The Relationship between Emotional Intelligence and Emotional Labor and Its Effect on Job Burnout in Korean Organizations

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DEDICATION

I dedicate this dissertation to

my parents, Whakuk Lee and Sookjae Choi,

my wife, Yunjung Kwak,

and my children, Claire and Alisha.
ABSTRACT

In this study, it was investigated whether emotional consonance mediates the trait emotional intelligence (EI)-emotional labor relationship and whether emotional consonance moderates the ability EI-emotional labor relationship and the emotional labor-job burnout relationship.

A survey questionnaire was administered to 600 employees from 22 subsidiaries of a Korean conglomerate, and 401 surveys were returned, resulting in a 66.8% response rate. In the process of data screening, three outliers were eliminated, leaving 398 cases in the sample.

It was found that trait EI was positively related to emotional consonance, and emotional consonance was negatively related to surface acting and positively related to deep acting. Also, emotional consonance mediated the relationship between trait EI and surface/deep acting.

Ability EI had a negative relationship with surface acting and a positive relationship with deep acting though the relationships were weak. Emotional consonance did not moderate the ability EI-emotional labor relationship but explained most of the variance of surface/deep acting.

Though surface acting was positively and deep acting was negatively related to emotional exhaustion and depersonalization, ability EI had a larger effect on both dimensions of job burnout. While surface acting did not have a significant effect on personal accomplishment, deep acting had a positive effect on personal accomplishment. Finally, though emotional consonance did not moderate the relationships between surface/deep acting and emotional exhaustion and depersonalization, emotional
consonance moderated the relationships between surface/deep acting and personal accomplishment.
# TABLE OF CONTENTS

ACKNOWLEDGEMENTS .................................................................................................................. i

DEDICATION .................................................................................................................................. iii

ABSTRACT ....................................................................................................................................... iv

TABLE OF CONTENTS .................................................................................................................... vi

LIST OF TABLES ............................................................................................................................. x

LIST OF FIGURES .......................................................................................................................... xi

CHAPTER 1: INTRODUCTION ........................................................................................................ 1

  Statement of the Problem ........................................................................................................... 3

  Purpose of the Study .................................................................................................................... 4

  Significance of the Study ............................................................................................................. 5

  Limitations of the Study .............................................................................................................. 6

  Definitions of Key Terms .......................................................................................................... 7

    Emotional Intelligence ............................................................................................................... 7

    Emotional Labor ...................................................................................................................... 7

    Emotional Consonance ........................................................................................................... 8

    Job Burnout .......................................................................................................................... 8

  Summary ...................................................................................................................................... 8

CHAPTER 2: REVIEW OF LITERATURE ...................................................................................... 10

  Main Issues under Debate in Recent EI Research ................................................................. 10

    Which Model of EI Should Be Used? ...................................................................................... 10

    Does EI Have Construct Validity? ......................................................................................... 13

    How Should EI Be Scored? ...................................................................................................... 24
### Approaches to Emotional Labor

- Hochschild’s Dramaturgical Approach .................................................. 27
- Ashforth and Humphrey’s Behavioral Approach ..................................... 28
- Morris and Feldman’s Interactionist Approach ....................................... 29
- Reconceptualizations of Emotional Labor .............................................. 29

### Relationship between EI and Emotional Labor

- Research Model and Hypotheses ......................................................... 33
- Summary .............................................................................................. 39

### CHAPTER 3: METHODS

- Target Population and Sample ............................................................. 41
- Instrumentation .................................................................................... 42
  - Emotional Intelligence ........................................................................ 42
  - Emotional Labor ................................................................................ 43
  - Job Burnout ....................................................................................... 44
- Reliability and Validity of the Instruments ............................................ 45
- Data Collection .................................................................................... 46
- Data Analysis ....................................................................................... 47
- Summary .............................................................................................. 48

### CHAPTER 4: RESULTS

- Data Screening .................................................................................... 51
  - Absence of Univariate and Multivariate Outliers ................................. 51
  - Absence of Multicollinearity and Singularity ...................................... 55
  - Normality, Linearity, and Homoscedasticity of Residuals .................... 57
- Descriptive Statistics and Correlations .................................................. 57
LIST OF TABLES

TABLE 1: Results of Confirmatory Factor Analysis .......................................................... 45
TABLE 2: Response Rate .................................................................................................. 52
TABLE 3: Demographic Information ................................................................................. 53
TABLE 4: Collinearity Diagnostics for Predictor Variables of Surface/Deep Acting .. 55
TABLE 5: Collinearity Diagnostics for Predictor Variables of Job Burnout .......... 56
TABLE 6: Descriptive Statistics and Correlations of Measured Variables ............... 58
TABLE 7: Test of Indirect Effects of Trait EI on Emotional Labor through
          Emotional Consonance .......................................................................................... 59
TABLE 8: Results of Hierarchical Regressions Testing Moderation Effects on
          Emotional Labor ..................................................................................................... 61
TABLE 9: Results of Hierarchical Regressions Testing Moderation Effects on
          Job Burnout........................................................................................................... 63
LIST OF FIGURES

FIGURE 1: Comprehensive Framework of Emotional Labor. ............................................. 31
FIGURE 2: Hypothesized Research Model. ................................................................. 40
FIGURE 3: Interaction Effect of Emotional Consonance and Surface Acting on
Personal Accomplishment............................................................................................. 65
FIGURE 4: Interaction Effect of Emotional Consonance and Deep Acting on
Personal Accomplishment............................................................................................. 66
FIGURE 5: Revised Framework of Emotional Labor......................................................... 82
FIGURE 6: Histogram of Standardized Residuals in Predicting Surface Acting .......... 161
FIGURE 7: Histogram of Standardized Residuals in Predicting Deep Acting............. 161
FIGURE 8: Histogram of Standardized Residuals in Predicting
Emotional Exhaustion.................................................................................................... 162
FIGURE 9: Histogram of Standardized Residuals in Predicting
Depersonalization......................................................................................................... 162
FIGURE 10: Histogram of Standardized Residuals in Predicting
Personal Accomplishment.............................................................................................. 163
FIGURE 11: Normal P-P Plot of Standardized Residuals in Predicting
Surface Acting................................................................................................................ 163
FIGURE 12: Normal P-P Plot of Standardized Residuals in Predicting
Deep Acting.................................................................................................................... 164
FIGURE 13: Normal P-P Plot of Standardized Residuals in Predicting
Emotional Exhaustion.................................................................................................... 164
FIGURE 14: Normal P-P Plot of Standardized Residuals in Predicting Depersonalization ...................................................... 165

FIGURE 15: Normal P-P Plot of Standardized Residuals in Predicting Personal Accomplishment ................................................. 165

FIGURE 16: Scatterplot of Standardized Residuals in Predicting Surface Acting .......... 166

FIGURE 17: Scatterplot of Standardized Residuals in Predicting Deep Acting .......... 166

FIGURE 18: Scatterplot of Standardized Residuals in Predicting Emotional Exhaustion ................................................................. 167

FIGURE 19: Scatterplot of Standardized Residuals in Predicting Depersonalization ................................................................. 167

FIGURE 20: Scatterplot of Standardized Residuals in Predicting Personal Accomplishment ................................................................. 168
CHAPTER 1

INTRODUCTION

In the past, emotions were not considered to be an important factor in research on organizational behavior. Most organizational theories tended to de-emphasize or marginalize the exploration of emotions (Martin, Knopoff, & Beckman, 1998), and a large number of organizational studies rested on the assumption that human beings are rational creatures who should not rely on irrational, unproductive emotions (Fineman, 1993; Hartel, Zerbe, & Ashkanasy, 2005).

In fact, there has been a tradition in western thought that views emotions as disorganized, disruptive interruptions of mental ability that should be controlled to make rational judgments (Matthews, Zeidner, & Roberts, 2002; Mayer, Salovey, & Caruso, 2000; Salovey & Mayer, 1990). This tradition in thought has led many scholars to consider emotions as distinct from reason and focus on the latter to explain organizational behavior (Hartel et al., 2005).

However, more recently researchers have realized that organizational behavior cannot be sufficiently explained without integrating the critical role of emotions. Modern theories of emotions regard them as organized responses to an internal or external event that can direct cognitive abilities adaptively (Damasio, 1999; Kalat & Shiota, 2007; Putnam & Mumby, 1993; Strongman, 2003; van Maanen & Kunda, 1989). Therefore, researchers are increasingly conducting studies on emotions to provide a more comprehensive understanding of human behavior in organizational settings.

Research in the field of human resource development also reflects this change of thought. Emotions have become a main topic of interest and are included as keywords...
in a number of recent publications (Callahan, 2000; Callahan & McCollum, 2002; Clarke, 2006a, 2006b; Drodge & Murphy, 2002; Jordan & Troth, 2002; Kunnanatt, 2004; Landen, 2002; McEnrue & Groves, 2006; Short & Yorks, 2002; Turnbull, 2002; Weinberger, 2002). Two concepts that have especially received researchers’ focus are emotional intelligence and emotional labor.

Developed in the field of psychology, the concept of emotional intelligence (EI) recognizes the limitations of traditional intelligence and suggests that individuals differ in the skill of processing affective information (Salovey & Mayer, 1990). This construct has a meaningful implication for human resource development because emotional intelligence can be a factor that leads to differences in work outcomes among organizations as well as individuals.

Emotional labor, which was originally a sociological concept, has paid attention to the role of emotions in service work, which has grown as a main industry in the modern era. This concept views emotions as a central part in the exchange between service workers and customers and also suggests that emotions can be considered as the product of service workers (Hochschild, 1983).

Though these two concepts were developed in different fields of study and have been studied in separate contexts, a more comprehensive understanding of emotions in the workplace can be gained by integrating EI and emotional labor in research. EI can explain how individuals can differ in their ability to recognize and regulate emotions, while emotional labor describes how emotional regulation and expression in the workplace affects individual or organizational well-being.
Therefore, if researchers intend to investigate whether EI has an effect on work performance or other desirable outcomes, they should also examine the dimensions of emotional labor to ascertain whether the work requires various skills of emotional intelligence.

Statement of the Problem

To identify a construct that can predict individual well-being and performance in the workplace has long been a goal of scholars and practitioners in the field of human resources.

When the concept of EI was first introduced to scholars, some researchers asserted that EI is far more important than IQ in predicting career success (e.g., Cooper & Sawaf, 1997; Goleman, 1995). However, their propositions were found to be based on anecdotes or suppositions rather than scientific research. Thus, there has been intense debate among scholars regarding whether EI is actually related to individual well-being or performance in the workplace (e.g. Lopes, Salovey, & Straus, 2003; Lopes, Salovey, Côté, & Beers, 2005; Matthews et al., 2002).

Recently, more and more researchers are integrating the concept of EI and emotional labor to obtain a comprehensive view of the effect of emotions in the workplace. Some researchers have investigated the moderation effect of emotional labor on the relationship between EI and work outcomes (Wong & Law, 2002; Wong, Wong, & Law, 2005, 2007). Others have explored the relationship between EI and the processes of emotional labor and its effect on work outcomes, such as job satisfaction and job burnout (Brotheridge, 2006; Johnson & Spector, 2007; Totterdall & Holman, 2003).
However, the findings in these studies have been inconsistent and determined by the methods used to measure EI or emotional labor. There are two important shortcomings in previous studies. First, though trait EI and ability EI are considered to be different types of EI in recent research (Petrides & Furnham, 2003; Petrides, Pita, & Kokkinaki, 2007), they are not differentiated in previous studies. Second, when employees do not experience discrepancy between the emotions they naturally feel and the emotions they have to display in the workplace, they do not need to regulate their emotions to perform emotional labor (Rubin, Tardino, Daus, & Munz, 2005). However, this effect of emotional consonance was not considered by most researchers.

Therefore, to obtain a clearer understanding of the effect of EI and emotional labor on work outcomes, a study that considers the differences between trait EI and ability EI and the influence of emotional consonance is required.

Purpose of the Study

The purpose of this study is to integrate the concepts of emotional intelligence and emotional labor to gain a more complete understanding of the relationship between employees’ emotions and organizational behavior. The main research questions are as follows:

1. What is the relationship between emotional intelligence and processes of emotional labor?
2. What are the effects of emotional intelligence and emotional labor on job burnout?
3. What are the effects of emotional consonance on the relationships among emotional intelligence, processes of emotional labor, and job burnout?
Significance of the Study

This study is one of the first known attempts to uncover the relationships among trait EI, ability EI, emotional consonance, and emotional labor in empirical research. The concept of emotional labor complements the concept of emotional intelligence because it consists of the contextual factors that can have influence on the effects of EI (Morris & Feldman, 1996). In addition, the concept of emotional consonance implies that there may be cases in which regulation of emotions are not required to perform emotional labor (Rubin et al., 2005). Because it is currently difficult to find an empirical study that integrates these concepts, this study can provide foundational knowledge for further research on the topic.

The results of this study will also have implications for practitioners in the field of human resource development. Though applications of EI are already actively used in training and development programs after the concept was popularized by Goleman (1995), the problem is that there is not sufficient scientific evidence for the effect of EI in the workplace (Matthews et al., 2002).

Though there are a few studies that have found significant relationships among EI, emotional labor, and work outcomes (e.g., Brotheridge, 2006; Lopes et al., 2003), they have limitations because the researchers considered neither the contextual factors of the work settings nor the effect of emotional consonance experienced by workers. Thus, it is still not certain in which circumstances EI and emotional labor have an effect on work outcomes.

This study will identify the contextual factors that interact with the employee’s EI to bring about consequences in the workplace. Therefore, human resource
development practitioners may be able to apply the findings of this study in exploring the possibilities of designing and implementing EI development programs.

Moreover, this study may have implications for finding a way to reduce job burnout in organizations. Though job burnout was found to be associated with turnover, absenteeism, withdrawal from co-workers, attitudes toward job, organizational commitment, and job performance in previous studies (Cordes & Dougherty, 1993; Firth & Britton, 1989; Jackson, Schwab, & Schuler, 1986; Jackson & Maslach, 1982; Maslach & Leiter, 1997; Parker & Kulik, 1995), there is still a lack of research on the construct in the field of human resource development (Russ-Eft, 2001).

If significant relationships among employees’ EI, emotional labor processes, and job burnout are found in this study, practitioners may apply this finding to explore the possibility of reducing employees’ job burnout through interventions that influence employees’ EI or processes of emotional labor.

Limitations of the Study

Because this study will be conducted in specific work settings, the findings may not be applicable to a job environment with different characteristics. Also, the results of this study may not be generalized to employees in organizations that have a different culture because emotion display rules are a function of societal norms, occupational norms, and organizational norms (Rafaeli & Sutton, 1989).

In addition, caution is needed when interpreting the results of this study. Even if an individual’s EI is found to have positive effects, this does not necessarily imply that people with high EI should be selected when organizations hire employees. Nor will
this research provide any evidence about whether EI development programs are possible or effective.

Finally, there is much controversy over whether emotions can be measured empirically. Thus, the limitations of the instruments used in this study may have an effect on the usefulness of the results in a workplace setting.

Definitions of Key Terms

Key terms in this study are defined as follows.

*Emotional Intelligence*

Two types of emotional intelligence are discussed in this study: trait EI and ability EI. Trait EI is defined as a composition of self-perceived abilities and personality traits that are related to emotional recognition and regulation, such as empathy, sensitivity to emotions, and motivation (Petrides & Furnham, 2000, 2001). Ability EI is defined as the ability to perceive and express emotions, the ability to use emotions to facilitate thought, the ability to understand emotions, and the ability to regulate emotions (Mayer & Salovey, 1997; Salovey, Mayer, & Caruso, 2002).

The main difference between trait EI and ability EI is that the former is assessed via self-report tests, while the latter is measured via performance tests (Petrides & Furnham, 2000; Mayer, Salovey, & Caruso, 2000).

*Emotional Labor*

Emotional labor is defined as regulation and expression of emotions in accordance with display rules of the work setting (Ashforth & Humphrey, 1993; Hochschild, 1983). Display rules refer to the rules that specify the range, density,
duration, and object of emotions that should be displayed within the context of the workplace (Morris & Feldman, 1996).

The two processes of emotional labor are surface acting and deep acting. Surface acting occurs when a person changes only his or her outward appearances and does not actually feel the displayed emotions, while deep acting takes place when a person intentionally feels the emotions they are required to display (Hochschild, 1983; Kruml & Geddes, 2000).

**Emotional Consonance**

Emotional consonance is defined as the subjective state of workers when they do not experience discrepancy between naturally felt emotions and emotions that they perceive to be the required display in the workplace (Ashforth & Humphrey, 1993; Rubin et al., 2005).

**Job Burnout**

Job burnout is defined as psychological syndromes developed in response to interpersonal stressors on the job, which include overwhelming exhaustion, feelings of cynicism and detachment from people, and a sense of ineffectiveness and lack of accomplishment (Maslach, 1982; Maslach & Jackson, 1981).

**Summary**

Recently, more and more researchers have been integrating the concepts of EI and emotional labor to obtain a comprehensive view of the effect of emotions in the workplace. However, the shortcomings of their studies are that they did not consider the differences between trait EI and ability EI and the influence of emotional consonance.
perceived by the employees. This study attempts to overcome the limitations of previous research by exploring the relationships among these concepts.

The concept of emotional labor can complement EI because it includes the contextual factors of a job that can have effect on workers’ regulation and expression of emotions. The purpose of this study is to explore how an individual’s EI interacts with the dimensions of emotional labor in affecting job burnout, which is a variable frequently connected with emotional labor in research.

The results of this study will have implications for practitioners and scholars in the field of human resource development. The findings of this study may provide practitioners with a rationale for designing and implementing interventions to develop employees’ EI or to reduce job burnout. In addition, scholars will be able to identify how contextual or cultural factors have influence on the effects of EI in the workplace.
CHAPTER 2

REVIEW OF LITERATURE

This chapter presents a review of literature relevant to EI, emotional labor, and the relationship between them. First, the main issues under debate regarding EI are explored. Second, different approaches to emotional labor are compared. Finally, the relationship between EI and emotional labor and its effect on job burnout is investigated.

