people’s self-concept (a similar construct to self-efficacy, as noted by Townsend & Wilton, 2003) in performing particular tasks are not significantly different from scores of a “current” measure (Townsend & Wilton, 2003).

Task persistence. Sales agents rated their own task persistence “over the past month” with two items adopted from Van Scotter and Motowidlo (1996; e.g., “I persisted in overcoming obstacles to complete a task”) and one item constructed for this study (i.e., “When facing a difficult task, I made every effort to complete it”). The Cronbach’s alpha was .86 in this study.

Task performance. Past research has suggested that using multiple indicators to measure task performance not only better captures the construct of task performance (Borman, 1997) but provides a more convincing test of the effects of positive moods (Lucas & Diener, 2003). Thus, we included sales agents’ self-rated achievement of their own sales quota goals and the immediate supervisor’s subjective ratings as two indicators of employee task performance.

Sales agents were asked to report their levels of goal achievement (in percentages) “for the past month.” In this study, 17 sales agents performed better than their goals, and in those cases their scores were higher than 100%. The 1-month time frame was chosen because it is a routine practice for insurance companies in Taiwan to compute individual sales performance on a monthly basis. As such, both sales agents and immediate supervisors in our study were able to assess the sales agents’ task performance using a common time frame.

In addition, supervisors were asked to evaluate the sales agents’ task performance “over the past month.” Supervisors in the present study were knowledgeable about the daily performance of their subordinates, as they generally supervised fewer than 10 employees and there was a daily meeting between the two. The supervisor rating measure included eight items adopted from Wayne and Liden (1995) and Wayne, Liden, Graf, and Ferris (1997). Sample items included “I think this employee has been effectively fulfilling his or her roles and responsibilities” and “In my estimation, this employee has gotten his or her work done very effectively.” The Cronbach’s alpha for this measure was .92.

Control variables. We included employee job tenure (in years) as a control variable. Quinones, Ford, and Teachout’s (1995) meta-analysis showed that the corrected correlation between work experience (a time-based measure) and employee job performance was .27 (95% confidence interval = .25–.28). This positive correlation may be explained by the fact that employees gain more job-relevant knowledge and skills as a result of longer job tenure, which thus leads to higher task performance (Schmidt, Hunter, & Outerbridge, 1986).

In addition, as in this study there were multiple data points that were linked to the same supervisor, the statistical assumption of independent observations underlying traditional ordinary least squares regressions might be violated (Kenny & LaVoie, 1985), and this would have resulted in biased estimates of the relationships between variables. Therefore, we included the number of rates (LaHuis & Avis, 2007) to provide some control for the supervisor effect. We argue that supervisors with many rates may not have the time and energy needed to provide discriminat-
ing ratings. As supervisors typically attach greater weight to negative information about subordinates (McIntyre & James, 1995), this difficulty in making fine discriminations may lead supervisors with many ratees to be harsher than supervisors with few ratees, which would lead to less favorable supervisor performance evaluations.

Analyses

We assessed the proposed model with maximum likelihood estimation using LISREL 8 (Jöreskog & Sörbom, 1993). All subsequent analyses were based on the covariance matrix. In this model, we used scale scores as single indicators of the respective constructs and corrected for measurement error by fixing the paths from the latent factors to the indicators and error variances using the internal consistency reliabilities and variances of the measures (see G. Chen & Klimoski, 2003). However, we used two indicators (i.e., self-rated goal attainment and supervisory rating) to represent the construct of task performance.

Results and Discussion

Table 2 shows the correlations and descriptive statistics for the study variables. Because we made no prediction as to whether the relationships in the model were partial or full mediation, we tested two competing models: a fully mediated model (Model 1, shown in Figure 1) and a partially mediated model (Model 2). The partially mediated model differed from Model 1 in two direct paths from positive moods to both coworker helping and support and task persistence. In addition, it specified two direct paths, from both helping other coworkers and self-efficacy to task performance. Results showed that the partially mediated model, \( \chi^2(18, N = 306) = 62.32 \) (goodness-of-fit index [GFI] = .96; comparative fit index [CFI] = .94; incremental fit index [IFI] = .95; root-mean-square residual [RMSR] = .047) had a better fit, \( \Delta \chi^2(4, N = 306) = 45.10, p < .01 \), than did the fully mediated model, \( \chi^2(22, N = 306) = 107.42 \) (GFI = .93; CFI = .87; IFI = .88; RMSR = .054). Therefore, we retained Model 2 as the preferable model. Because in Model 2 the direct link between helping other coworkers and task performance was not statistically significant (\( \beta = .02, p > .05 \)), we then compared this model with a model excluding the path running from helping other coworkers to task performance (Model 3). Results showed that the two models were not significantly different from one another (\( \Delta \chi^2 = 0.09, p > .05 \)). Therefore, we retained the more parsimonious model (Model 3) as the final model and used it to examine our hypotheses. Model 3 fit the data well, \( \chi^2(19, N = 306) = 62.23 \) (GFI = .96; CFI = .95; IFI = .95; RMSR = .047). All standardized path coefficients, shown in Figure 2, were statistically significant (either at \( p < .01 \) or at \( p < .05 \)) and in the predicted directions. Specifically, the path running from coworker helping and support to task persistence was statistically significant (\( \beta = .20, p < .01 \)), offering support for Hypothesis 5. With respect to the control variables, employee job tenure was significantly related to task performance (\( \gamma = .30, p < .01 \)); the link between number of ratees and task performance did not reach the traditional significance level (\( \gamma = .11, p = .06 \)).

To test Hypotheses 1–4, we examined the significance of each hypothesized indirect relationship with the \( z \) method, as recommended by MacKinnon, Lockwood, Hoffman, West, and Sheets (2002). Results showed that positive moods had a significant indirect association, via helping other coworkers, with coworker helping and support (\( z^* = 3.88, p < .01 \)) and helping other coworkers had a significant indirect association, via coworker helping and support, with task performance (\( z^* = 3.32, p < .01 \)). In addition, positive moods had a significant indirect association, via self-efficacy, with task persistence (\( z^* = 1.80, p < .05 \)), which offers support for both Hypotheses 1 and 2. In addition, positive moods had a significant indirect association, via self-efficacy, with task persistence (\( z^* = 3.20, p < .01 \)), which offers support for both Hypotheses 3 and 4.

Study 2

In this article, we claim that positive mood as a state can produce a lasting effect on employee task performance. As state affect and trait affect have been shown to correlate with one another, it is possible that the observed effects in Study 1 were actually caused by employee trait affect rather than by state affect. Although the unique influence of state affect on employee outcomes beyond that of trait affect has already been documented in the literature (e.g., Judge & Ilies, 2004; Rhoades et al., 2001; Weiss, Nicholas, & Daus, 1999), it seemed worthwhile to conduct a second study that would control for the effect of employee affective personality to rule out alternative explanations. As it has been argued that the personality trait of extraversion broadly

### Table 2

<table>
<thead>
<tr>
<th>Variable</th>
<th>M</th>
<th>SD</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>8</th>
<th>9</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Employee job tenure</td>
<td>5.10</td>
<td>4.47</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. No. ratees</td>
<td>2.74</td>
<td>1.49</td>
<td>.14*</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Positive moods</td>
<td>2.89</td>
<td>0.58</td>
<td>.03</td>
<td>.11</td>
<td></td>
<td>.94</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Helping other coworkers</td>
<td>3.65</td>
<td>0.44</td>
<td>-.02</td>
<td>.09</td>
<td></td>
<td>.36**</td>
<td>.88</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Coworker helping/support</td>
<td>3.55</td>
<td>0.46</td>
<td>-.04</td>
<td>.00</td>
<td></td>
<td>.36**</td>
<td>.37**</td>
<td>.88</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Self-efficacy</td>
<td>3.04</td>
<td>0.49</td>
<td>.08</td>
<td>.05</td>
<td></td>
<td>.36**</td>
<td>.31**</td>
<td>.26**</td>
<td>.81</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. Task persistence</td>
<td>3.36</td>
<td>0.57</td>
<td>.10</td>
<td>.03</td>
<td></td>
<td>.47**</td>
<td>.34**</td>
<td>.36**</td>
<td>.39**</td>
<td>.86</td>
<td></td>
</tr>
<tr>
<td>8. Self-rated goal attainment</td>
<td>0.62</td>
<td>0.43</td>
<td>.24**</td>
<td>.14*</td>
<td>.32**</td>
<td>.19**</td>
<td>.15*</td>
<td>.17**</td>
<td>.38**</td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Supervisor rating</td>
<td>3.21</td>
<td>0.65</td>
<td>.25**</td>
<td>.13*</td>
<td>.46**</td>
<td>.21**</td>
<td>.29**</td>
<td>.36**</td>
<td>.39**</td>
<td>.49**</td>
<td>.92</td>
</tr>
</tbody>
</table>