Main Issues under Debate in Recent EI Research

The main issues under debate among EI scholars are the appropriate model of EI to use, the construct validity of EI, and the scoring method in EI measurements. Each issue is explored in this section.

Which Model of EI Should Be Used?

Since Mayer et al. (2000) categorized models of EI into ability models and mixed models, there has been intense debate among scholars regarding the model that should be used for research. Advocates of the ability model criticize mixed models in that their dimensions largely overlap with existing personality traits (e.g., Mayer et al., 2000), while champions of mixed or trait models claim that it is natural that EI, as a lower order personality trait, should relate to higher order personality traits in hierarchical trait taxonomies (e.g., Petrides & Furnham, 2006).

Because of a lack of consensus regarding the definition of EI, some scholars have come to doubt the viability of the construct (e.g., Locke, 2005; Matthews, Roberts, & Zeidner, 2004; Waterhouse, 2006a, 2006b). They have asserted that the inconsistencies in concepts of EI undermine the validity of the construct. However, there have been attempts to integrate different models of EI.
Zeidner, Matthews, Roberts, and MacCann (2003) have proposed a multi-level investment model in which different concepts of EI are located on a developmental continuum. In theories of intelligence, investment refers to the engagement of cognitive processes or traits that underlie development of human abilities (Zeidner et al., 2003). Zeidner et al. (2003) presented three concepts of EI as competencies associated with qualitatively different levels of processing emotional events. The three levels of EI in the investment model are biological temperament, learned rule-based skills, and self-aware emotional regulation.

Zeidner et al. (2003) emphasized that these processing levels do not constitute developmental stages because, at any stage of emotional development, processes at multiple levels will operate. However, they admit that the importance of each level changes in different phases of development.

According to Zeidner et al.’s (2003) model, infants are born with different temperamental factors that, in turn, influence perception and expression of basic emotions and primitive control strategies (first level of EI). Preschool children differ in how easily they learn simple regulative strategies that often have a rule-based nature (second level of EI). Finally, school-aged children acquire a more sophisticated understanding of the self as a social being, and use this knowledge to guide emotional regulation (third level of EI).

Zeidner et al. (2003) pointed out that Mayer et al.’s (2000) model of EI has limitations as a developmental framework as the four branches of the model do not correspond to a coherent set of abilities and have a parallel rather than a serial relationship. They argued that the emotional regulation branch of the ability model
refers to a wide variety of different strategies from thumb-sucking to insightful coping, and the primitive forms of emotional regulation do not depend on explicitly understanding emotions, as the ability model indicates (Zeidner et al., 2003).

However, the branches of Mayer et al.’s (2000) model refer to mental abilities that require interaction between emotions and cognition. Therefore, for instance, the emotional regulation branch cannot be viewed as including primitive forms of emotional regulation, such as thumb-sucking. The scope of the branch is confined to abilities that require explicit understanding of emotions, which is the third branch of the ability model. Mayer et al. (2000) thought that the abilities of EI can be viewed as a form of intelligence in this way.

The strength of the multi-level investment model is that it can be connected with both ability models and mixed models of EI. More specifically, the concept of EI as learned rule-based skills appears to be associated with the experiential branches (perception and facilitation), while EI as self-aware emotional regulation seems to be related to the strategic branches (understanding and regulation) in Mayer et al.’s (2000) model. This is plausible because Zeidner et al. (2003) noted that, as a child matures, the nature of processing emotions becomes more declarative.

The other level of EI, EI as a positive temperament, appears to be associated with emotional dispositions that are related to mixed or trait models of EI. Both personal dispositions and temperaments are largely influenced by biological factors, such as genes, and provide a foundation for an individual’s emotional development.

Because the levels in Zeidner et al.’s (2003) model correspond to the concepts of EI in mixed or trait models, as well as ability models, the investment model can be
considered as a framework that can integrate different models of EI. Moreover, the model suggests that ability and mixed models of EI are not mutually exclusive.

**Does EI Have Construct Validity?**

Like many other individual difference constructs, developing valid measurements is a central issue for conducting further research on EI. However, some critics of EI doubt the construct validity of existing EI measurements (e.g., Antonakis, 2004; Matthews et al., 2004).

Construct validity can be examined through several methods: by investigating its factor structure, by assessing its convergent and discriminant validity, and by investigating its criterion and incremental validity. Each facet of construct validity is explored.

**Factorial validity.** First, for a measurement to have factorial validity, its factor structure should correspond to a theoretical model of the measured construct. A number of research studies on the factor structure of EI tests have been conducted.

Mayer, Salovey, Caruso, and Sitarenios (2003) conducted a factor analysis of their Mayer-Salovey-Caruso Emotional Intelligence Test (MSCEIT). One, two, and four-factor models all fit the data well. The one-factor model indicated an overall EI, the two-factor model referred to two areas of EI, the experiential and the strategic, and the four-factor model corresponded to the four branches of EI in Mayer and Salovey’s (1997) model.

Other scholars have attempted to replicate these findings, but they failed to discover an identical factor structure. For instance, though Day and Caroll (2004) and Livingstone and Day (2005) found support for the four-factor model, Gignac (2005)
found no support for the one, two, or four-factor model. In other studies, it was found that a three-factor model fit the data best (Keele & Bell, 2008; Palmer, Gignac, Manocha, & Stough, 2005; Roberts et al., 2006; Rossen, Kranzler, & Algina, 2008).

Gignac (2005) pointed out that a factor solution based on only two observed variables for each latent variable is limited and suggested adding more subscales to the MSCEIT. However, Mayer, Panter, Salovey, Caruso, and Sitarenios (2005) proposed that a better approach would be to divide the test by focusing on 16 or 32 item parcels of the scale. They concluded that, until the MSCEIT is analyzed using such a further division of the branches, the choice between hierarchical and nonhierarchical, three-, four-, or other-level factor models should be postponed (Mayer et al., 2005).

There are also inconsistencies in the results of research on the factor structure of the Schutte Self-Report Inventory (SSRI). Schutte et al. (1998) conducted factor analysis in the process of developing the inventory and discovered a four-factor structure. However, they reported that only the 33 items loading on the first factor were retained because the items loading on the second through fourth factors were not conceptually distinct from those loading on the first. This statement implies that the SSRI will have a one-factor (an overall EI) structure.

However, Petrides and Furnham (2000) found that the SSRI does not measure a general EI factor and is not successfully mapped onto Salvey and Mayer’s (1990) model. Through confirmatory factor analysis (CFA), they found that a four-factor model was the best fit; these factors were optimism/mood regulation, appraisal of emotions, social skills, and utilization of emotions.
Later, this four-factor structure was confirmed by Saklofske, Austin, and Minski (2003) and Goldenberg, Matheson, and Mantler (2006). However, other scholars have found a three-factor structure instead of the four-factor structure, composed of appraisal of emotions, optimism/positivity, and regulating/using emotions (Austin, Saklofske, Huang, & McKenny, 2004; Chapman & Hayslip, Jr., 2006). Thus, the factorial validity of the SSRI has not been confirmed yet.

When Bar-On (1997) conducted CFA with his Emotional Quotient Inventory (EQ-i), he found that a 15-factor model, which corresponds to the 15 subscales of the test, fit the data well. Other scholars have tried to replicate this finding, but different factorial structures have emerged in their research.

For example, Livingstone and Day (2005) and Petrides and Furnham (2001) found that a single-factor (overall EI) fit the data most, while Palmer, Manocha, Gignac, and Stough (2003) discovered that a six-factor model showed the best fit. Later, even Bar-On (2006), himself, found a different structure consisting of ten factors. Though the length of the questionnaire could have affected the results of these studies, they indicate that more substantiation is required to confirm the factorial validity of the EQ-i.

In summary, it can be seen that more research is required to validate the factorial structure of the MSCEIT, SSRI, and EQ-i. If the findings remain inconsistent, these measurements and the theoretical models they are based on should be refined.

There are also measurements that have hitherto shown a stable factor structure though more validation studies are required to come to a firm conclusion. For example, Petrides (2001) conducted factor analysis with his Trait Emotional Intelligence Questionnaire (TEIQue) and uncovered a four-factor structure that consists of well-
being, sociability, self-control, and emotionality. This four-factor model was confirmed by Mikolajczak, Luminet, Leroy, and Roy (2007).

In addition, Wong and Law (2002), who developed the Wong and Law Emotional Intelligence Scale (WLEIS), conducted a CFA and found that the measurement has a four-factor structure. These factors were in accordance with the four subscales of the test, which were based on Salovey and Mayer’s (1990) model. The four-factor structure of WLEIS was also confirmed in later studies (Kafetsios & Zampetakis, 2008; Law, Wong, Huang, & Li, 2008; Law, Wong, & Song, 2004; Shi & Wang, 2007).

Convergent validity. If EI has convergent validity, the construct is expected to have significant relationships with theoretically related constructs. Also, the EI score measured via different tests should be significantly correlated with each other.

Because EI measured via performance tests assesses mental abilities that process information from the emotions system as well as the cognitive system, it is considered to be theoretically related to cognitive intelligence (Mayer & Salovey, 1997). Meanwhile, EI measured via self-report tests is considered to be theoretically associated with personality traits (Petrides & Furnham, 2000).

A number of scholars have investigated the relationship between self-report tests and performance tests of EI. In their studies, the correlation coefficient between the MSCEIT and the EQ-i ranged from .13 to .34 (Brackett & Mayer, 2003; Farrelly & Austin, 2007; Livingstone & Day, 2005; O’Connor Jr. & Little, 2003), and the correlation coefficient between the MSCEIT and the SSRI ranged from .04 to .29
While the correlation between MSCEIT and other self-report tests appear to be low, self-report tests seem to show higher correlations with each other. For example, Brackett and Mayer (2003) found that the zero-order correlation coefficient between EQ-i and SSRI was .43, and Wong and Law (2002) reported that the correlation coefficient between EQ-i and WLEIS was .63. And, while the van Rooy, Viswesvaran, and Pluta (2005) meta-analysis of 58 studies found a corrected observed correlation between performance measures and self-report EI measures of only.14, the estimated true score correlation between different self-report EI measures was .71.

While these findings can be regarded as proof of a lack of convergent validity, Petrides and Furnham (2000) asserted that it is natural that scores on performance EI tests and self-report EI tests have a low correlation because they are measuring distinct constructs. They argued that the former measures ability EI, which is a form of intelligence, while the latter measures trait EI, which belongs to the personality realm (Petrides & Furnham, 2000).

Some researchers have actually found that ability EI has a significant relationship with cognitive intelligence. Results of several studies that used the MSCEIT have indicated that ability EI is related to verbal intelligence (.31 ≤ rs ≤ .39, ps ≤ .05) (Brackett & Mayer, 2003; Brackett, Mayer, & Warner, 2004; Gil-Orate, Martin, & Brackett, 2006; Lopes et al., 2003; Zeidner et al., 2005). Schulte, Ree, and Carretta (2004) found that the EI score on the MSCEIT was significantly correlated with general cognitive ability measured via the Wonderlic Personnel Test (r = .45, p < .05).
On the other hand, scores on self-report tests are found to be unrelated to cognitive intelligence. Newsome, Day, and Catano (2000) found that no college student scores on any subscale of EQ-i was significantly correlated with their cognitive ability measured with the Wonderlic Personnel Test. Also, Saklofske et al. (2003) found that the correlation between score on the SSRI and general mental ability, measured via the Wechsler Abbreviate Scale, was not significant. Additionally, in van Rooy et al.’s (2005) meta-analysis of 18 studies, the sample size weighted mean correlation between cognitive ability (GMA) measures and EI performance measures was .34, while a sample size weighted mean correlation of .11 was found between cognitive ability and self-report EI measurements.

These findings also support Petrides and Furnham’s (2000, 2001) perspective on trait EI and ability EI. They have maintained that the validation of an EI measure should be pursued primarily within the framework in which the measure was developed. That is, the validity of trait EI, measured with a typical behavior test, should be demonstrated vis-à-vis personality factors, while the validity of ability EI, assessed with a maximal performance test, has to be demonstrated against intelligence factors.

In fact, to avoid confusion, Petrides and Furnham (2001) suggested alternative labels for each type of EI: emotional self-efficacy for trait EI and cognitive-emotional ability for ability EI. The reason they retained the original terms in their studies is to link their research to the extant literature on EI. From their perspective, trait EI is not expected to be correlated with cognitive intelligence because intelligence and personality are essentially independent domains (Petrides & Furnham, 2001).
Discriminant validity. For a construct to have discriminant validity, there should be evidence that it does not significantly correlate with theoretically unrelated constructs.

Most studies using self-report tests have found that EI is significantly correlated with all of the Big Five personality traits. The Big Five model is a predominant model in personality assessment research (Scholte & De Bruyn, 2004). In the model, five personality traits are regarded as the basic dimensions of personality organization: Neuroticism (tendency to experience negative emotions), Extraversion (tendency toward social behavior), Openness (preference for novel ideas and experiences), Agreeableness (friendly and considerate behavior), and Conscientiousness (determination and responsibility) (Costa & McCrae, 1992).

EI measured via the SSRI was found to be significantly related to Neuroticism ($-.31 \leq r_s \leq -.19, p < .01$), Extraversion ($0.32 \leq r_s \leq .53, p < .01$), Openness ($0.19 \leq r_s \leq .54, p < .01$), Agreeableness ($0.18 \leq r_s \leq .58, p < .01$), and Conscientiousness ($0.25 \leq r_s \leq .38, p < .01$) (Austin, Saklofske, & Egan, 2005; Brackett & Mayer, 2003; Chapman & Hayslip Jr., 2005; Saklofske et al., 2003; Schutte et al., 1998).

EQ-i scores were also found to be significantly correlated with Neuroticism ($-0.57 \leq r_s \leq -0.47, p < .01$), Extraversion ($0.30 \leq r_s \leq .49, p < .01$), Openness ($0.16 \leq r_s \leq .47, p < .05$), Agreeableness ($0.27 \leq r_s \leq .55, p < .01$), and Conscientiousness ($0.33 \leq r_s \leq .48, p < .01$) (Austin et al., 2005; Brackett & Mayer, 2003; Buford, 2001; Grubb III & McDaniel, 2007).

When the TEIQue was used, the EI score was significantly correlated with Neuroticism ($-0.70 \leq r_s \leq -0.42, p < .01$), Extraversion ($0.41 \leq r_s \leq .68, p < .01$), Openness
(.41 ≤ rs ≤ .44, ps < .01), and Conscientiousness (.33 ≤ rs ≤ .48, ps < .01) (Mikolajczak, Luminet et al., 2007; Petrides & Furnham, 2003; Singh & Woods, 2008). The TEIQue score was found to be related to Agreeableness (r = .41, p < .01) only in Mikolajczak, Luminet et al. (2007).

These findings suggest that EI, measured with self-report tests, substantially overlaps with other personality traits. Some scholars would conclude that this finding provides evidence that EI is a redundant construct (e.g., Grubb III & McDaniel, 2007; Roberts, Zeidner, & Matthews, 2001).

However, from Petrides and Furnham’s (2003) perspective, trait EI, as a construct embedded within the personality framework, should be expected to have a strong relationship with basic personality traits. They claim that discovering where trait EI belongs within established personality hierarchies is more important than investigating whether EI is related to existing personality traits. For this purpose, Petrides et al. (2007) conducted principal axis factor analyses to locate trait EI in the Eysenckian and the Big Five factor space.

The Eysenckian model, or the Giant Three model, is another widely used model in personality research (Scholte & De Bruyn, 2004). Unlike the Big Five model, the Giant Three model assumes that there are three basic dimensions of personality. It shares two dimensions (Neuroticism and Extraversion) with the Big Five but includes Psychoticism as the third dimension. Psychoticism involves traits like aggression, egocentrism, and impulsiveness (Eysenck & Eysenck, 1975).

When the TEIQue scales were factored jointly with the scales of the Eysenck Personality Questionnaire (Eysenck & Eysenck, 1975) or the Traits Personality
Questionnaire (Tsaousis, 1999), an oblique trait EI factor emerged in addition to other basic personality trait factors. Petrides et al. (2007) proposed that this finding constitutes strong evidence of discriminant validity vis-à-vis the Giant Three and Big Five personality dimensions.

A number of scholars have also examined the relationship between a performance EI test (i.e., MSCEIT) and personality trait measures. As expected, the correlations with the Big Five personality dimensions were nonsignificant or moderate. Correlations with Agreeableness and Openness are those most frequently reported, but correlation magnitudes are typically less than .36. (Bastian, Burns, & Nettelbeck, 2005; Brackett & Mayer, 2003; Brackett, Rivers, Shiffman, Lerner, & Salovey, 2006; Day & Carroll, 2004; Gil-Orate et al., 2006; Livingstone & Day, 2005; Lopes et al., 2003; Schulte et al., 2004).

Criterion and incremental validity. A measurement has criterion and incremental validity if it adds to the prediction of a criterion above what can be predicted by other competing constructs. Cognitive intelligence and the Big Five personality traits are generally used as the competing constructs in EI research.

In studies that controlled for cognitive intelligence, the MSCEIT score was significantly related to life satisfaction ($\Delta R^2=.14$, $p<.01$) (Law et al., 2008); cooperation ($r_{partial}=.34$, $p<.01$), self-confidence ($r_{partial}=.47$, $p<.01$), leadership ($r_{partial}=.33$, $p<.01$), dominancy ($r_{partial}=-.24$, $p<.05$), shyness ($r_{partial}=-.28$, $p<.05$), prosocial behavior ($r_{partial}=.45$, $p<.01$), and high school students’ GPA ($r_{partial}=.43$, $p<.01$) (Gil-Orate et al., 2006).
After controlling for both Big Five and scores on cognitive intelligence measures, the MSCEIT score remained significantly associated with social deviance ($r_{partial}=-.20, p<.01$) (Brackett & Mayer, 2003); illegal drug use ($r_{partial}=-.34, p<.01$), alcohol consumption ($r_{partial}=-.26, p<.05$), and deviant behavior ($r_{partial}=-.27, p<.05$) (Brackett et al., 2004); positive relations with others ($\Delta R^2=.05, p<.05$), social support with parent ($\Delta R^2=.05, p<.05$), and negative interaction with friends ($\Delta R^2=.19, p<.01$) (Lopes et al., 2003); and public speaking effectiveness ($\Delta R^2=.01, p<.05$) (Rode et al., 2007). Overall, these results support that EI, measured with the MSCEIT, has criterion and incremental validity.

The results of studies measuring EI via self-report tests also provide evidence for criterion and incremental validity of the construct. Beyond the Big Five dimensions, the EQ-i score significantly contributed to accounting for the variance of self-reported management effectiveness ($\Delta R^2=.07, p<.05$) and self-ratings of leadership ($\Delta R^2=.04, p<.05$) (Buford, 2001); well-being ($\Delta R^2=.06, p<.05$) and personal effectiveness ($\Delta R^2=.07, p<.05$) (Day, Therrien, & Carroll, 2005); job satisfaction ($\Delta R^2=.06, p<.05$) and life satisfaction ($\Delta R^2=.14, p<.01$) (Livingstone & Day, 2005); and managers’ supporting competencies ($\Delta R^2=.14, p<.05$) (van der Zee & Wabeke, 2004).

When the Big Five dimensions were partialled out, the SSRI score remained significantly related to an individual’s social network size ($\Delta R^2=.05, p<.05$) (Austin et al., 2005); loneliness ($r_{partial}=-.14, p<.05$), depression-proneness ($r_{partial}=-.14, p<.05$), subjective happiness ($r_{partial}=.15, p<.01$), and life satisfaction ($r_{partial}=.20, p<.01$) (Saklofske et al., 2003). When both Big Five and cognitive intelligence were partialled
out, the SSRI score still contributed to the unique variance of loneliness ($\Delta R^2=.01, p<.05$) (Chapman & Hayslip Jr., 2005).

Law et al. (2008) found that the WLEIS score has incremental predictive validity for job performance ($\Delta R^2=.10, p<.05$) and life satisfaction ($\Delta R^2=.12, p<.05$) after controlling for General Mental Ability (GMA). GMA is a concept first proposed by Spearman (1927). It refers to a general underlying factor that is considered to be able to explain most human cognitive abilities (Spearman, 1927).

After controlling for the Big Five, employees’ WLEIS scores positively predicted job satisfaction ($\Delta R^2=.06, p<.01$) and job performance ($\Delta R^2=.03, p<.05$) (Sy, Tram, & O’Hara, 2006); life satisfaction ($\Delta R^2=.08, p<.01$) (Wong & Law, 2002); task performance ($\Delta R^2=.03, p<.05$), interpersonal facilitation ($\Delta R^2=.06, p<.01$), and job dedication ($\Delta R^2=.08, p<.01$) (Law et al., 2004).

Trait EI, measured with the TEIQue, was found to be a significant predictor of emotional reactivity ($\Delta R^2=.13, p<.01$) (Mikolajczak, Luminet et al., 2007); physical aggression ($\Delta R^2=.07, p<.01$), sensitivity to emotional expression ($\Delta R^2=.03, p<.05$), anger ($\Delta R^2=.14, p<.01$), and hostility ($\Delta R^2=.36, p<.01$) (Petrides, Pérez-González, & Furnham, 2007); job satisfaction ($\Delta R^2=.07, p<.01$) and general well-being ($\Delta R^2=.09, p<.01$) (Singh & Woods, 2008) after controlling for the Big Five dimensions.

Critics of EI do not think that the construct has sufficient incremental validity because the unique contribution of EI in explaining the variance of the criterion variable is too small (e.g., Bastian et al., 2005; Roberts et al., 2001). However, advocates of EI have argued that even 5~15% is quite a large contribution, especially after many scales of personality traits and cognitive intelligence are partialled out.
For example, Petrides, Pérez-González et al. (2007) proposed that, when we ask whether trait EI predicts over and above personality, we are posing an inherently biased question because, while trait EI carries only one degree of freedom, personality carries three (or five) and, thus, is far more likely to show statistically significant associations with external criteria.

Petrides, Pita et al. (2007) took a step further by contending that even if trait EI could be expressed as mixtures of the basic personality dimensions, such conceptualization would fail to provide a plausible explanation of psychological phenomena. For instance, the statement, “High trait EI individuals are more sensitive to affect-laden stimuli” is much more comprehensible than “Those who are low in Extraversion, high in Neuroticism, and above average in Conscientiousness and Openness are more sensitive to affect-laden stimuli” because the latter fails to explain why individuals with these profiles are differentially sensitive to such stimuli (Petrides, Pita et al., 2007).

**How Should EI Be Scored?**

Roberts et al. (2001) criticized the scoring method of both self-report tests and performance tests of EI. As for performance tests, they asserted that application of objectively correct criteria in scoring tasks of emotional ability is problematic because the responses will be heavily influenced by cultural and contextual factors (Roberts et al., 2001).

Culture defines the way people interpret and understand experiences or events. Therefore, it has influence on how people appraise emotions (Kalat & Shiota, 2007). For example, in Scherer’s (1997) study, African participants described sadness-eliciting
events as unfair and immoral, which may sound strange to people from other cultures that differentiate the feeling of sadness from senses of justice and morality.

Culture also has an effect on emotional display. In cultures that emphasize power distance, it is typically not appropriate to express negative emotions to people with a higher status (Matsumoto, 1990). For instance, a subordinate’s non-reactive quiet response to his or her boss who has made unreasonable demands may be regarded as emotionally intelligent in countries such as Korea or China (Law et al., 2008).

Additionally, in collectivist cultures, people may inhibit expressions of negative emotions to preserve group harmony (Kalat & Shiota, 2007). In Cha’s (1983) study, it was found that Koreans hesitate to disagree with others and avoid making straight comments to others’ opinions. They have the tendency to hide their feelings when they can bring about conflict among other people.

The developers of the MSCEIT claimed that cultural or ethnic differences do not seem seriously to distort people’s responses because the test is designed to tap onto the more universal aspects of emotional experience (Mayer, Salovey, & Caruso, 2002). However, a number of studies discovered differences among ethnic groups when using EI measurements.

Moon (2007) assessed the ability EI of Korean and U.S. American participants using a forced-choice test developed within a Korean culture. When he compared the responses of the Korean and U.S. American participants, he found that they selected different answers to 18 of 25 questions. This suggests that culture may determine what people regard as emotionally intelligent behavior.
Hassan and Sader (2005) conducted a factor analysis with responses to EQ-i in a Lebanese context and found that the Lebanese viewed several subcomponents of a subscale in EQ-i as different factors. For instance, each subcomponent of the interpersonal scale (empathy, relationship with friends, and social responsibility) and the intrapersonal scale (assertiveness and self-awareness) was considered to be a separate factor by the Lebanese.

Parker et al. (2005) used the EQ-i to compare EI of an aboriginal group with a non-aboriginal group who resided in small rural Canadian communities. In their research, the aboriginal sample scored significantly lower than the non-aboriginal sample on the total scale, as well as on the interpersonal, adaptability, and stress management scales. This does not suggest that the aboriginals have lower EI, but it does suggest that the measures used did not adequately differentiate EI across cultural groups.

Yusefi (2006) investigated the reliability of the MSCEIT in Iranian culture and found that the reliability coefficients of two branches (understanding and management of emotions) were lower than those reported by Mayer et al. (2003) in a U.S. sample. The results of these studies imply that more research should be conducted to validate EI tests in different cultural settings.

The weakness of self-report measurements is that they rely on a person’s self-perception of EI, which is vulnerable to response biases and social desirability effects (Roberts et al., 2001). As described earlier, the corrected observed correlation between performance measures and self-report measures of EI was only .14 in van Rooy et al.’s (2005) meta-analysis research. In addition, Paulhus, Lysy, and Yik (1998) reported that
the correlation coefficient between self-reports of cognitive intelligence and performance in mental ability tests were .30.

One way to counteract this problem is to obtain responses from people other than the participants (e.g., supervisors or peers). However, this process may not be allowed in certain conditions. In such cases, the findings of previous studies imply that self-report EI tests should be used for self-understanding or developmental purposes rather than for personnel selection or promotion.

The main issues under debate in EI research have been reviewed in this section. The recent developments in EI research indicate that attempts to integrate the competing conceptualizations of EI are being made, and empirical evidence for the construct validity of EI is accumulating. However, it has also been found that more validation studies on EI measurements are required, and the influence of cultural or contextual factors on EI should be further investigated.

Approaches to Emotional Labor

Like emotional intelligence, the construct of emotional labor has garnered extensive attention among scholars recently. Though qualitative approaches to the concept have been dominant in the past, more and more scholars are attempting to conduct quantitative studies by operationally defining the construct (e.g., Brotheridge & Lee, 2003; Glomb & Tews, 2004; Kruml & Geddes, 2000; Morris & Feldman, 1997). The approaches that have most influenced these studies are discussed next.

Hochschild’s Dramaturgical Approach

The concept of emotional labor was first introduced by Hochschild in her seminal book, *The Managed Heart*. In this work, Hochschild (1983) coined the term,
emotional labor, to refer to “the management of feeling to create a publicly observable facial and bodily display” (p. 7).

Hochschild’s (1983) work was influenced by the dramaturgical perspective of customer interactions in which employees are regarded as actors, and the work setting was viewed as their stage (Grove & Fisk, 1989), and, thus, she used the concepts of surface acting and deep acting to describe how employees perform emotional labor. Surface acting occurs when a person changes only his or her outward appearances and does not actually feel the displayed emotions, while deep acting takes place when a person intentionally feels the emotions they are required to display (Hochschild, 1983; Kruml & Geddes, 2000).

Hochschild (1983) thought that emotional labor is especially required for service workers who have direct interactions with customers and identified 44 occupations that involve a significant amount of emotional labor. Examples of these occupations are lawyers, judges, librarians, and bank tellers (Hochschild, 1983).

Ashforth and Humphrey’s Behavioral Approach

Ashforth and Humphrey (1993) have conceptualized emotional labor from a slightly different perspective. They defined emotional labor as “the act of displaying the appropriate emotion” (Ashforth & Humphrey, 1993, p. 90).

As can be seen in this definition, they took a more behavioral approach and focused on observable behavior rather than underlying emotions. They proposed that the experience of emotions should be considered distinct from expression of emotions because employees may not necessarily need to regulate their feelings to express the required emotions (Ashforth & Humphrey, 1993).
Morris and Feldman’s Interactionist Approach

Morris and Feldman (1996) took an interactionist approach and defined emotional labor as “the effort, planning, and control needed to express organizationally desired emotion during interpersonal transactions” (p. 987). In their work, they specified the four dimensions of emotional labor as the frequency of emotional display, attentiveness to required display rules (duration and intensity of emotional display), variety of emotions to be displayed, and emotional dissonance.

Two important concepts are included in Morris and Feldman’s (1996) dimensions of emotional labor: display rules and emotional dissonance. Display rules refer to the standards or rules that dictate when and how emotions should be expressed (Ekman, 1973; Morris & Feldman, 1996), and emotional dissonance is defined as a state wherein the emotions required to express are discrepant from the emotions genuinely felt (Middleton, 1989).

Reconceptualizations of Emotional Labor

Grandey (2000) claimed that the previous definitions of emotional labor are likely to bring about confusion because Ashforth and Humphrey (1993) seem to refer to the proximal goal of emotional labor (observable expressions of emotions), while Morris and Feldman (1996) appear to be dealing with the characteristics of a job that invoke emotional labor.

Grandey (2000) suggested that the construct of emotional labor should be viewed as “the process of regulating both feelings and expressions for the organizational goals” (p. 97). Therefore, from her perspective, emotional labor refers to the processes of emotional regulation through self acting and deep acting.
Similarly, Rubin et al. (2005) attempted to clarify the concept of emotional labor by differentiating a subjective state resulting from organizational requirements (emotional dissonance) and the motivated behavior undertaken to manage the subjective state (emotional labor).

They claimed that confusions are caused by including both emotional state and motivated behavior, as well as other situational factors (e.g., display rules), in the definition of emotional labor. For example, in Morris and Feldman’s (1996) definition, situational factors (frequency, duration, variety, and intensity of emotional display) are combined with an emotional state (emotional dissonance).

Also, Rubin et al. (2005) emphasized that emotional dissonance depends on people’s perception of a situation rather than situational factors themselves. The concept of perceived dissonance implies that individuals may differ in the experience of emotional dissonance even when working in similar settings. In addition, the concept also suggests that those who do not perceive emotional dissonance will not be motivated to engage in emotional labor. This perspective is distinct from Hochschild’s (1983) approach in which characteristics of the occupation determine the amount of emotional labor that should be performed.

**Relationship between EI and Emotional Labor**

The concept of emotional labor can be directly connected with EI because, as can be seen in the definitions of both constructs, the components of EI are the abilities that are required to perform emotional labor. Employees who can effectively perceive and regulate emotions will be easily able to identify display rules and adapt their emotions to them.
The antecedents and consequences of emotional labor are presented in Figure 1. It can be seen that EI, as an individual difference factor, may influence how a person perceives situational factors and, thus, affects the emotional state prior to emotional labor (Rubin et al., 2005). It is likely that trait EI or personality traits will determine whether an employee experiences emotional dissonance because people who have the tendency to feel positive emotions are liable to find themselves genuinely feeling the required emotions.

*Figure 1.* Comprehensive framework of emotional labor based on Grandey (2000) and Rubin et al. (2005).

Additionally, individual differences will have an effect on whether a person engages in surface acting or performs deep acting in case they experience emotional dissonance (Grandey, 2000; Rubin et al., 2005). Especially, ability EI is likely to be associated with how emotional labor is performed because people who can effectively regulate their emotions will experience less difficulty in managing their emotions in accordance with display rules.
Connecting the concept of emotional labor with EI has advantages in conducting research on the effects of emotions within workplace settings. First, the concept of display rules clarifies how cultural factors affect the process of emotional regulation in the workplace. Display rules are generally a function of societal norms, occupational norms, and organizational norms (Rafaeli & Sutton, 1987). Therefore, they can be viewed as the contextual factors that guide the direction of emotional regulation.

Though some scholars prefer to regard emotional intelligence as a cross-cultural concept (e.g., Mayer et al., 2002), the concept of display rules clearly verifies that employees are affected by cultural factors when applying the skills of EI within a workplace setting. Thus, an EI measurement that was developed and validated within a Korean setting was used for this study.

Second, the concept of emotional dissonance may define the situational conditions in which the skills of EI have an effect on job-related outcomes. Employees may feel the need to engage in emotional labor only when they experience emotional dissonance (Rubin et al., 2005). Therefore, in cases in which workers genuinely feel the emotions required to be displayed, they may not have to regulate their emotions. This implies that the abilities of EI may influence employees’ performance only when they perceive emotional dissonance.

Finally, the processes of surface acting and deep acting elucidate how EI can affect the well-being of employees and organizations. Literature on emotional labor indicate that surface acting is more likely to have negative effects, such as depersonalization and emotional exhaustion, while deep acting seems to be associated with positive outcomes, such as personal accomplishment and affective well-being.
Employees who have high ability EI may engage in deep acting rather than surface acting because they can regulate their emotions effectively. If this proposition is proved, positive effects of EI in the workplace can be explained by applying the concepts of deep acting and surface acting.

Research Model and Hypotheses

The main purpose of this study is to uncover the relationship between EI and emotional labor and its effect on job burnout. Though research on the relationship between EI and emotional labor has been actively conducted recently, there is still a lack of studies to reach consensus.

First, there are studies that investigated the moderation effect of emotional labor on the EI–job performance and EI-job satisfaction relationship. However, the findings are inconsistent and determined by the method used to assess emotional labor.

Wong and Law (2002) used supervisor and incumbent assessments of emotional labor in their study. The supervisors were 60 middle and upper-level managers enrolled in a part-time management diploma course at a university, and the incumbents were 149 subordinates of the supervisors. When the incumbents’ assessments were used, the interaction effect of EI and emotional labor on job performance was found to be significant ($\Delta R^2=0.03, p<0.05$). However, when they used supervisor assessments of emotional labor, the interaction effect of EI and emotional labor on job performance
was only marginally significant ($\Delta R^2 = .02, p < .10$). Regardless of the assessment method, the interaction effect of EI and emotional labor on job satisfaction was not significant.

When Wong et al. (2005) applied Holland’s classification of occupation model to measure emotional labor, they discovered that the higher the emotional labor of the job, the stronger were the effects of EI on job satisfaction ($\Delta R^2 = .01, p < .01$). Wong et al. (2007) also conducted two studies to replicate this finding. To assess the level of emotional labor, they used a dichotomous variable in the first study and a four-point scale in the second study. Though emotional labor moderated the EI-job satisfaction relationship in the first study ($\Delta R^2 = .08, p < .01$), no moderation effect was found in the second study.

Second, a few studies have explored the relationship between EI and the two processes of emotional labor. Totterdell and Holman (2003) discovered that EI, measured via the SSRI, was not significantly correlated with either surface acting or deep acting. Johnson and Spector (2007) also found that EI, assessed with the WLEIS, was not significantly correlated with either processes. However, in Brotheridge’s (2006) study, EI, measured with the MSCEIT, was significantly, but only marginally, correlated with deep acting ($r = .14, p < .05$) but not at all with surface acting. In addition, Austin, Dore, and O’Donovan (2008) found that EI, measured via the TEIQue, was negatively correlated with surface acting ($r = -.45, p < .01$) but not at all with deep acting.