Note. Cronbach’s alphas appear on the diagonal.  
* \( p < .05 \).  
** \( p < .01 \).
reflects individual differences in the propensity to experience positive affect (Larsen & Ketelaar, 1991; Tellegen, 1985), we included extraversion as a control variable when testing the effects of positive moods on employee task performance.5

Method

Participants and Procedure

Data for this study were collected by Wei-Chi Tsai as part of a project examining the effects of personality traits on employee task performance. The data did not include mediating variables, such as those in Study 1, so we focused our examination on the main effects of positive moods on employee task performance and used extraversion as a control. Participants consisted of 263 sales agents and their immediate supervisors from three insurance companies in Taiwan. Ninety-three of the sales agents (35.4%) were male. Their mean age was 37.58 years, and the mean job tenure was 5.14 years. On average, 1 supervisor assessed the task performance of 2.04 sales agents in this study.

The procedure for this study was similar to the one used in Study 1. Of 471 sales agents contacted, 370 (response rate = 78.6%) accepted the invitation and completed the questionnaire about their positive moods, personality trait of extraversion, and personal information at T1. Three weeks later (T2), we collected data on sales agents’ task performance from their immediate supervisors. After deletion of those sales agents whose job tenure was less than 6 months and those cases without matched data across the two time points, we had a final usable sample of 263 sales agents, which yielded a valid return rate of 55.8%. We assessed the potential for respondent biases between those who had complete employee–supervisor data (N = 263) and those who did not have the supervisor data (n = 38). Statistical tests revealed no significant differences in terms of sex, χ²(1, N = 301) = 0.29, p > .05; job tenure, t(299) = 1.16, p > .05; age, t(299) = 0.72, p > .05; positive moods, t(299) = 0.04, p > .05; and extraversion, t(299) = 0.75, p > .05.

Analyses

In this study, employee data were also nested within supervisors, so we adopted hierarchical linear modeling (HLM; Bryk & Raudenbush, 1992), which explicitly takes into account the nested nature of the data. We entered the dependent and independent variables at Level 1. We also included employee job tenure as a control variable, as in Study 1. Moreover, we included two supervisor-level control variables, supervisory experience and number of ratees. Judge and Ferris (1993) argued that less experienced supervisors tend to provide harsher ratings to demonstrate their capabilities to handle supervisory responsibilities. As supervisors gain experience and self-confidence, they see less need to demonstrate their toughness and may, as a result, provide more lenient performance ratings. This construct was assessed with one self-reported item that asked supervisors to indicate the total number of years they had served as a supervisor.

Measures

The measure for positive moods (α = .95) was identical to the one used in Study 1. Extraversion (α = .91) was measured with Goldberg’s (1992) Big Five adjective semantic differential scale. The supervisory ratings of task performance (α = .91) were measured with Turnley, Bolino, Lester, and Bloodgood’s (2003) in-role performance scale (e.g., “This employee adequately completes all of his/her assigned duties”).

In addition, we included employee job tenure as a control variable, as in Study 1. Moreover, we included two supervisor-level control variables, supervisory experience and number of ratees. Judge and Ferris (1993) argued that less experienced supervisors tend to provide harsher ratings to demonstrate their capabilities to handle supervisory responsibilities. As supervisors gain experience and self-confidence, they see less need to demonstrate their toughness and may, as a result, provide more lenient performance ratings. This construct was assessed with one self-reported item that asked supervisors to indicate the total number of years they had served as a supervisor.

Figure 2. Standardized path coefficients for the final model (Model 3). *p < .05. **p < .01.