There are two possible reasons for the inconsistency found in the results of previous studies. First, the instruments used in the studies seem to measure distinct constructs. While Brotheridge (2006) used a measurement that assesses ability EI, the
other studies used instruments that measure trait EI. However, ability EI and trait EI may have different effects on the processes of emotional labor.

Second, moderator variables, including emotional consonance, may affect the influence of EI and emotional labor. In previous studies, EI or perceived emotional labor were generally used as moderators. However, when individuals experience emotional consonance, that is, they naturally feel the required emotions, there is no need for them to conduct surface acting or deep acting. As Rubin et al. (2005) asserts, emotional dissonance is a precondition for employees to perform emotional labor. Thus, the moderation effect of emotional consonance should be considered.

As mentioned earlier, trait EI is likely to have influence on emotional consonance because those who have higher trait EI are more likely to experience positive emotions naturally (Petrides & Furnham, 2003). Also, those who experience emotional consonance may not perceive the need to perform surface acting or deep acting (Rubin et al., 2005). Therefore, the hypotheses regarding the relationship among trait EI, emotional consonance, and emotional labor are:

*Hypothesis 1a:* There will be a positive relationship between trait EI and emotional consonance.

*Hypothesis 1b:* There will be a negative relationship between emotional consonance and surface acting.

*Hypothesis 1c:* There will be a negative relationship between emotional consonance and deep acting.

*Hypothesis 1d:* Emotional consonance will mediate the relationship between trait EI and surface acting.
Hypothesis 1e: Emotional consonance will mediate the relationship between trait EI and deep acting.

Ability EI is a construct that demonstrates direct relevance with emotional labor because it encompasses the ability to perceive and regulate emotions effectively (Johnson & Spector, 2007; Mayer & Salovey, 1997). However, it is still difficult to find a study that directly investigated the relationship between ability EI and emotion labor. Though workers who have high ability EI are expected to perform both surface and deep acting, it is expected that they will engage more in deep acting because they can regulate their emotions effectively. In contrast, workers with low ability EI will rely more on surface acting. Because these assumptions apply to individuals who experience emotional dissonance, emotional consonance will moderate the relationship between ability EI and emotional labor. Thus, the hypotheses regarding the relationship between ability EI and emotional labor are:

Hypothesis 2a: There will be a negative relationship between ability EI and surface acting.

Hypothesis 2b: The lower the emotional consonance, the stronger will be the relationship between ability EI and surface acting.

Hypothesis 2c: There will be a positive relationship between ability EI and deep acting.

Hypothesis 2d: The lower the emotional consonance, the stronger will be the relationship between ability EI and deep acting.

A number of researchers have investigated the relationship between emotional labor and job burnout. Maslach’s (1982) three-component conceptualization of job
burnout is the definition that is widely accepted by scholars. According to this definition, the three components of job burnout are emotional exhaustion, depersonalization, and diminished personal accomplishment (Maslach, 1982; Maslach & Jackson, 1981).

The first component, emotional exhaustion, refers to a lack of energy and feeling that one’s emotional resources are used up. Depersonalization is characterized by displaying a detached, emotional callousness and being cynical to people and the organization. Finally, diminished personal accomplishment is marked by a decline in feelings of job competence and successful achievement in one’s work (Cordes & Dougherty, 1993; Maslach & Jackson, 1981).

The components of job burnout have been found to be associated with turnover, absenteeism, withdrawal from co-workers, attitudes toward job, organizational commitment, and job performance in empirical research (Cordes & Dougherty, 1993; Firth & Britton, 1989; Jackson et al., 1986; Jackson & Maslach, 1982; Maslach & Leiter, 1997; Parker & Kulik, 1995).

Most studies that have investigated the relationship between emotional labor and job burnout found that surface acting is significantly related to the components of job burnout (Brotheridge & Lee, 2002, 2003; Goldberg & Grandey, 2007; Grandey, 2003; Johnson & Spector, 2007; Martínez-Iñigo, Totterdell, Alcover, & Holman, 2007; Mikolajczak, Menil, & Luminet, 2007; Montgomery et al., 2006; Totterdell & Holman, 2003).

However, the relationship between deep acting and job burnout is still unclear. Johnson and Spector (2007) found that deep acting was negatively associated with emotional exhaustion ($\beta=-.56$, $p<.05$). Brotheridge and Lee (2002) discovered that deep
acting was negatively related to depersonalization ($\beta=-.09, p<.05$), and Brotheridge and Grandey (2002) found that deep acting had a positive effect on personal accomplishment ($\beta=-.19, p<.01$). However, other researchers have found that there were no significant relationships between deep acting and job burnout components (Goldberg & Grandey, 2007; Grandey, 2003; Martínez-Iñigo et al., 2007; Montgomery et al., 2006; Näring et al., 2006; Totterdell & Holman, 2003).

A shortcoming of these studies is that they did not consider the moderation effect of emotional consonance. Because those who have a low level of emotional consonance are more likely to feel the need to make effort and experience burnout while performing emotional labor (Rubin et al., 2005), emotional consonance may moderate the relationship between the processes of emotional labor and the components of job burnout. Therefore, the hypotheses regarding the relationship between emotional labor and job burnout are:

- **Hypothesis 3a:** There will be a positive relationship between surface acting and emotional exhaustion.
- **Hypothesis 3b:** There will be a negative relationship between deep acting and emotional exhaustion.
- **Hypothesis 3c:** The lower the emotional consonance, the stronger will be the surface acting-emotional exhaustion relationship.
- **Hypothesis 3d:** The lower the emotional consonance, the stronger will be the deep acting-emotional exhaustion relationship.
- **Hypothesis 3e:** There will be a positive relationship between surface acting and depersonalization.
Hypothesis 3f: There will be a negative relationship between deep acting and depersonalization.

Hypothesis 3g: The lower the emotional consonance, the stronger will be the surface acting-depersonalization relationship.

Hypothesis 3h: The lower the emotional consonance, the stronger will be the deep acting-depersonalization relationship.

Hypothesis 3i: There will be a negative relationship between surface acting and personal accomplishment.

Hypothesis 3j: There will be a positive relationship between deep acting and personal accomplishment.

Hypothesis 3k: The lower the emotional consonance, the stronger will be the surface acting-personal accomplishment relationship.

Hypothesis 3l: The lower the emotional consonance, the stronger will be the deep acting-personal accomplishment relationship.

All of these hypotheses are presented in the model of Figure 2.

Summary

Main issues under debate in recent EI research, different approaches to emotional labor, and the relationship between EI and emotional labor were reviewed in this chapter. It was found that there is still debate among scholars on the model of EI that should be used in future research, the construct validity of EI, and scoring methods in EI measurements. Also, some scholars have attempted to reconceptualize emotional labor by differentiating the emotional state required for emotional labor from the processes of emotion labor.
Figure 2. Hypothesized research model. Dashed lines indicate moderation effects. EI stands for emotional intelligence, EC stands for emotional consonance, SA stands for surface acting, DA stands for deep acting, EE stands for emotional exhaustion, DP stands for depersonalization, and PA stands for personal accomplishment.

Finally, integrating EI and emotional labor was found to have advantages because it can provide a more comprehensive understanding on the effect of emotions in the workplace.

The research model and hypotheses were also presented in this chapter. The research hypotheses will investigate the mediation effect of emotional consonance on the relationship between trait EI and emotional labor processes, the moderation effect of emotional consonance on the relationship between ability EI and emotional labor processes, and the moderation effect of emotional consonance on the relationship between emotional labor processes and job burnout.
CHAPTER 3

METHODS

This chapter describes the research methods that were used in this study. The target population and sample, instrumentation, and the methods for data collection and data analysis are presented.

Target Population and Sample

The target population of this study is employees of Korean conglomerates headquartered in Seoul, South Korea. Convenience sampling was used for this study because the target organizations were selected using the researcher’s personal network. The participants in this study were employees from 22 subsidiaries (eight electronic companies, four financial companies, four heavy industry companies, two retail companies, two manufacturing and engineering companies, one resort company, and one security company) of a Korean conglomerate. There are approximately 156,000 employees in this conglomerate.

The sample consisted of 600 participants in six training and development sessions that were implemented by the HRD center of the conglomerate. The sample included 300 employees from electronic companies, 60 employees from financial companies, 60 employees from heavy industry companies, 60 employees from retail companies, 50 employees from manufacturing and engineering companies, 50 employees from the resort company, and 20 employees from the security company.

To assure that the sample represents the population, the participants in general leadership training sessions, including clerks, senior clerks, assistant managers, managers, senior managers, and general managers, were invited to participate in the
survey. The anticipated sample size, based on an expected return rate of more than 50%, was more than 300.

**Instrumentation**

A multi-item questionnaire composed of four parts was used for this study. The first part measured participants’ trait EI and ability EI. The second part assessed three variables related to emotional labor: surface acting, deep acting, and emotional consonance. The third part measured job burnout. Finally, the fourth part collected participants’ demographic information, including gender, age, level of education, and years of employment. These variables were entered in the first step of hierarchical regressions to control for their effect on processes of emotional labor (in testing hypotheses 2a-2d) or dimensions of job burnout (in testing hypotheses 3a-3l). Also, demographic information was collected to identify the basic characteristics of the sample.

The EI measurement was developed within Korea in Korean (Moon, 1999), and the other measures have been translated and validated within a Korean setting in previous studies, as referenced in the appropriate section that follows. The entire questionnaire is in Appendix B. Details of each instrument follow.

**Emotional Intelligence**

A revised version of Moon’s (1999) Emotional Intelligence Test for Korean Adults was used to measure EI. This instrument was selected because it assesses both trait EI and ability EI and was developed and validated within a Korean setting.

There were originally 50 items in the first part of the instrument that measures trait EI (Moon, 1999). The items were based on Salovey and Mayer’s (1990) initial
model of EI that has five branches: emotional recognition and expression, empathy, emotional facilitation, emotional understanding, and emotional regulation. However, 30 items that did not substantially load on a factor or that lowered the reliability of the instrument were removed in a validation study (Moon, Lim, Kwak, & Lee, 2009).

The revised version of the test has three subscales: emotional recognition and understanding (6 items, Cronbach alpha = .72), emotional facilitation (6 items, Cronbach alpha = .71), and emotional regulation (8 items, Cronbach alpha = .76). Respondents use a five-point Likert-type scale to indicate the extent to which the statement in each item matches their perception of self. Moon et al. (2009) conducted confirmatory factor analysis (CFA) to test the validity of the instrument and found that the three-factor model fit the data well (GFI=.92; PNFI=.71; RMR=.04; RMSEA=.06).

In the second part that measures ability EI, there are twenty items. Each item presents a situation that one can encounter in real life, and the respondents have to answer with the actions they would take from four forced choices based on emotionally intelligent answers that have been decided by researchers specializing in Koreans’ emotions (Moon, 1999). If the respondents choose one of them, they obtain 20 points for the best response and 5 or 10 points for an acceptable response. In a validation study, the Cronbach alpha coefficient for the second part of the test was .79, and employees’ ability EI score was significantly related to their salary ($\beta=.54, t=8.04, p<.01$) and job position ($\beta=.31, t=6.26, p<.01$) (Moon, 2007).

*Emotional Labor*

Park, Jeon, and Jeong’s (2005) questionnaire was used to measure variables related to emotional labor. Park et al. (2005) translated items from Brotheridge and
Lee’s (2003) emotional labor scale and Diefendorff, Croyle, and Gosserand’s (2005) emotional labor strategy questionnaire into Korean. The questionnaire has three subscales: surface acting, deep acting, and emotional consonance.

Respondents are asked to answer items in response to the stem question, “On an average day at work, how often do you do each of the following?” and the respondents use a five-point Likert-type response scale (1=never; 5=always). Three items measure surface acting (sample item: “I resist expressing my true feelings”), three items measure deep acting (sample item: “I make an effort to actually feel the emotions that I need to display to others”), and three items measure emotional consonance (sample item: “I spontaneously feel the emotions I have to show to others”).

Park et al. (2005) conducted confirmatory factor analysis to examine the validity of the instrument and found that a three-factor model fit the data well (GFI=.96; AGFI=.92; TLI=.95; RMSEA=.07). The Cronbach alpha coefficient for each subscale was .83 (surface acting), .77 (deep acting), and .78 (emotional consonance) (Park et al., 2005).

**Job Burnout**

A validated Korean version of the Maslach and Jackson’s (1981) Maslach Burnout Inventory (MBI) was used to measure variables related to job burnout (You, Lee, & Lee, 1998). There are three subscales and 22 items in this instrument. A statement is given in each item and respondents use a five-point Likert-type scale to indicate the extent to which the statement matches perception of self (You et al., 1998).

Nine items measure emotional exhaustion (sample item: “I feel emotionally drained from my work”), five items measure depersonalization (sample item: “I’ve
become more callous toward people since I took this job”), and eight items measure personal accomplishment (sample item: “I deal very effectively with the problems of my customers or co-workers”) (Maslach & Jackson, 1981).

In a Korean setting, three factors emerged in the factor analysis of the translated instrument, and the Cronbach alpha coefficient for each subscale was .87 (emotional exhaustion), .83 (depersonalization), and .88 (personal accomplishment) (Han, 2005).

Reliability and Validity of the Instruments

The data collected from this study was analyzed to examine the reliability and validity of the instruments in the questionnaire. Cronbach alpha coefficients for all measurements were acceptable, ranging from .70 to .89 (presented in chapter four). Construct validity of each instrument was determined by the results of confirmatory factor analysis (CFA) obtained using AMOS 17.0. The model fit estimates, as presented in Table 1, indicated that all measurements have construct validity.

Table 1

*Results of Confirmatory Factor Analysis*

<table>
<thead>
<tr>
<th>Measurement</th>
<th>$\chi^2$</th>
<th>df</th>
<th>$\chi^2/df$</th>
<th>CFI</th>
<th>GFI</th>
<th>RMR</th>
<th>RMSEA</th>
</tr>
</thead>
<tbody>
<tr>
<td>Trait EI</td>
<td>449.74</td>
<td>166</td>
<td>2.71</td>
<td>.88</td>
<td>.90</td>
<td>.03</td>
<td>.07</td>
</tr>
<tr>
<td>Ability EI</td>
<td>241.05</td>
<td>170</td>
<td>1.42</td>
<td>.86</td>
<td>.94</td>
<td>.05</td>
<td>.03</td>
</tr>
<tr>
<td>Emotional labor</td>
<td>44.13</td>
<td>23</td>
<td>1.92</td>
<td>.97</td>
<td>.98</td>
<td>.03</td>
<td>.05</td>
</tr>
<tr>
<td>Job burnout</td>
<td>430.68</td>
<td>185</td>
<td>2.33</td>
<td>.91</td>
<td>.90</td>
<td>.04</td>
<td>.06</td>
</tr>
</tbody>
</table>

*Note.* CFI = comparative fit index; GFI = goodness-of-fit index; RMR = root mean square residual; RMSEA = root mean square error of approximation.
Data Collection

The researcher cooperated with a manager from the HRD center of the target organization to collect data. The researcher provided the manager with information on the research problem, the research procedures, and potential risks and benefits, and the consent form (presented in Appendix C) was signed by the manager.

The researcher submitted the signed consent form and application forms to the Institutional Review Board (IRB) for review of the research. Because this research is a survey research with adult subjects, the researcher applied for review of research exempt from detailed IRB committee review.

After the research was approved by IRB, the survey questionnaire was distributed to 600 employees who participated in general leadership training and development sessions implemented by the HRD center. The HRD manager introduced the researcher to the participants and solicited participation in the survey at the beginning of the training sessions.

The researcher used a script (presented in Appendix A) to inform the employees that participation in the study is voluntary and to explain the topic and purpose of the research. After replying to participants’ questions on the study, the researcher asked the employees to read the cover of the questionnaire and begin responding to the survey.

To ensure anonymity of responses, the information collected in the survey did not identify a respondent. Surveys were placed in a sealed envelope before they were returned. No further information, such as the participants’ name, address, and phone number, was collected to protect privacy. The researcher coded the responses to the survey into a text file and used it for further analysis.
Data Analysis

First, bootstrapping approaches were used to test the mediation effect of emotional consonance in hypotheses 1d and 1e. Bootstrapping is a nonparametric approach to effect-size estimation and hypothesis testing that makes no assumptions about the shape of the distributions of the variables or the sampling distribution of the statistic (Bollen & Stine, 1990). The procedure outlined by Preacher and Hayes (2008) was used to conduct the test in SPSS 17.0 for Windows.

Though Baron and Kenny’s (1986) method is frequently used in testing mediation effects, it is reported that this method inflates the possibility of Type I and Type II errors (Holmbeck, 2002; Preacher & Hayes, 2004). Also, the Sobel test, which is an alternative method to test the significance of indirect effect, has problems because it is based on the assumption that the distribution of the indirect effect follows normal distribution. However, the distribution is usually positively skewed, and the symmetric confidence interval based on the assumption of normality typically yields underpowered tests of mediation (Bollen & Stine, 1990). Therefore, the significance of the indirect effects of trait EI on processes of emotional labor via emotional consonance was tested based on a bootstrapped sampling distribution in this study.

Second, hierarchical regressions were used to test the moderation effect of emotional consonance in hypotheses 2a-2d and 3a-3l. Though moderation and mediation effects can be tested via structural equation modeling (SEM), SEM is a confirmatory rather than an exploratory tool (Burnette & Williams, 2005). Because the research hypotheses have not been tested and confirmed in previous studies, alternative
techniques were used in this study. SPSS 17.0 for Windows was used to conduct hierarchical regressions. To test hypotheses 2a-2d, demographic variables were entered as control variables in step 1, the variables of ability EI and emotional consonance were additionally entered in step 2, and the product variable (ability EI × emotional consonance) was additionally entered in step 3 of the hierarchical regressions. The moderation effect was tested by examining the change in variance of the dependent variables (surface acting for hypothesis 2b and deep acting for hypothesis 2d) that is explained by the product variable entered in step 3.

To test hypotheses 3a-3l, demographic variables and ability EI were entered as control variables in step 1, the variables of surface acting, deep acting, and emotional consonance were additionally entered in step 2, and the product variables (surface acting × emotional consonance and deep acting × emotional consonance) were additionally entered in step 3 of the hierarchical regressions. The moderation effect was tested by examining the change in variance of the dependent variables (emotional exhaustion for hypotheses 3c and 3d, depersonalization for hypotheses 3g and 3h, and personal accomplishment for hypotheses 3k and 3l) that is explained by the product variables entered in step 3.

Summary

This chapter reviewed the methods of the study, including target population and sample, instrumentation, and data collection and analysis. Six hundred employees from 22 subsidiaries of a Korean conglomerate were asked to participate in this study. The researcher cooperated with a manager from the HRD center of the target organization to
collect data. A consent form was signed by the HRD manager, who was responsible for implementing training and development sessions. Because this research is a survey study with adult subjects, the researcher applied for approval of research exempt from IRB committee review.

For the survey questionnaire, validated Korean versions of measurements were used to assess emotional intelligence (trait EI and ability EI), variables related to emotional labor (surface acting, deep acting and emotional consonance), and components of job burnout (emotional exhaustion, depersonalization, and personal accomplishment). Confirmatory factor analysis was conducted to test the construct validity of the measurements, while Cronbach alpha coefficients were used to estimate reliability.

Bootstrapping approaches were used to investigate the mediation effect of emotional consonance on the relationships between trait EI and emotional labor processes (hypotheses 1d and 1e). Hierarchical regressions were used to test the moderation effect of emotional consonance on the relationships between ability EI and emotional labor processes (hypotheses 2a-2d) and to test the moderation effect of emotional consonance on the relationships between emotional labor processes and dimensions of job burnout (hypotheses 3a-3l).

The survey questionnaire was distributed to participants at the beginning of leadership training sessions after a manager from the HRD center introduced the research and the researcher explained details of the questionnaire. After informing the employees that participation in the study is voluntary, the researcher distributed and
collected the questionnaires. To protect privacy of the participants, the collected information was not used to identify the respondents.
CHAPTER 4

RESULTS

This chapter presents the results of the data analysis in this study. First, the
process of data screening is described. Second, descriptive statistics and correlations are
presented. Third, results of the bootstrapping estimates that were used to test the
hypotheses on mediation effects are reported. Finally, results of the hierarchical
regressions that tested hypotheses on moderation effects are presented.

Data Screening

Prior to analysis, the gathered data were examined to investigate whether they
met the assumptions of multiple regression. The assumptions of multiple regression are
absence of outliers among variables, absence of multicollinearity and singularity, and
normality, linearity, and homoscedasticity of residuals (Tabachnick & Fidell, 2007).

Absence of Univariate and Multivariate Outliers

Of the 600 surveys distributed, 401 were returned, resulting in a 66.8% response
rate. There were no missing values in the data. Response rate of the sample is presented
in Table 2.

To detect univariate outliers, standardized scores and histograms of variables
were examined. There were three cases that had extreme Z scores (in excess of 3.90) on
a variable and were unattached to the rest of the distribution. These cases were deleted
and the respondent group became 398. Multivariate outliers were identified by
examining Mahalanobis distance values. Mahalanobis distance is the distance between a
set of scores for an individual case and the sample means for all variables (Kline, 2005).
The Mahalanobis distance of a case is evaluated using the $\chi^2$ distribution with degrees of freedom equal to the number of variables. A very conservative probability estimate (e.g., $p<.001$) for a case being an outlier is regarded as appropriate (Tabachnick & Fidell, 2007). There were no cases that had extreme Mahalanobis distance values in the data. Demographic information on the final sample of the study is presented in Table 3.

<table>
<thead>
<tr>
<th>Industry</th>
<th>Sample</th>
<th>Responses</th>
<th>Response Rate (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electronic</td>
<td>300</td>
<td>217</td>
<td>72.3</td>
</tr>
<tr>
<td>Heavy Industry</td>
<td>60</td>
<td>49</td>
<td>81.7</td>
</tr>
<tr>
<td>Retail</td>
<td>60</td>
<td>43</td>
<td>71.7</td>
</tr>
<tr>
<td>Finance</td>
<td>60</td>
<td>42</td>
<td>70.0</td>
</tr>
<tr>
<td>Manufacturing &amp; Engineering</td>
<td>50</td>
<td>23</td>
<td>46.0</td>
</tr>
<tr>
<td>Resort</td>
<td>50</td>
<td>19</td>
<td>38.0</td>
</tr>
<tr>
<td>Security</td>
<td>20</td>
<td>8</td>
<td>40.0</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>600</td>
<td>401</td>
<td>66.8</td>
</tr>
</tbody>
</table>
Table 3

Demographic Information

<table>
<thead>
<tr>
<th>Variable</th>
<th>Frequency</th>
<th>%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>311</td>
<td>78.1</td>
</tr>
<tr>
<td>Female</td>
<td>87</td>
<td>21.9</td>
</tr>
<tr>
<td>Age</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 30</td>
<td>2</td>
<td>0.5</td>
</tr>
<tr>
<td>30~39</td>
<td>60</td>
<td>15.1</td>
</tr>
<tr>
<td>40~49</td>
<td>304</td>
<td>76.4</td>
</tr>
<tr>
<td>More than 49</td>
<td>32</td>
<td>8.0</td>
</tr>
<tr>
<td>Education</td>
<td></td>
<td></td>
</tr>
<tr>
<td>High school</td>
<td>39</td>
<td>9.8</td>
</tr>
<tr>
<td>Two-year college</td>
<td>24</td>
<td>6.0</td>
</tr>
<tr>
<td>Four-year college</td>
<td>240</td>
<td>60.3</td>
</tr>
<tr>
<td>Master</td>
<td>68</td>
<td>17.1</td>
</tr>
<tr>
<td>Doctor</td>
<td>27</td>
<td>6.8</td>
</tr>
<tr>
<td>Years in current organization</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 2</td>
<td>55</td>
<td>13.8</td>
</tr>
<tr>
<td>2~4</td>
<td>44</td>
<td>11.1</td>
</tr>
<tr>
<td>4~6</td>
<td>38</td>
<td>9.5</td>
</tr>
<tr>
<td>6~8</td>
<td>27</td>
<td>6.8</td>
</tr>
<tr>
<td>Job title</td>
<td>Number</td>
<td>Percentage</td>
</tr>
<tr>
<td>--------------------</td>
<td>--------</td>
<td>------------</td>
</tr>
<tr>
<td>More than 8</td>
<td>234</td>
<td>58.8</td>
</tr>
<tr>
<td>Clerk/senior clerk</td>
<td>7</td>
<td>1.8</td>
</tr>
<tr>
<td>Assistant manager</td>
<td>23</td>
<td>5.8</td>
</tr>
<tr>
<td>Manager</td>
<td>235</td>
<td>59.0</td>
</tr>
<tr>
<td>Senior manager</td>
<td>129</td>
<td>32.4</td>
</tr>
<tr>
<td>General manager</td>
<td>4</td>
<td>1.0</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Type of Job</th>
<th>Number</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Administration</td>
<td>60</td>
<td>15.1</td>
</tr>
<tr>
<td>Management &amp; Finance</td>
<td>15</td>
<td>3.8</td>
</tr>
<tr>
<td>Marketing/Sales support</td>
<td>95</td>
<td>23.9</td>
</tr>
<tr>
<td>Personnel/Education &amp; training</td>
<td>9</td>
<td>2.3</td>
</tr>
<tr>
<td>Customer consulting</td>
<td>40</td>
<td>10.1</td>
</tr>
<tr>
<td>Engineering/Manufacturing</td>
<td>91</td>
<td>22.9</td>
</tr>
<tr>
<td>Research &amp; Development</td>
<td>55</td>
<td>13.8</td>
</tr>
<tr>
<td>IT/ Internet service</td>
<td>21</td>
<td>5.3</td>
</tr>
<tr>
<td>Other</td>
<td>12</td>
<td>3.0</td>
</tr>
</tbody>
</table>

| Total                           | 398    | 100.0      |
Absence of Multicollinearity and Singularity

Multicollinearity and singularity are caused by high bivariate correlations (e.g., \( r > .85 \)) among independent variables. However, the highest bivariate correlation among the independent variables was .43 (between emotional consonance and deep acting).

When interactions are tested in multiple regression, centered independent variables are recommended to avoid multicollinearity (Tabachnick & Fidell, 2007). This process is necessary because product terms are highly correlated with component variables. Therefore, in the hierarchical regressions used to test the moderation effects in this study, all independent variables involved in the interaction effects were centered.

High multivariate correlations can also cause multicollinearity and singularity and are detected by statistics such as tolerance and variance inflation factor (VIF). Tolerance indicates the proportion of variance that is not explained by other variables, and VIF equals the ratio of the total standardized variance to unique variance. Tolerance values less than .10 or VIF values higher than 10 imply that there might be multicollinearity or singularity (Kline, 2005). The tolerance and VIF values of the predictor variables in the data did not indicate occurrence of multicollinearity. Collinearity diagnostics are presented in Tables 4-5.

Table 4

Collinearity Diagnostics for Predictor Variables of Surface/Deep Acting

<table>
<thead>
<tr>
<th>Variable</th>
<th>Tolerance</th>
<th>VIF</th>
</tr>
</thead>
<tbody>
<tr>
<td>Gender</td>
<td>.974</td>
<td>1.027</td>
</tr>
<tr>
<td>Age</td>
<td>.926</td>
<td>1.080</td>
</tr>
<tr>
<td>Variable</td>
<td>Tolerance</td>
<td>VIF</td>
</tr>
<tr>
<td>----------------------------------------------</td>
<td>-----------</td>
<td>------</td>
</tr>
<tr>
<td>Education</td>
<td>.963</td>
<td>1.038</td>
</tr>
<tr>
<td>Years Worked in Current Organization</td>
<td>.981</td>
<td>1.019</td>
</tr>
<tr>
<td>Ability EI</td>
<td>.968</td>
<td>1.033</td>
</tr>
<tr>
<td>Emotional Consonance</td>
<td>.993</td>
<td>1.007</td>
</tr>
<tr>
<td>Ability EI × Emotional Consonance</td>
<td>.991</td>
<td>1.009</td>
</tr>
</tbody>
</table>

Table 5
Collinearity Diagnostics for Predictor Variables of Job Burnout
Normality, Linearity, and Homoscedasticity of Residuals

Histograms, normal probability plots, and scatterplots of standardized residuals were examined to investigate whether the residuals were normally distributed about the predicted score, whether the residuals had a linear relationship with predicted scores, and whether the variances of residuals were homogeneous for predicted scores. The chart and plots indicated that the distribution of residuals met all of these assumptions. The plots of standardized residuals are presented in Figures 6-20 in Appendix E.

Descriptive Statistics and Correlations

Table 6 presents descriptive statistics and correlations of the variables that were involved in this study. Also, Cronbach’s alpha coefficients for each scale that assessed the variables are provided in parentheses.

It can be seen that the reliability of all scales was acceptable with .70 or higher alpha coefficients. One item assessing emotional exhaustion (“I feel I’m working too hard on my job”) lowered the reliability of the scale from .85 to .82 and had a nonsignificant item-total correlation ($r = -0.01$). Thus, it was deleted before conducting further data analysis.

Through correlation analysis, it was found trait EI was positively correlated with emotional consonance ($r = 0.31$, $p < 0.01$). Additionally, emotional consonance was negatively correlated with surface acting ($r = -0.42$, $p < 0.01$). Thus, hypotheses 1a and 1b were supported.

However, though emotional consonance was hypothesized to have a negative relationship with deep acting in hypothesis 1c, it was found that emotional consonance was positively correlated with deep acting ($r = 0.43$, $p < 0.01$).
Table 6  
**Descriptive Statistics and Correlations of Measured Variables**

<table>
<thead>
<tr>
<th>Variables</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>
</tr>
</thead>
<tbody>
<tr>
<td>1. Trait EI</td>
<td>3.85</td>
<td>.42</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Ability EI</td>
<td>14.91</td>
<td>2.69</td>
<td>.37**</td>
<td>.71</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. EC</td>
<td>3.30</td>
<td>.57</td>
<td>.31**</td>
<td>.02</td>
<td>.71</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. SA</td>
<td>2.91</td>
<td>.60</td>
<td>-.12*</td>
<td>-.16**</td>
<td>-.42**</td>
<td>.70</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. DA</td>
<td>3.66</td>
<td>.54</td>
<td>.47**</td>
<td>.14**</td>
<td>.43**</td>
<td>-.02</td>
<td>.78</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. EE</td>
<td>2.48</td>
<td>.71</td>
<td>-.41**</td>
<td>-.31**</td>
<td>-.13**</td>
<td>.26**</td>
<td>-.19**</td>
<td>.85</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. DP</td>
<td>2.01</td>
<td>.63</td>
<td>-.44**</td>
<td>-.35**</td>
<td>-.11*</td>
<td>.22**</td>
<td>-.17**</td>
<td>.72**</td>
<td>.74</td>
<td></td>
</tr>
<tr>
<td>8. PA</td>
<td>3.80</td>
<td>.50</td>
<td>.69**</td>
<td>.30**</td>
<td>.30**</td>
<td>-.12**</td>
<td>.40**</td>
<td>-.48**</td>
<td>-.49**</td>
<td>.81</td>
</tr>
</tbody>
</table>

*Note. n=398. Reliability estimates are in parentheses. EC=emotional consonance, SA=surface acting, DA=deep acting, EE=emotional exhaustion, DP=depersonalization, PA=personal accomplishment. *p <.05. **p<.01.*

**Mediation Effects of Emotional Consonance**

As mentioned previously, bootstrapping approaches were used in this study to test whether emotional consonance mediates the effects of trait EI on emotional labor. Bootstrapping is performed by taking a very large number of samples with the same size as the original sample, sampling with replacement, and computing the statistic in each sample (Efron, 1987; Preacher & Hayes, 1994).

Three methods are commonly used when estimating confidence intervals in bootstrapped sampling distributions (Carpenter & Bithell, 2000). First is the percentile
method that involves sorting the bootstrap estimates of the statistic from smallest to largest, finding the values that define the upper and lower $100(\alpha/2)%$ of the sampling distribution (where $\alpha$ is the desired nominal Type I error rate), and declaring them as the lower and upper limits of the confidence interval (Preacher & Hayes, 2008). Though this method is the simplest, it has been criticized for poor coverage error when the bootstrap distribution is asymmetrical (Carpenter & Bithell, 2000).

To overcome shortcomings of the percentile method, the bias-corrected (BC) method was developed. However, it was found that the BC method also has substantially poor coverage error. This, in turn, led to the development of the bias-corrected and accelerated (BCa) method (Efron, 1987).

Preacher and Hayes (2008) provided an SPSS macro command set that can be applied to test the significance of indirect effects using the percentile method, BC method, and BCa method. Because this macro set was used in this study, the results of the analyses based on all three methods are presented.

Table 7

*Test of Indirect Effects of Trait EI on Emotional Labor through Emotional Consonance*

<table>
<thead>
<tr>
<th>Indirect Effect</th>
<th>Estimate</th>
<th>SE</th>
<th>Bootstrap 95% Confidence Interval</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td></td>
<td>Percentile</td>
</tr>
<tr>
<td>Trait EI $\rightarrow$ EC $\rightarrow$ SA</td>
<td>-.189</td>
<td>.036</td>
<td>(-.281, -.111)</td>
</tr>
<tr>
<td>Trait EI $\rightarrow$ EC $\rightarrow$ DA</td>
<td>.124</td>
<td>.026</td>
<td>(.076, .182)</td>
</tr>
</tbody>
</table>

*Note.* Based on 5,000 bootstrap samples; EC=emotional consonance, SA=surface acting, DA=deep acting, BC=bias-corrected, BCa=bias-corrected and accelerated.
If emotional consonance mediates the effect of trait EI on surface/deep acting, the indirect effect of trait EI on surface/deep acting through emotional consonance should be significantly different from zero. Then the direct effect of trait EI on surface/deep acting, controlling for emotional consonance, will be smaller than the total effect of trait EI on surface/deep acting.

As can be seen in Table 7, all bootstrap estimates of the 95% confidence interval for the indirect effect of trait EI on surface/deep acting did not contain zero regardless of the method used. Because the indirect effect of trait EI on surface/deep acting through emotional consonance was significantly different from zero at \( \alpha = .05 \), it was concluded that emotional consonance mediated the relationship between trait EI and surface acting and the relationship between trait EI and deep acting. Therefore, hypotheses 1d and 1e were supported.

Moderation Effects of Emotional Consonance

Hierarchical regressions were conducted to test moderation effects of emotional consonance on the relationship between ability EI and emotional labor. The results of the analyses are presented in Table 8.

Cohen, Cohen, West, and Aiken (2003) stated that the order of entry of independent variables in a hierarchical regression should be determined by causal priority, or the direction of causal flow. In other words, if there are any presumably causal relationships among the predictor variables, the causes should be entered before the effects. Thus, generally, demographic variables are entered in the first step, other potentially confounding variables are entered in subsequent steps, and the variables of main interest are entered in the final step (Petroceli, 2003).
Table 8

*Results of Hierarchical Regressions Testing Moderation Effects on Emotional Labor*

<table>
<thead>
<tr>
<th>Variable</th>
<th>Surface Acting</th>
<th>Deep Acting</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>SE B</td>
</tr>
<tr>
<td><strong>Step 1</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Gender</td>
<td>-.11</td>
<td>.07</td>
</tr>
<tr>
<td>Age</td>
<td>.03</td>
<td>.06</td>
</tr>
<tr>
<td>Education</td>
<td>.01</td>
<td>.03</td>
</tr>
<tr>
<td>Years Worked</td>
<td>.03</td>
<td>.02</td>
</tr>
<tr>
<td><strong>Step 2</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>(R²=.21; ΔR²=.20**)</td>
<td>(R²=.21; ΔR²=.21**)</td>
</tr>
<tr>
<td>Ability EI</td>
<td>-.03</td>
<td>.01</td>
</tr>
<tr>
<td>EC</td>
<td>-.45</td>
<td>.05</td>
</tr>
<tr>
<td><strong>Step 3</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>(R²=.22; ΔR²=.01)</td>
<td>(R²=.21; ΔR²=.00)</td>
</tr>
<tr>
<td>Ability EI × EC</td>
<td>.03</td>
<td>.02</td>
</tr>
</tbody>
</table>

*Note.* EC = emotional consonance; **p < .01.