5 Empirical evidence supporting the appropriateness of treating extraversion as a dispositional affect variable can be found in Watson, Clark, Mclntyre, and Hamaker’s (1992) research, in which they subjected 11 personality scales (e.g., extraversion, positive affective trait, neuroticism, and conscientiousness) to a principal-components factor analysis and found that the extraversion and positive affective trait scales formed one common dimension.
control variable at this level. To control for the supervisor-level (rater) effect, we included supervisory experience and number of ratees at Level 2. For each HLM model estimated (described below), all predictor variables were grand-mean centered.

Results and Discussion

Table 3 shows the correlations and descriptive statistics for the study variables. There were positive correlations between (a) supervisor-rated task performance and (b) extraversion ($r = .15, p < .05$) and positive moods ($r = .16, p < .05$). A preliminary step for HLM began with fitting a null model to estimate the total systematic variance in the dependent variable; this resulted in an intraclass correlation coefficient (ICC1) of .21. Thus, there was a significant amount of variance in task performance that resided between raters (supervisors). We therefore proceeded to perform HLM. Table 4 provides the results from the HLM analyses predicting supervisor-rated task performance. As seen in Model 1, the model accounted for 5.4% of the within-supervisor variance in task performance, and extraversion was positively related to task performance ($\gamma = .14, p < .05$). Model 3 shows that the unique within-supervisor variance explained by the addition of positive mood was 1.9% (7.3% − 5.4%). After we controlled for employee job tenure, affective personality of extraversion, and two rater-level variables, positive mood was shown to be positively related to task performance ($\gamma = .15, p < .05$).

The results of Study 1 showed that positive moods positively predicted task performance. A similar finding was obtained in Study 2. As seen in Model 2 (see Table 4), positive mood was positively related to task performance ($\gamma = .19, p < .01$). In Model 3, the magnitude of the coefficient of positive mood was reduced to .15 when extraversion was introduced to the equation, but it remained statistically significant ($p < .05$). It seems that, taken together, our findings in Study 1 may be partially attributed to the effect of employee affective personality. However, our data in Study 2 provide some support for the contention that mood states may uniquely predict employee task performance at a later point in time.

General Discussion

The present research extends previous studies by empirically examining whether positive moods predict task performance through interpersonal and motivational processes. The results from the two studies show that positive mood states predicted task performance beyond the influence of employee affective personality (Study 2); employees in more positive moods may perform better through interpersonal processes, such as helping other coworkers and coworker helping and support (Study 1). These findings further clarify the interpersonal mechanisms on the relationship between positive moods and individual task performance. George and Jones (1997) introduced a new variable, help-seeking behavior, saying that employees make attempts to seek assistance from their coworkers. They pointed out that helping behaviors in an organization should include reciprocal behaviors between employees and their coworkers. Along this line, the present study demonstrates that, in addition to its relationship with coworker helping and support via helping other coworkers, positive mood was directly associated with coworker helping and support. This finding is important, as most past mood research (e.g., Fisher, "p < .05. **p < .01.

### Table 3

**Means, Standard Deviations, and Correlations Among Variables (Study 2)**

<table>
<thead>
<tr>
<th>Variable</th>
<th>M</th>
<th>SD</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Supervisory experience</td>
<td>6.88</td>
<td>4.73</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>No. ratees</td>
<td>2.04</td>
<td>1.44</td>
<td>.22**</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Employee job tenure</td>
<td>5.14</td>
<td>4.65</td>
<td>.39**</td>
<td>.44**</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Extraversion</td>
<td>3.70</td>
<td>0.71</td>
<td>.00</td>
<td>-.05</td>
<td>.00</td>
<td>.91</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Positive moods</td>
<td>2.77</td>
<td>0.62</td>
<td>.10</td>
<td>-.03</td>
<td>-.05</td>
<td>.53**</td>
<td>.95</td>
<td>.91</td>
</tr>
<tr>
<td>Task performance</td>
<td>3.10</td>
<td>0.67</td>
<td>.04</td>
<td>-.10</td>
<td>.09</td>
<td>.15*</td>
<td>.16*</td>
<td>.91</td>
</tr>
</tbody>
</table>

Note. Cronbach’s alphas appear on the diagonal.