Additionally, when interactions among variables exist, product terms of the variables should be entered after composite variables because interaction effects are meaningful only after the main effects are partialled out (Cohen et al., 2003).

Therefore, the demographic variables were entered in step 1 as variables that should be controlled for, ability EI and emotional consonance were entered in step 2, and the product term of ability EI and emotional consonance was entered in step 3 to test the interaction effect.
In step 2 of the hierarchical regressions, ability EI was found to have a negative relationship with surface acting ($\beta=-.15$, $t=-3.36$, $p<.01$) and a positive relationship with deep acting ($\beta=.13$, $t=2.93$, $p<.01$). Thus, hypotheses 2a and 2c were supported. Also, emotional consonance was found to have a negative relationship with surface acting ($\beta=-.42$, $t=-9.36$, $p<.01$) and a positive relationship with deep acting ($\beta=.43$, $t=9.46$, $p<.01$). This finding confirmed that hypothesis 1b was supported, but hypothesis 1c was not, as described earlier in the results of correlation analysis.

Step 3 of the hierarchical regressions indicated that emotional consonance did not moderate the relationship between ability EI and surface acting ($\beta=.06$, $t=1.40$, $p>.05$) and ability EI and deep acting ($\beta=.00$, $t=-.01$, $p>.05$). Because no interaction effects were found, hypotheses 2b and 2d were not supported.

The fact that emotional consonance accounted for most of the variance of surface acting and deep acting implies that emotional consonance is a main cause of emotional labor rather than a variable that moderates the relationship between ability EI and emotional labor. Concretely, employees with a high level of emotional consonance performed more deep acting and less surface acting than employees with a low level of emotional consonance when conducting emotional labor.

Hierarchical regressions were conducted again to test the moderation effects of emotional consonance on the relationship between emotional labor and job burnout. The results of the analysis are presented in Table 9.

In accordance with Cohen et al.’s (2003) instructions, demographic variables and ability EI were entered in step 1. These variables were entered first as probable causes of surface acting, deep acting, and job burnout. Because ability EI was not
significantly correlated with the demographic variables, it was entered with them simultaneously.

Table 9

Results of Hierarchical Regressions Testing Moderation Effects on Job Burnout

<table>
<thead>
<tr>
<th>Variable</th>
<th>Emotional Exhaustion</th>
<th>Depersonalization</th>
<th>Personal Accomplishment</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>SE</td>
<td>ß</td>
</tr>
<tr>
<td>Step 1</td>
<td>(R²=.11**)</td>
<td>(R²=.13**)</td>
<td>(R²=.10**)</td>
</tr>
<tr>
<td>Gender</td>
<td>-.01</td>
<td>.08</td>
<td>-.01</td>
</tr>
<tr>
<td>Age</td>
<td>-.13</td>
<td>.07</td>
<td>-.09</td>
</tr>
<tr>
<td>Education</td>
<td>.03</td>
<td>.04</td>
<td>.04</td>
</tr>
<tr>
<td>Years Worked</td>
<td>.03</td>
<td>.02</td>
<td>.07</td>
</tr>
<tr>
<td>Ability EI</td>
<td>-.08</td>
<td>.01</td>
<td>-.29**</td>
</tr>
<tr>
<td>Step 2</td>
<td>(R²=.18; ΔR²=.07**)</td>
<td>(R²=.18; ΔR²=.05**)</td>
<td>(R²=.25; ΔR²=.15**)</td>
</tr>
<tr>
<td>SA</td>
<td>.28</td>
<td>.06</td>
<td>.24**</td>
</tr>
<tr>
<td>DA</td>
<td>-.23</td>
<td>.07</td>
<td>-.17**</td>
</tr>
<tr>
<td>EC</td>
<td>.06</td>
<td>.07</td>
<td>.05</td>
</tr>
<tr>
<td>Step 3</td>
<td>(R²=.18; ΔR²=.00)</td>
<td>(R²=.18; ΔR²=.00)</td>
<td>(R²=.29; ΔR²=.04**)</td>
</tr>
<tr>
<td>SA × EC</td>
<td>-.05</td>
<td>.08</td>
<td>-.03</td>
</tr>
<tr>
<td>DA × EC</td>
<td>-.03</td>
<td>.10</td>
<td>-.02</td>
</tr>
</tbody>
</table>

Note. SA=surface acting, DA=deep acting, EC=emotional consonance; *p<.05, **p<.01.
Surface acting, deep acting, and emotional consonance were entered in step 2, and the product terms of surface acting and emotional consonance and deep acting and emotional consonance were entered in step 3 of the hierarchical regressions.

In the results of step 2, surface acting was positively associated with emotional exhaustion ($\beta=.24$, $t=4.51$, $p<.01$) and deep acting was negatively related to emotional exhaustion ($\beta=-.17$, $t=-3.24$, $p<.01$). Thus, hypotheses 3a and 3b were supported. Also, surface acting had a positive relationship with depersonalization ($\beta=.19$, $t=3.62$, $p<.01$), and deep acting had a negative relationship with depersonalization ($\beta=-.15$, $t=-2.77$, $p<.01$). Therefore, hypotheses 3e and 3f were supported. However, ability EI had a larger effect on emotional exhaustion ($\beta=-.29$, $t=-6.04$, $p<.01$) and on depersonalization ($\beta=-.33$, $t=-6.87$, $p<.01$) than surface or deep acting.

Surface acting did not have a significant relationship with personal accomplishment ($\beta=-.01$, $t=-.15$, $p>.05$). Thus, hypothesis 3i was not supported. In contrast, deep acting had a positive relationship with personal accomplishment ($\beta=.29$, $t=5.68$, $p<.01$). Consequently, hypothesis 3j was supported. Also, ability EI had a positive relationship with personal accomplishment ($\beta=.28$, $t=5.76$, $p<.01$).

In step 3 of the hierarchical regressions, it was found that emotional consonance did not moderate the relationships between surface acting and emotional exhaustion ($\beta=-.03$, $t=-.62$, $p>.05$) and surface acting and depersonalization ($\beta=.01$, $t=.14$, $p>.05$). Therefore, hypotheses 3c and 3g were not supported.

However, emotional consonance moderated the relationship between surface acting and personal accomplishment ($\beta=.20$, $t=4.35$, $p<.01$). To investigate whether the hypothesis on the moderation effect of emotional consonance was supported, a plot was
generated by solving the regression equation at high and low levels of emotional consonance. As Cohen et al. (2003) suggested, one standard deviation above the mean and one standard deviation below the mean were designated as the values for high level and low level of emotional consonance, respectively. The plot is presented in Figure 3.

Figure 3. Interaction effect of emotional consonance and surface acting on personal accomplishment. SA stands for surface acting, and EC stands for emotional consonance.

Significance of the simple slopes of personal accomplishment on surface acting at high and low levels of emotional consonance were tested by calculating $t$ values using the equation presented in Cohen et al. (2003). As presented in Figure 3, surface acting was not significantly related to personal accomplishment in high levels of emotional consonance ($b_{\text{high EC}}=.09$, $t=1.79$, $p>.05$) but was negatively related to personal accomplishment in low levels of emotional consonance ($b_{\text{low EC}}=-.22$, $t=-3.87$, $p<.01$). Thus, hypothesis 3k was supported.

Emotional consonance also did not moderate the relationships between deep acting and emotional exhaustion ($\beta=-.02$, $t=-.32$, $p>.05$) and deep acting and
depersonalization ($\beta=-.03$, $t=-.61$, $p>.05$). As a result, hypotheses 3d and 3h were not supported.

Nevertheless, the relationship between deep acting and personal accomplishment was moderated by emotional consonance ($\beta=.09$, $t=2.04$, $p<.05$). To investigate the moderation effect further, a plot was generated again, and significance of the simple slopes of personal accomplishment on deep acting at high and low levels of emotional consonance was tested by calculating $t$ values.

![Figure 4](image)

**Figure 4.** Interaction effect of emotional consonance and deep acting on personal accomplishment. DA stands for deep acting, and EC stands for emotional consonance.

As presented in Figure 4, the positive relationship between deep acting and personal accomplishment was stronger in high levels of emotional consonance ($b_{\text{high } EC} = .42$, $t=6.73$, $p<.01$) than low levels of emotional consonance ($b_{\text{low } EC} = .27$, $t=4.68$, $p<.01$). Therefore, hypothesis 3l was not supported.

Summary

Results of the data analysis are reported in this chapter. First, through correlation analysis, it was found that trait EI was positively related to emotional consonance, and
emotional consonance was negatively related to surface acting as hypothesized. However, emotional consonance was not negatively related to deep acting.

Second, bootstrap estimates of confidence intervals for indirect effects of trait EI on emotional labor indicated that emotional consonance mediated the effects of trait EI on surface acting and deep acting as hypothesized.

Third, in the results of hierarchical regressions, ability EI was found to have a negative relationship with surface acting and a positive relationship with deep acting as hypothesized. However, emotional consonance did not moderate the relationships between ability EI and the emotional labor processes.

In addition, surface acting was positively related to emotional exhaustion and depersonalization as hypothesized but was not negatively associated with personal accomplishment. In contrast, deep acting was negatively related to emotional exhaustion and depersonalization and was also positively associated with personal accomplishment.

Finally, emotional consonance did not moderate the relationship between emotional labor and emotional exhaustion and the relationship between emotional labor and depersonalization. However, the relationships between the emotional labor processes and personal accomplishment were moderated by emotional consonance.
CHAPTER 5

SUMMARY, DISCUSSION, IMPLICATIONS, AND RECOMMENDATIONS

A summary of the research, discussion of the findings of the study, theoretical and practical implications of the findings, and recommendations for future research are presented in this chapter.

Summary

Recently, emotion has become a central research topic in fields that aim at understanding organizational behavior. Especially, two concepts related to emotions have attracted considerable attention among scholars: emotional intelligence (EI) and emotional labor.

Though EI and emotional labor were developed in different fields of study, a more comprehensive understanding on the effects of emotions in the workplace can be acquired by integrating the two concepts together. However, there is still a lack of research that has investigated the relationship between EI and emotional labor, and, in the few studies that have explored how the concepts are associated, the findings appear to be inconsistent.

This research attempted to overcome the shortcomings of previous studies by making distinctions between trait EI and ability EI and considering the effects of emotional consonance on the processes of emotional labor.

Purpose and Hypotheses

The purpose of this study was to investigate the relationship between EI and emotional labor processes and its effect on job burnout. The major research questions were:
1. What is the relationship between EI and the processes of emotional labor?

2. What are the effects of EI and emotional labor on job burnout?

3. What are the effects of emotional consonance on the relationships among EI, emotional labor, and job burnout?

To investigate these questions, empirical research was conducted, and research hypotheses were established on the basis of a literature review:

*Hypothesis 1a*: There will be a positive relationship between trait EI and emotional consonance.

*Hypothesis 1b*: There will be a negative relationship between emotional consonance and surface acting.

*Hypothesis 1c*: There will be a negative relationship between emotional consonance and deep acting.

*Hypothesis 1d*: Emotional consonance will mediate the relationship between trait EI and surface acting.

*Hypothesis 1e*: Emotional consonance will mediate the relationship between trait EI and deep acting.

*Hypothesis 2a*: There will be a negative relationship between ability EI and surface acting.

*Hypothesis 2b*: The lower the emotional consonance, the stronger will be the relationship between ability EI and surface acting.

*Hypothesis 2c*: There will be a positive relationship between ability EI and deep acting.
Hypothesis 2d: The lower the emotional consonance, the stronger will be the relationship between ability EI and deep acting.

Hypothesis 3a: There will be a positive relationship between surface acting and emotional exhaustion.

Hypothesis 3b: There will be a negative relationship between deep acting and emotional exhaustion.

Hypothesis 3c: The lower the emotional consonance, the stronger will be the surface acting-emotional exhaustion relationship.

Hypothesis 3d: The lower the emotional consonance, the stronger will be the deep acting-emotional exhaustion relationship.

Hypothesis 3e: There will be a positive relationship between surface acting and depersonalization.

Hypothesis 3f: There will be a negative relationship between deep acting and depersonalization.

Hypothesis 3g: The lower the emotional consonance, the stronger will be the surface acting-depersonalization relationship.

Hypothesis 3h: The lower the emotional consonance, the stronger will be the deep acting-depersonalization relationship.

Hypothesis 3i: There will be a negative relationship between surface acting and personal accomplishment.

Hypothesis 3j: There will be a positive relationship between deep acting and personal accomplishment.
Hypothesis 3k: The lower the emotional consonance, the stronger will be the surface acting-personal accomplishment relationship.

Hypothesis 3l: The lower the emotional consonance, the stronger will be the deep acting-personal accomplishment relationship.

Procedures

A paper-and-pencil-based survey questionnaire with 77 items was formed by incorporating previously validated instruments. The Cronbach alphas, as a measure of reliability, for each instrument were acceptable within a range of .70 to .89, and the results of confirmatory factor analysis indicated that all measurements had construct validity.

With cooperation from an HRD manager, the survey was administered to 600 employees from 22 subsidiaries of a Korean conglomerate at the beginning of training sessions. They were participants in a leadership development program that was implemented by the HRD center of the conglomerate.

The HRD manager solicited participation in this study and the researcher introduced the research to the participants and collected the surveys. IRB permission was obtained for the procedures used in the research, ensuring informed consent and anonymity of information provided. Of the 600 surveys distributed, 401 were returned, resulting in a 66.8% response rate.

In the process of data screening, three outliers were eliminated, leaving 398 cases in the sample. Correlation analysis, bootstrapping, and hierarchical regressions were conducted to test the research hypotheses of the study.
Findings

First, the correlation analyses found that trait EI had a positive relationship with emotional consonance, and emotional consonance had a negative relationship with surface acting. However, emotional consonance was positively correlated with deep acting, in contrast with the research hypothesis.

Second, bootstrapping methods found that emotional consonance mediated the relationship between trait EI and emotional labor processes, supporting the research hypotheses.

Third, hierarchical regressions revealed that ability EI was negatively associated with surface acting and positively related to deep acting, but the relationships were weak. Emotional consonance did not moderate the relationship between ability EI and the emotional labor processes but explained most of the variance of surface and deep acting.

Fourth, through another session of hierarchical regressions, it was found that surface acting had a positive, and deep acting had a negative relationship with emotional exhaustion and depersonalization though the relationships were weak. While surface acting was not significantly related to personal accomplishment, deep acting had a positive and significant relationship with personal accomplishment.

Finally, in the final step of the hierarchical regressions, emotional consonance did not moderate the relationship between the emotional labor processes and emotional exhaustion and depersonalization. Nevertheless, it was discovered that emotional consonance moderated the relationship between emotional labor processes and personal accomplishment.
When details of the moderation effect were investigated, it was found that the relationship between surface acting and personal accomplishment was stronger in low levels of emotional consonance, while the relationship between deep acting and emotional consonance was stronger in high levels of emotional consonance.

Discussion

The results of this study relate to three research topics. First are the relationships among trait EI, emotional consonance, and emotional labor. Second are the relationships among ability EI, emotional consonance, and emotional labor. Third are the relationships among emotional consonance, emotional labor, and job burnout. Each topic is discussed in detail in this section.

Relationships among Trait EI, Emotional Consonance, and Emotional Labor

In this study, trait EI had a positive relationship with emotional consonance, which is consistent with the results of previous studies. Trait EI encompasses a broad range of dispositions and self-perceptions, including happiness, optimism, self-confidence, self-esteem, and stress management (Petrides & Furnham, 2003). Consequently, people with high trait EI tend to have positive emotions more frequently than those with low trait EI (Austin et al., 2008). Because display rules of most organizations require their employees to express positive emotions and suppress negative feelings in most cases (Diendorff et al., 2005), employees with high trait EI may naturally feel the emotions that are expected to be expressed in organizational settings.

Emotional consonance was found to be negatively related to surface acting but positively related to deep acting. This finding is not in accordance with the propositions
of previous studies that described emotional consonance as having a negative
relationship with both surface and deep acting (Grandey, 2003; Rubin et al., 2005).
When there is little discrepancy between the emotions an employee naturally feels and
the emotions that are required to be displayed, he or she would not feel the need to
make efforts in performing emotional labor (Rubin et al., 2005). Subsequently,
emotional dissonance was considered as the precondition for conducting emotional
labor because both surface and deep acting are effortful processes to modify feelings or
emotional display.

However, the finding of this study implies that employees who spontaneously
feel the required emotions also make effort to regulate their emotions while performing
emotional labor. Employees experiencing emotional consonance may make an effort to
adjust their feelings more delicately so they are appropriate for specific situations.

Grandey’s (2000) work shed light on this issue. She proposed that deep acting
can be associated with two strategies of emotional regulation: attentional deployment
and cognitive change. The former strategy is to think about events that call up the
emotions one needs in a situation, and the latter strategy is to perceive the situation in a
way that lessens its emotional impact (Gross, 1998).

Employees who generally experience emotional consonance may also rely on
these strategies as means of tuning their feelings in harmony with a situation or
maintaining their positive emotions. For example, employees who feel excited may
recall the day they lost their pet in an accident to calm down before meeting an
important client. Also, employees who feel happy may reappraise events in the
workplace as challenging rather than stressful to maintain their emotions (Grandey, 2000).

In contrast, people who experience a low level of emotional consonance, or a high level of emotional dissonance, may rely on suppressing their emotions rather than converting their emotions to meet the display rules in the workplace. Employees who generally experience emotional dissonance frequently feel conflict between their emotions and the emotions required by display rules (Morris & Feldman, 1996). As the frequency of this conflict gets higher, it is likely that employees will depend on surface acting rather than deep acting because they may perceive that more emotional resources and efforts are needed to transform their negative emotions than to control facial expressions or voice tones.

Emotional consonance mediated the relationship between trait EI and emotional labor. In other words, trait EI had a significant indirect effect on surface and deep acting via emotional consonance. This finding implies that the affective state of emotional consonance can account for the reason that employees with high trait EI conduct more deep acting and less surface acting than their counterparts with low trait EI. Because workers with high trait EI naturally feel the emotions that are required to be displayed in the workplace, they do not feel the need to fake emotions when performing emotional labor (Mikolajczak, Menil et al., 2007). Therefore, they can use alternative strategies, such as expressing natural feelings or adjusting their feelings to specific situations while they interact with customers or colleagues.
Relationships among Ability EI, Emotional Consonance, and Emotional Labor

Ability EI was found to be positively related to deep acting and negatively related to surface acting. People with high ability EI are more flexible in regulating emotions so their feelings are appropriate given the situation (Mayer & Salovey, 1997). Therefore, they are likely to control emotions rather than modify emotional display to meet the display rules.

Meanwhile, emotional consonance did not moderate the relationship between ability EI and emotional labor. Because employees with high levels of emotional consonance may not feel the need to regulate their emotions or emotional display to perform emotional labor (Rubin et al., 2005), the ability to regulate emotions may not have much significance for them. However, as described earlier, this assumption was not supported. Employees with a high level of emotional consonance performed less surface acting but also conducted more deep acting. In fact, the main effect of emotional consonance on surface and deep acting was stronger than that of ability EI. This finding suggests that whether employees will perform surface acting or deep acting largely depends on their level of emotional consonance.

Relationships among Emotional Consonance, Emotional Labor, and Job Burnout

Consistent with the results of previous studies that explored the relationship between emotional labor and job burnout, surface acting was found to have a positive effect on emotional exhaustion and depersonalization (Brotheridge & Lee, 2003; Montgomery et al., 2006; Näring et al., 2006; Totterdell & Holman, 2003). Because surface acting involves making an effort to suppress genuine emotions and displaying inauthentic emotional expressions, employees may feel energy depletion and fatigue in
the process (Grandey, 2000). To cope with this feeling, employees may also have a
tendency to detach from the customers by objectifying or depersonalizing them
(Brotheridge & Lee, 2002, 2003; Montgomery et al., 2006). Therefore, surface acting is
expected to be associated with these common dimensions of burnout.

Although surface acting was not significantly related to employees’ sense of
personal accomplishment, emotional consonance moderated the relationship between
surface acting and personal accomplishment. Concretely, surface acting did not have a
significant effect on personal accomplishment for employees with high levels of
emotional consonance but had a negative effect on personal accomplishment for
employees with low levels of emotional consonance.

Because employees who frequently experience emotional consonance are
inclined to have positive moods and feelings (Mikolajczak, Menil et al., 2007), they
may be more resilient when they encounter negative situations with customers or
colleagues that can lead to a sense of diminished personal efficacy. In other words, their
positive moods and feelings may buffer the negative effect of surface acting on personal
accomplishment. Also, as mentioned earlier, employees with a high level of emotional
consonance have the tendency to use more deep acting and less surface acting than their
counterparts with a low level of emotional consonance. Therefore, surface acting may
have less effect on individuals who generally experience emotional consonance.

In contrast with surface acting, deep acting was found to have a negative
relationship with emotional exhaustion and depersonalization. Though employees
should also make an effort to regulate their emotions to perform deep acting, they may
experience less burnout because the process is spontaneous, and their emotional display
is authentic if they succeed in matching their emotions with their emotional expressions (Brotheridge & Lee, 2002; Grandey, 2000). Additionally, through deep acting, employees may be provided with positive feedback from rewarding relationships with customers or colleagues (Brotheridge & Grandey, 2002; Hochschild, 1983).

Employees who conducted more deep acting experienced more personal accomplishment, but this relationship was stronger among employees with a high level of emotional consonance. It was originally suggested that the positive effect of deep acting on personal accomplishment would be stronger for employees who experience a low level of emotional consonance because employees who experience emotional consonance frequently were anticipated to have a sense of augmented personal accomplishment regardless of their level of deep acting.

However, the findings of this study indicated that emotional consonance and deep acting have a synergistic effect on personal accomplishment. Individuals who have a high level of emotional consonance may easily and effectively abide by the display rules of organizational settings when interacting with customers or colleagues (Rubin et al., 2005). Therefore, they will have a higher level of perceived self-efficacy in interpersonal relationships, which leads to a sense of personal accomplishment (Brotheridge & Grandey, 2002; Hochschild, 1983). In addition, as mentioned earlier, employees who generally experience emotional consonance also use deep acting more frequently than surface acting. Therefore, the positive effect of deep acting on their personal accomplishment may be strengthened.

Ability EI had a main effect on the dimensions of job burnout. In detail, ability EI had a negative effect on emotional exhaustion and depersonalization and a positive
effect on sense of personal accomplishment. An assumption of this study was that ability EI would have an indirect effect on job burnout through the processes of surface acting and deep acting. However, the results show that ability EI had a significant direct effect on job burnout. In fact, ability EI had a stronger effect on emotional exhaustion and depersonalization than did surface or deep acting.

In previous studies, ability EI was found to be related to positive interaction with colleagues, emotional support, overall social skills, prosocial behavior, and social competence (Brackett et al., 2006; Gil-Olarte et al., 2006; Lopes et al., 2004). Therefore, individuals with high ability EI may be able to form and maintain positive interpersonal relationships, which may provide satisfaction with their jobs. Also, because ability EI is related to self-confidence and psychological well-being (Brackett et al., 2006, Gil-Olarte et al., 2006), employees with high ability EI may be able to cope with stress more effectively. These may be the reasons for the significant direct effect of ability EI on job burnout.

Implications of the Study

Implications of the findings of this study for theory and practice in the field of human resource development are presented in this section.

Theoretical Implications

Though research on emotional labor has increasingly been conducted, the various definitions of concepts related to emotional labor have brought confusion and misunderstanding. The concept of emotional dissonance is a representative example. Some scholars have defined it as the discrepancy between an individual’s actual feelings and the feelings expressed (e.g., Adelmann, 1989), while others have referred
to it as a mismatch between one’s genuine feelings and the feelings required to be displayed by organizations (e.g., Morris & Feldman, 1997). The former perspective regards emotional dissonance as a consequence of emotional labor, while the latter considers it as a precursor to emotional labor.

To clarify the concept, Rubin et al. (2005) defined emotional dissonance as a perceived emotional state that motivates one to perform emotional labor. Their main assumption was that, if an individual does not experience emotional dissonance, there would be no need to perform emotional labor regardless of the requirements of organizations. Following Rubin et al.’s (2005) approach to emotional dissonance, this study proposed that emotional dissonance would moderate the relationship between EI and emotional labor and the relationship between emotional labor and job burnout.

However, a main finding of this study was that employees who did not experience emotional dissonance still performed emotional labor via the process of deep acting. This finding suggests that emotional dissonance may not be a precondition for an individual to conduct emotional labor. Instead, emotional dissonance had an effect on selection of the strategy to conduct emotional labor. That is, when employees perceived a discrepancy between their genuine emotions and the emotions that are required to be displayed, they preferred surface acting to deep acting.

One reason can be found in the association between trait EI and emotional consonance. The significant relationship between the two constructs indicates that workers with high trait EI tend to experience emotional consonance more frequently. The concept of trait EI encompasses positive feelings or moods, such as self-confidence and optimism, and self-perceived abilities regarding perception and regulation of
emotions (Petrides & Furnham, 2003, 2007). Thus, employees with high trait EI would perceive themselves as being able to regulate emotions effectively. These self-perceived dispositions and abilities may influence an individual to experience emotional consonance frequently. That is, those who think they are in control of their emotions also may think that their genuine feelings generally match the emotions that are required to be displayed. Therefore, when given the choice of faking emotions or regulating emotions, they may select the latter strategy. In short, the affective state of emotional consonance may involve a sense of self-efficacy that leads to selection of deep acting as the strategy to perform emotional labor.

A possible explanation for the reason that individuals who perceive themselves as already having the emotions to be displayed also make additional efforts to regulate their emotions was provided earlier. The perception of emotional consonance is distinct from actual display of required emotions. To respond to the perceived emotional state, individuals may willingly make efforts to elaborate their emotions and adjust them to specific situations. One way is to change the focus of attention, and another way is to change appraisals of the situation (Grandey, 2000; Gross, 1998).

Originally, ability EI was proposed as the individual difference that affects whether an employee would perform surface acting or deep acting because the concept of ability EI includes one’s actual ability to regulate emotions (Mayer & Salovey, 1997). However, as previously discussed, trait EI had a greater effect than ability EI on the choice of behavior via emotional consonance. This implies that self-perceived ability to regulate emotions may have more influence than one’s actual ability to control emotions when making decisions regarding the strategy of emotional labor.
However, ability EI had a significant direct effect on job burnout, an outcome of emotional labor. Especially, ability EI had a greater effect on emotional exhaustion and depersonalization than did surface acting or deep acting. Though self-perceived emotional consonance may affect the choice of strategy to perform emotional labor, whether an individual is actually able to regulate emotions may determine the outcomes of emotional labor. When the goal of making one’s emotions in accordance with the display rules is not accomplished, negative outcomes can occur because of inauthentic expressions and unsatisfactory interpersonal relationships (Brotheridge & Lee, 2002; Grandey, 2000; Montgomery et al., 2006).

The discussion so far suggests that the conceptual framework that was the foundation of this study needs some modification. Thus, a revised model, based on the results of this study and possible explanations for these findings, is presented in Figure 5.

Figure 5. Revised framework of emotional labor.

One of the main changes is that emotional dissonance is regarded as a consequence of emotional labor rather than the precondition for emotional labor. This
perspective is in consistent with Adelmans’s (1989) definition of emotional dissonance. As found in this study, emotional dissonance, as a perceived affective state, did not motivate one to perform emotional labor but affected one’s choice of strategy for performing emotional labor. Also, the affective state was closely related to self-perceived dispositions and abilities. Therefore, it is suggested that this emotional state of emotional consonance can be included as a part of one’s perception of self. How individuals perceive themselves and the situation given to them may affect whether they will use surface acting or deep acting to conduct emotional labor.

Considering emotional dissonance as a consequence of emotional labor also has the following advantages. First, this approach explains the reason that ability EI has a significant effect on the work outcomes of emotional labor, such as job burnout. Whether one uses the strategy of surface acting or deep acting does not solely determine if one experiences job burnout after performing emotional labor. A person’s actual ability to perceive and regulate emotions, or ability EI, also has influence on the outcomes. Unless employees have sufficient abilities of emotional regulation, they can fail to match their inner feelings with their emotional display even when they conduct deep acting. Therefore, conceptualizing emotional dissonance as a consequence of emotional labor manifests why ability EI as well as deep acting is needed to bring about positive outcomes through emotional labor.

Second, if emotional dissonance is considered as a consequence of conducting surface or deep acting, the effect of emotional labor on work outcomes becomes more clarified. If employees experience emotional consonance after conducting deep acting, the process will have a positive effect on their personal and organizational well-being.
However, if emotional dissonance is experienced by surface acting or failure in deep acting, emotional labor is more likely to cause negative outcomes.

However, more investigation should be conducted to test the original research model of this study. Because hierarchical regressions were conducted in this exploratory research, other advanced statistical methods, such as structural equation modeling, are recommended to be used in future studies for verification of the original model or the revised model.

*Practical Implications*

Extensive attention has been paid to the construct of EI by HRD practitioners for the last decade, and a large number of organizations have designed or implemented EI training and development programs. There are still consulting firms and publishing companies that suggest EI as a general solution for a wide range of problems within organizations, and some practitioners have integrated EI into every service they offer to clients (Schmit, 2006). However, the findings of this study suggest that more caution is required when using EI applications within organizational settings.

The sensation created by EI can be partially attributed to exaggerated claims made by popular books and press articles (e.g., Cooper & Sawaf, 1997; Goleman, 1998). In the commercial world, EI has been promoted as a construct that is much more significant than cognitive intelligence in predicting work performance and life success (Jordan, Ashton-James, & Ashkanasy, 2006; Murphy, 2006). Nevertheless, these claims are largely based on anecdotes and suppositions rather than on scientific research. There are organizations (e.g., American Express) that have asserted that their EI interventions have led to great improvements in business growth (Schmit, 2006). However, there is
no proof that their success can be attributed to the sole effect of EI development programs. Also, though some empirical studies have provided evidence for the effects of EI on job performance above and beyond cognitive intelligence or other personality dimensions (e.g., Law et al., 2008; Sy et al., 2006), they have not suggested that EI is more significant than other constructs in predicting work outcomes. Neither has it been shown that training and development programs have an effect on the EI of individual employees or on the organization as a whole.

Nevertheless, these facts do not necessarily imply that the concept of EI is of little value for practitioners. It may not be possible to isolate the effects of EI on job performance or financial results within organizational settings. However, it has been shown that abilities of emotional perception and regulation have significant effects on psychological well-being of organizational members (Grandey, 2003; Näring et al., 2006), which, in turn, may affect their performance though more research is needed before such a statement can be confirmed. Also, EI may be required for employees with jobs that involve emotionally charged situations, as the concept of emotional labor suggests (Schmit, 2006).

When HRD practitioners design EI interventions, in spite of the lack of evidence that such interventions can be designed and be effective, they will have to pay more attention to the diverse definitions and measurements of EI. First, practitioners should be able to make a distinction between ability EI and trait EI. The main difference is that ability EI is assessed with performance tests and is considered as a form of intelligence, while trait EI is measured via self-report tests and is closely related to the personality domain (Petrides & Furnham, 2000. 2003). Because scores on ability EI tests are found
to have a low correlation with scores on trait EI tests (van Rooy et al., 2005), it is recommended that the two types of EI should be treated as distinct constructs.

HRD practitioners should be aware that there will be more limitations in developing trait EI than ability EI because the former involves a wide range of dispositions and temperaments that are largely affected by genetic factors (Petrides & Furnham, 2000). Especially, trait EI is unlikely to be developed through short-term interventions; in fact, it is questionable whether it can be developed in a work context. Meanwhile, ability EI encompasses mental abilities that can be improved by knowledge on emotions and rule-based skills. For instance, emotional understanding, a branch of ability EI, entails understanding what events trigger specific emotions, how emotions combine to form complex blends of feelings, and how emotions progress over time and generate a chain of emotional reactions (Lopes et al., 2006). Therefore, improvement of ability EI may be a more appropriate target for training and development programs.

Second, practitioners should be aware of the strengths and shortcomings of existing measurements of EI. There is still a lack of EI instruments that have sufficient evidence for their construct validity. There are a few measurements that have hitherto shown a stable factor structure, such as the TEIQue (Petrides, 2001) and WLEIS (Wong & Law, 2002). However, they are self-report tests that should be used to assess trait EI. A main shortcoming of self-report EI tests is that they are vulnerable to response biases and social desirability effects (Matthews et al., 2002). Consequently, the scores obtained by these tests may not be suitable for being used as criteria for selection or promotion within organizations.
There are a few EI performance tests, such as the MSCEIT (Mayer et al., 2002). However, the factor structure of the MSCEIT has not been shown to be stable in some validation studies (Gignac, 2005; Keele & Bell, 2008; Palmer et al., 2005; Roberts et al., 2006; Rossen et al., 2008). Also, another main shortcoming of EI performance tests is that it is difficult to find an appropriate scoring method because the responses are heavily influenced by cultural factors (Roberts et al., 2001). An alternative avenue is to use performance tests that have been developed and validated to be administered within a specific cultural context. Examples are Wong’s Emotional Intelligence Scale (WEIS) for Chinese (Wong, Law, & Wong, 2004) and the Emotional Intelligence Test for Korean Adults (Moon, 1999), which was used in this study.

Though EI has been widely applied in organizational settings, it is difficult to find interventions that have integrated concepts related to emotional labor within organizational settings. Maybe this is because empirical research on the construct has not been actively conducted until recently. However, more and more researchers are attempting to define operationally emotional labor and develop measurements to assess constructs related to emotional labor (e.g., Brotheridge & Lee, 2003; Glomb & Tews, 2004; Kruml & Geddes, 2000; Schaubroeck & Jones, 2000).

Especially, the concepts of surface acting and deep acting require attention from HRD practitioners because these are two different strategies of emotional labor that can bring about different outcomes. Results of a number of studies, including this research, indicate that surface acting is associated with emotional exhaustion and depersonalization (Brotheridge & Lee, 2002, 2003; Grandey, 2003; Montgomery et al., 2006; Totterdell & Holman, 2003). Therefore, providing employees with opportunities
to learn specific skills of deep acting may contribute to their psychological well-being. Examples of the skills are attentional deployment and cognitive change. As described earlier, the former strategy is to think about events that call up the emotions one needs in a situation, and the latter strategy is to perceive the situation in a way that lessens its emotional impact (Grandey, 2000; Gross, 1998).

Limitations of the Study

There are some limitations in interpreting the findings of this study. First, because convenience sampling was used to collect data from a large sample, the results may not be generalizable, either for the target organizations or for other organizations. Though the sample included diverse types of organizations that have distinct characteristics, they were all subsidiaries of a single conglomerate. Therefore, it is possible that specific norms and values had influence on the results.