### Table 4

**Hierarchical Linear Modeling Results Predicting Task Performance (Study 2)**

<table>
<thead>
<tr>
<th>Variable</th>
<th>Model 1</th>
<th>Model 2</th>
<th>Model 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ratee level</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Intercept</td>
<td>3.03**</td>
<td>3.03**</td>
<td>3.03**</td>
</tr>
<tr>
<td>Employee job tenure</td>
<td>.02*</td>
<td>.02**</td>
<td>.02*</td>
</tr>
<tr>
<td>Extraversion</td>
<td>.14*</td>
<td>—</td>
<td>.07</td>
</tr>
<tr>
<td>Positive moods</td>
<td>—</td>
<td>.19**</td>
<td>.15*</td>
</tr>
<tr>
<td>Rater level</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Supervisory experience</td>
<td>.00</td>
<td>.00</td>
<td>.00</td>
</tr>
<tr>
<td>No. ratees</td>
<td>-.07*</td>
<td>-.07*</td>
<td>-.07*</td>
</tr>
<tr>
<td>$R^2_{within}$</td>
<td>.054</td>
<td>.077</td>
<td>.073</td>
</tr>
<tr>
<td>$R^2_{between}$</td>
<td>.017</td>
<td>.017</td>
<td>.017</td>
</tr>
<tr>
<td>$R^2_{total}$</td>
<td>.046</td>
<td>.065</td>
<td>.062</td>
</tr>
</tbody>
</table>

Note. The entries in the table are hierarchical linear modeling coefficients.

$R^2_{total} = R^2_{within} \times (1 - ICC1) + R^2_{between} \times ICC1.$

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

6 To make the finding in Study 1 more comparable to that in Study 2, we also performed HLM to test the effects of employee positive moods on task performance. When conducting HLM, we entered the dependent variable (a composite score with equal weighting given to our two indicators of task performance), employee job tenure (control variable), and the independent variable (employee positive moods) at Level 1. We also included the number of ratees at Level 2. The result showed that positive mood was positively related to task performance ($\gamma = .65, p < .01$).
has linked positive mood to people’s helping behaviors toward others; our research suggests that positive moods may also have a direct association with coworker helping and support. This direct relationship might be caused by the fact that individuals in positive moods often use certain cues (e.g., smiling) to draw coworkers into interaction (Coyne, 1976) and make coworkers believe that helping the person in a positive mood will increase their own happiness (Staw et al., 1994). This belief causes coworkers to provide more assistance. Furthermore, as positive moods can be contagious (Barsade, 2002), coworkers may be more likely to respond to requests for assistance to maintain the existing pleasant atmosphere (Drachman, DeCarufel, & Insko, 1978).

In addition, we found that the linkage between helping other coworkers and task performance was indirect, through coworkers’ reciprocal helping and support. This indicates that an employee’s helping behavior toward coworkers remains an important antecedent to his or her task performance. George (1991) examined retail salesclerks’ helping behaviors toward coworkers, supervisors, and customers and found that only the latter variable was shown to be positively related to the participant’s subsequent sales, a result that is inconsistent with the present finding. However, it should be noted that the job characteristics for retail salesclerks (i.e., selling clothing and household goods) are not exactly the same as those for the insurance sales agents in this study. The difference lies in the fact that good performance for retail salesclerks can primarily be achieved through their own effort, while good performance for insurance sales agents relies partially on coworker helping (e.g., expertise sharing, mentoring relationship with coworkers). Thus, in terms of retail salesclerks, helping coworkers may be less important than helping customers, which indicates that the theoretical model proposed in this study may not necessarily be generalized to all types of jobs. We feel that more research is needed to clarify the boundaries of our proposed model.

With respect to the motivational processes, we found that employees in more positive moods may perform better through higher self-efficacy and task persistence. Kanfer (1992) categorized motivation variables into distal and proximal motivation. Distal motivation constructs determine an individual’s decision to engage in a specific behavior, whereas proximal motivation constructs determine the individual’s maintenance of effort and persistence. Erez and Isen (2002) showed that positive moods affected the three main elements of expectancy theory (i.e., expectancy, instrumentality, and valence), and these three variables are distal motivation constructs. Therefore, our research extends the work of Erez and Isen by demonstrating how employee positive moods predict task performance through distal (i.e., self-efficacy) and proximal (i.e., task persistence) motivation variables. This provides some support for a process model of motivation that combines the variables of distal and proximal motivation into one model (see Kanfer, 1991).

After making comparisons among three competing models, we have concluded that the model with partially mediated relationships was more preferable. This was particularly true in the motivational mediation portion of the model. For example, our results show that, in addition to the indirect effect via self-efficacy, positive moods had a direct association with task persistence. Some thoughts may be offered to account for this finding. For example, George and Brief (1996) indicated that people in positive moods are more likely to judge progress toward their task goals positively, as they recall more positive past accomplishments and attribute past success to their own diligence. This tendency causes them to display higher task persistence. Fredrickson (2001) also noted that positive moods can broaden people’s thinking, which, in turn, increases the likelihood that they will find a positive meaning in subsequent events. Thus, when they come across a bottleneck at work, people with positive moods will become more resilient and better able to cope with adversity over time. This, in turn, leads to greater task persistence.

The present research has also found that coworker helping and support predicted task persistence beyond the direct effect of positive mood. This finding has implications for the work motivation literature. For example, Seo et al. (2004) proposed a theory that treated an individual’s affective experience as an important antecedent to three major outcome variables (including employee persistence) in work motivation. The present research adds to the literature and shows that coworker behavior, in the form of providing support, has a unique positive association with persistence ($\beta = .20, p < .01$; see Figure 2); this variable, together with self-efficacy and the direct path of positive moods, accounted for 39% of the variance in persistence. This finding is generally consistent with the basic tenet of the overall model of work motivation proposed by Mitchell and Daniels (2003), whereby employee persistence is considered to be jointly predicted by the individual variable (e.g., mood) and the contextual variable (e.g., social environment).

From a practical standpoint, managers who hope to increase employee task performance could take actions to enhance employee positive moods. Recommendations may include enhancing perceived task significance by making employees understand that the result of their work may have a significant effect on the well-being of other people (Saevedra & Kwun, 2000). In addition, managers may demonstrate charismatic or transformational leadership behaviors to create a positive affective tone in groups through the process of emotional contagion between leaders and group members (Barsade, 2002). This can subsequently improve the positive moods of individual members (Totterdell, 2000).

**Limitations and Directions for Future Research**

A few limitations of this study should be noted. First, the theoretical arguments presented in this article and the study’s longitudinal design support the likelihood that the relationships in the model are causal. However, only the replication of findings with studies using experimental designs can firmly establish this causality.

Second, to avoid the possibility of common method bias, we made efforts to collect the data from multiple sources. For example, we asked employees to rate their own positive moods, whereas supervisors evaluated employees’ task performance. Despite this effort, not all variables in our theoretical model (e.g., self-efficacy and task persistence) could be measured by sources other than the employees themselves, which indicates that some of the reported relationships in the proposed model may be inflated as a result of common method bias. Nevertheless, an effort was made to measure these variables at different points in time, which could have reduced common method bias effects (Podsakoff, MacKenzie, & Podsakoff, 2003).
Finally, our study includes only subjective measures of task performance. This raises a concern as to whether our performance measures can really capture the employees’ actual performance. For example, the data on supervisory rating of task performance may be exaggerated through halo effects created by amiable personal characteristics as a part of employees’ interpersonal attractiveness, which supervisors find stronger in employees with positive moods (Staw et al., 1994). While this explanation seems plausible, we contend that the present measurement of task performance was not simply the result of interpersonal attractiveness.

In the present research, we used the employee’s self-assessment of his or her actual performance level as well as the supervisor’s rating to represent the construct of task performance in our theoretical model. Farh and Dobbins (1989) demonstrated that the extent of leniency bias involved in self-ratings was reduced when the performance dimension was more clearly defined (e.g., total sales, levels of goal achievement). Thus, we designed our self-assessed performance measure in a way that was less susceptible to rating biases than were other self-report performance scales (e.g., “I am one of the best at the work I do”; Rodwell, Kienzle, & Shadur, 1998). Given that exploratory factor analysis showed that our self-assessed performance measure and the supervisor’s rating measure formed one common factor (with all loadings higher than .51), the two indicators together might have captured the underlying construct of task performance. Nonetheless, we encourage future researchers to incorporate objective performance measures to better address this issue.

Future research may explore additional mediating processes linking positive moods and task performance. For example, Forgas (2002) argued that positive moods can predict people’s behaviors in persuasion (e.g., Chebat, Vaillant, & Gelinas-Chebat, 2000) and negotiation (e.g., Carnevale & Isen, 1986), and these behaviors may have an important influence on employee task performance (e.g., insurance sales agents need to regularly persuade or negotiate with their customers). As little research has been conducted examining the effects of positive affective states on persuasion and negotiation in organizational settings, future research can look at the mediating role played by such interpersonal variables on the relationship between positive moods and task performance.

A final point worth discussing is the sample used in this article. The data across the two studies were collected in Taiwan; thus, cross-cultural generalizability of the results may be a concern. We contend that this should not bias the interpretations of our findings, as patterns of correlations among study variables identified in this research were generally congruent with findings from U.S. samples (e.g., Eisenberger et al., 2001; George, 1991). For example, we found that positive moods positively predicted employee helping behaviors directed toward coworkers, a finding that was consistent with that in George (1991). Future research testing the study’s model using samples from Western societies could provide direct evidence of the generalizability of our findings across cultures.

In conclusion, with the use of multiple sources of measurement, a longitudinal design, and the findings from two studies, the present research shows that positive moods might predict individual task performance through four mediating variables: helping other coworkers, coworker helping and support, self-efficacy, and task persistence. These findings contribute to the literature and assist in developing theories on positive moods by answering questions on the how and why aspects of theory building (Whetten, 1989).

References


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New Editors Appointed, 2009–2014

The Publications and Communications Board of the American Psychological Association announces the appointment of six new editors for 6-year terms beginning in 2009. As of January 1, 2008, manuscripts should be directed as follows:

- **Journal of Applied Psychology** (http://www.apa.org/journals/apl), **Steve W. J. Kozlowski**, PhD, Department of Psychology, Michigan State University, East Lansing, MI 48824.
- **Journal of Educational Psychology** (http://www.apa.org/journals/edu), **Arthur C. Graesser**, PhD, Department of Psychology, University of Memphis, 202 Psychology Building, Memphis, TN 38152.
- **Journal of Personality and Social Psychology: Interpersonal Relations and Group Processes** (http://www.apa.org/journals/psp), **Jeffry A. Simpson**, PhD, Department of Psychology, University of Minnesota, 75 East River Road, N394 Elliott Hall, Minneapolis, MN 55455.
- **Psychology of Addictive Behaviors** (http://www.apa.org/journals/adb), **Stephen A. Maisto**, PhD, Department of Psychology, Syracuse University, Syracuse, NY 13244.
- **Behavioral Neuroscience** (http://www.apa.org/journals/bne), **Mark S. Blumberg**, PhD, Department of Psychology, University of Iowa, E11 Seashore Hall, Iowa City, IA 52242.
- **Psychological Bulletin** (http://www.apa.org/journals/bul), **Stephen P. Hinshaw**, PhD, Department of Psychology, University of California, Tolman Hall #1650, Berkeley, CA 94720. (Manuscripts will not be directed to Dr. Hinshaw until July 1, 2008, as Harris Cooper will continue as editor until June 30, 2008.)

**Electronic manuscript submission**: As of January 1, 2008, manuscripts should be submitted electronically via the journal’s Manuscript Submission Portal (see the website listed above with each journal title).

Manuscript submission patterns make the precise date of completion of the 2008 volumes uncertain. Current editors, Sheldon Zedeck, PhD, Karen R. Harris, EdD, John F. Dovidio, PhD, Howard J. Shaffer, PhD, and John F. Disterhof, PhD, will receive and consider manuscripts through December 31, 2007. Harris Cooper, PhD, will continue to receive manuscripts until June 30, 2008. Should 2008 volumes be completed before that date, manuscripts will be redirected to the new editors for consideration in 2009 volumes.