Second, the results of this study may not be generalizable to non-Korean contexts. As mentioned previously, culture has significant effects on how people appraise and express emotions (Kalat & Shiota, 2007). Thus, characteristics of the Korean culture, such as collectivism and high power distance, might have influenced the participants’ responses.

Third, the findings of this study may not apply to other organizations because emotions are heavily influenced by organizational cultures. Organizational cultures define the range of emotions that can be displayed in the workplace and directly affect the affective states of organizational members themselves (Rafaeli & Sutton, 1989). In consequence, the results of this study may not be generalized to workers at organizations with different cultural settings.
Fourth, though the findings of this study suggest that interventions aimed at developing employees’ EI may be useful for organizations, they do not imply that it is possible to design EI development programs or that implementation of these programs might be actually effective in developing EI. These topics were out of the range of this study, and further research is required to reach conclusions regarding these issues.

Fifth, limitations in the measurements that were used in this study may constrain the applicability of the findings. As discussed in the literature review, there is still controversy among scholars over the definition and measurement of EI and emotional labor. Though instruments that were previously validated within a Korean culture were used in this study, the responses to these measurements may have been affected by a variety of situational factors.

Recommendations for Future Research

In the literature review of this study, it was found that empirical research has been actively conducted on the desired effects of EI in personal life as well as in organizational settings (e.g., Brackett et al., 2006; Law et al., 2008; Lopes et al., 2005; Singh & Woods, 2008). However, there was scant research that explored whether EI can be actually developed. This is a central issue for the field of HRD because proof of EI development serves as a rationale for designing and implementing EI interventions. Mayer, Caruso, and Salovey (1999) argued that EI meets the developmental criterion of intelligence because it was found that EI increases with age in their research. However, this study was based on a cross-sectional design and provided evidence only of age group differences. Therefore, more experimental or longitudinal studies should be conducted on this issue.
In this study, Zeidner et al.’s (2003) multi-level model was proposed as a conceptual framework that can integrate the concept of trait EI and ability EI. Elaboration of this model is required in future research. The strengths of this model are that it connects the concept of EI with phases of human development and that it admits EI is affected by both genetic and environmental factors. Researchers should investigate this model further to advance understanding on the construct of EI.

More research on the effects of culture on EI and emotional labor should be conducted. Though culture affects the way people appraise and display emotions (Matsumoto, 1990; Scherer, 1997), there is still a lack of research that considers the influence of culture on emotions. Because display rules are defined not only by the culture of an organization, but also by societal norms and values, the cultural context should be considered as an important factor in research on emotional labor. The relationships between characteristics of the cultural setting and the processes of surface and deep acting have not been identified in previous research.

The revised theoretical model of emotional labor should be tested in future studies. It proposes that emotional dissonance should be viewed as a consequence rather than as the precondition for emotional labor. The underlying ideas were that employees who do not feel discrepancy between their natural feelings and the emotions required by the display rules can still perform emotional labor to adjust their feelings and that whether an employee experiences emotional dissonance after performing emotional labor will determine the work outcomes. These propositions need to be verified in empirical studies.
This study focused on the effect of emotional labor on job burnout because it was considered as a main outcome of emotional labor and is directly related to organizational members’ well-being. However, job burnout is merely one of the various outcomes that can result from emotional regulation in the workplace. As described in previous studies, emotional labor does not only bring about negative outcomes, but also can have a large number of desirable effects within organizational settings (Brotheridge & Lee, 2002; Grandey, 2000; Hochschild, 1983; Rubin et al., 2005). Therefore, more research should be conducted on the positive effects of emotional labor on work outcomes, such as job satisfaction and organizational commitment.

Finally, though research on emotional perception and regulation has a long history in the field of psychology, these studies have somehow not been fully integrated into current research on EI (Roberts, Schulze, Zeidner, & Matthews, 2005). For example, though there are various measurements that have been developed to assess abilities of processing emotional information (e.g., Matsumoto et al., 2000; Nowicki & Carton, 1993), developers of EI measurements have not paid sufficient attention to these tools (e.g., Mayer et al., 2002; Goleman, 1998). The vast knowledge obtained by psychological research on emotional perception and regulation should be assimilated in future EI studies to make further advances in development of theories and instruments and to gain a more comprehensive understanding on the effects of emotions on organizational behavior.
REFERENCES


*Psicothema, 18*, 13-25.


Brotheridge, C. M. (2006). The role of emotional intelligence and other individual difference variables in predicting emotional labor relative to situational demands. *Psicothema, 18*, 139-144.


APPENDIX A

Script for Introduction of Study to the Participants

(English and Korean Version)
INTRODUCTION OF STUDY

Glad to meet you everyone, I am Hyuneung Lee, a Ph.D. candidate in the Human Resource Development (HRD) program at the University of Minnesota in USA. Currently, I am conducting a dissertation research on the relationship of emotional intelligence and emotional labor and its effect on job burnout in Korean organizations. You were selected as a possible participant because the HRD center of your organization consented to support this study. However, you can still decide whether you will participate or not in this research. Feel free to ask any questions before deciding to be in the study.

Background Information

The purpose of this study is to integrate the concepts of emotional intelligence and emotional labor to gain a more complete understanding of the relationship between employees’ emotions and organizational behavior. The focus of this study is on the effect of employees’ emotional intelligence and emotional labor on job burnout.

Procedures

If you agree to be in this study, we would ask you to respond to a multi-item questionnaire that measures variables related to emotional intelligence, emotional labor, and job burnout. Also, there are items which collect information on your gender, age, level of education, job title, type of job, and years of employment. However, the collected information will be used neither by the researcher nor your employer to identify you. In addition, private information, such as your name, address or phone number will not be collected. The expected time to complete this questionnaire is 15-20 minutes.
Risks and Benefits of Being in the Study

There will be no physical or psychological risks in participating in this study. Though the benefit of participation may not be related to you directly, you can contribute to a more comprehensive understanding on the effect of emotions in Korean organizations.

Compensation

There will be no compensation for participation.

Confidentiality

The records of this study will be kept private. In any sort of report we might publish, we will not include any information that will make it possible to identify a subject. Research records will be stored securely and only researchers will have access to the records. After survey responses are collected, company names will be coded appropriately, and all data will be maintained anonymously. Since only the aggregated results will be reported, individual results will remain confidential.

Voluntary Nature of the Study

Participation in this study is voluntary. Your decision whether or not to participate will not affect your current or future relations with the University of Minnesota or your employer. If you decide to participate, you are free to not answer any questions or withdraw at any time without affecting those relationships.

Contacts and Questions

If you have any questions, please ask me now. If you have questions later, you can contact me at leex1630@umn.edu or 010-8330-0629.

Thank you for paying attention.
본 연구에 대한 소개

안녕하세요, 저는 미국 미네소타 대학교에서 박사과정으로 인적자원개발(HRD)을 전공하고 있는 이현응이라고 합니다. 만나 뵙게 되어서 반갑습니다. 현재 저는 박사논문을 위해 "한국 기업에서 정서지능 및 감정노동이 직무소진에 미치는 영향"에 대해 연구하고 있습니다.

여러분의 HRD 센터에서 제 연구를 지원하는 것에 동의함에 따라 이렇게 여러분께 협조를 요청하게 되었습니다. 그러나 본 연구에 참여할 지의 여부는 여러분께서 직접 결정하실 수 있습니다. 만일 궁금한 점이 있으시면 언제든지 질문해 주십시오.

연구 배경
본 연구의 목적은 정서지능과 감정노동의 개념을 통합하여 정서가 조직 행동에 미치는 영향에 대해 더 심도 있는 이해를 하기 위한 것입니다. 이 연구의 초점은 조직 구성원의 정서지능 및 감정노동이 직무소진에 어떠한 영향을 미치는지 알아보는 데에 있습니다.

연구 절차
만일 이 연구에 참여하기로 결정하시면 설문조사에 응답하게 될 것입니다. 본 설문조사의 문항은 정서지능과감정노동, 직무소진과 관련이 있는 변인들을 측정할 것입니다. 여러분의 성별이나 나이, 학력, 직위, 직종, 근무년수에 대해서 묻는 질문도 있습니다. 그러나 본 조사를 통해 수집한 정보를 연구자나 여러분의 조직이 응답자의 신원을 밝히는 데에 사용하는 일은 절대로 없을 것입니다. 그리고 성명이나 주소, 전화번호와 같은 개인 정보는 결코 수집하지 않을 것입니다. 본 설문에 응답하시는 데에 15~20 분 정도 소요될 것입니다.

위험이나 해택
본 연구에 참여하는 과정에서 신체적으로나 심리적으로나 피해를 입는 일은 없을 것입니다. 또한 개인적으로 직접적인 해택은 없으나, 여러분의 참여가 한국의 기업 내에서 정서가 미치는 영향에 대한 이해를 넓히는 데에 기여할 수 있을 것입니다.
보상
본 연구에 참여함으로써 받는 보상은 없습니다.

개인 정보 보호
여러분의 응답 기록은 절대로 보호될 것입니다. 그리고 연구 결과에 대해서 보고할 때에도 개인의 신원을 확인할 수 있는 정보는 결코 포함되지 않을 것입니다. 여러분의 응답 기록은 안전하게 보관될 것이고, 오직 연구자만이 접근 가능할 것입니다. 설문 조사 후에 여러분의 회사의 이름도 코딩하여 직접적으로 확인이 가능하지 않도록 할 것입니다. 여러분의 응답 기록을 모두 합쳐서 연구 결과에 보고할 것이기 때문에 개인의 응답을 확인할 수 있는 방법은 없을 것입니다.

자발적 참여
본 연구에 참여할 지의 여부는 여러분께서 자발적으로 결정하시면 됩니다. 여러분의 결정은 미네소타 대학이나 여러분의 조직과의 관계에 어떠한 영향도 미치지 않을 것입니다. 본 연구에 참여하기로 결정하시더라도 언제나 그 결정을 철회하실 수 있습니다.

문의사항 및 연락처
만일 궁금한 점이 있으시면 지금 질문하시기 바랍니다. 나중에 흔히 궁금한 점이 생기시면 leex1630@umn.edu 나 010-8330-0629 로 연락하시기 바랍니다.

지금까지 들여주셔서 대단히 감사합니다.
APPENDIX B

Survey Questionnaire

(English and Korean Version)
Thank you for your participation. The purpose of this study is to investigate the relationship of emotional intelligence and emotional labor and its effect on job burnout in Korean organizations.

This questionnaire consists of five sections that collect data on emotional intelligence, emotional labor, and job burnout and demographic information. The information that you provide will be kept anonymously and confidentially and used in aggregated summaries for research purposes only.

The questionnaire should take you 15-20 minutes to complete. If you have any questions while responding to the survey, please feel free to ask me. If you have further questions or comments, please contact me at leex1630@umn.edu or at 010-8330-0629 (Korea). Thank you once again.

Sincerely,

Hyuneung Lee
Researcher
Part I. For each statement, please indicate your level of agreement by checking the box that best matches your perception of self. Remember that there is no right or wrong answer.

1. I can recognize others’ feelings and moods even when I don’t know them well.
2. If I have to do something I don’t like, I try to change my mind and enjoy it.
3. I can control my emotions well.
4. When I feel empty after completing a task, I try to cheer up and be ready for the next event.
5. I recognize others’ feelings through voices, tones, or facial expressions.
6. I can change my moods when I feel depressed.
7. I can label emotions of self and others.
8. I have my own way to cheer up when I feel down.
9. When I don’t feel like doing my work, I try my best to overcome my feelings.
10. I know how to calm down anger.
11. If I hear good news about my colleague, I like to celebrate together.
12. I can change my emotions according to the situation.  

13. I try to forget bad things quickly.  

14. I understand the emotions and feelings expressed in pictures or music.  

15. I understand that there are complicated and delicate feelings and emotions.  

16. I don’t lose hope even when things don’t go well.  

17. I can perceive my emotions to do things in order.  

18. When I feel afraid or something, I don’t avoid but encounter it.  

19. I understand that a person can love and hate someone at the same time.  

20. I can console and comfort others effectively.
Part II. Choose the answer that best matches what actions you would take in the given situation. You can choose only one answer.

21. Climbing a mountain, you met a heavy snowfall and sheltered in a cave. It is already getting dark, and the rescue team is not likely to find you. What would you do in this situation?
   a. Try to be calm and sleep until the sun rises tomorrow.
   b. Try to do anything that can tell others where your shelter is.
   c. Do not attempt to do anything because you are scared.
   d. Take a risk to find a way home.

22. Because you are a popular doctor, there are usually more than ten patients waiting their turns outside your room. One day, you found an old friend waiting in the end of the line. What would you do in this situation?
   a. Greet your friend and let him/her enter your room before other patients.
   b. Because you will be able to see your friend when his/her turn comes, you call the next patient in the line to come in.
   c. Say hello to your friend and tell him/her that you have to take care of the patients in turn.
   d. Have a short break to say hello to your friend. If he/her is in a hurry, you give treatment to your friend during the break.

23. You are an employee of a firm. Last night you had a drink with your supervisor and subordinates, but the next day you found out that you were drunk and made mistakes to others. What would you do in this situation?
   a. Think that it is all right because you were drunk when the incident happened.
   b. Feel embarrassed and make apologies to each person.
   c. First find out what kind of mistake you made, and then plan what to do.
d. Feel embarrassed and decide that you will never be drunk again.

24. You are a supervisor of a team in a firm. You told your team members that you strongly believe that discrimination based on a person's hometown undermines the unity of people in a nation as well as a company. However, one day you happen to hear some team members making jokes about people from a specific region. What would you do in this situation?
   a. Pretend that you did not hear them because jokes are just jokes.
   b. Summon them later and give a warning.
   c. Explain to them why what they did is wrong right away.
   d. Take disciplinary actions and penalize them.

25. You are an employee of an insurance company. You called 15 high school friends to canvass for insurance, but they all refused and you feel depressed. What would you do in this situation?
   a. Console yourself thinking that it will be a better day tomorrow and plan which friend to call.
   b. Think that you will call people other than your friends because you don't want to become estranged from them.
   c. Reflect seriously whether your job fits you, spending a few days if required.
   d. Though disappointed, try to cheer up and continue calling other friends because they are most likely to accept your offer.

26. You witnessed a hit-and-run accident at an alley on your way home. The driver was your neighbor with whom you are friendly with. What would you do in this situation?
   a. Visit your neighbor and propose giving himself/herself up to the police.
   b. Pretend that you did not see anything because you don't want to get involved in the case.
c. Check the state of the victim and take actions that are necessary.

d. Though the driver is your friend, inform the victim of his/her identity because a hit-and-run accident is a crime.

27. You had argument with your spouse about financial matters this morning. Because you were heavily insulted, you are still angry and cannot concentrate on work. What would you do in this situation?

a. Think of where to go after finishing work today because you don't feel like going home.

b. Think of how to argue against what your spouse said and how to persuade him/her that you have a different view when you return home.

c. Considering that such conflict does harm to both you and your spouse, you think of how to make up with him/her.

d. Considering that your spouse would also have been upset all day, you feel sorry and decide to go home early after work.

28. You are in a taxi heading to the airport. If you don't arrive there in 30 minutes, it seems that you will miss your flight. However, you are caught in a traffic jam and the taxi cannot move at all. What would you do in this situation?

a. Because feeling nervous does not help at all, you read a book or listen to the radio instead.

b. Concerned about missing your flight, you find it hard to think about something else.

c. Think of what you will do if you arrive late and miss your flight.

d. Try to be calm and think that you can only do your best in this situation.

29. One day someone tells you that your best friend speaks ill of you to others. What would you do in this situation?

a. Call your friend right away to find out if it is true.
b. Try to be patient though you feel bad.

c. Don't think much of it because it was a third party that spoke to you and check it out later.

d. Don't care about it at all.

30. There was a rumor that you will get promoted soon at your workplace. But you found out that your junior in school got promoted instead. What would you do in this situation?

a. Don't feel like talking to anyone.

b. Make complaints because you are fit for the job.

c. Call a friend to have a drink and change your mood.

d. Try to stay calm and decide to wait for the next chance though you are disappointed.

31. Today is not your day. People are grumbling at you, and to make matters worse, you missed an important meeting because you were at the wrong place. You still have a lot of work to do. What would you do in this situation?

a. Think that it will be a better day tomorrow and make plans again.

b. Wait a while until you feel better.

c. Think of a way to change your mood because you cannot do anything in the current state.

d. Try to be patient, but eventually start to grumble at others.

32. You are a member of a rescue squad. Because of a heavy snowfall, a few mountain climbers are missing. After working for three days and nights to find them, you are given some time to rest. However, the families of the missing people request that you continue the search. What would you do in this situation?

a. Take a rest because you are tired.

b. Continue finding the missing people because of the request.
c. Feel upset because the families do not consider how tired you are.

d. Tell the families that you need a rest to continue searching for them later.

33. You are a new employee in a company. Though you worked extra hours for a few days, you made a mistake. Your supervisor scolds you badly only thinking about the results, and you feel upset. What would you do in this situation?
   a. Think of a way to reduce stress.
   b. Think of your limitations and reflect on whether the job fits you.
   c. Admit your mistake and think that it was good experience.
   d. Tell your supervisor politely that he/she has to consider how hard you worked before scolding you.

34. After failing in business, you are selling items in buses. One day you found your respected teacher on the bus, but it seems that he/she does not recognize you. The teacher made much of you when you were a high school student. What would you do in this situation?
   a. Feel ashamed and get off the bus.
   b. First sell the items, and then say hello to your teacher getting off the bus with him/her.
   c. Say hello to your teacher though you feel ashamed.
   d. Pretend that you did not see him/her and sell the items.

35. You are going to marry soon. However, you had a quarrel with your future-spouse because of marriage expenses. You don't think that he/she is reasonable. What would you do in this situation?
   a. Point out why his/her opinion is not reasonable, and try to persuade him/her.
   b. Follow his/her opinion not to cause problems though you still think that you are right.
   c. Show examples to explain why your opinion makes sense.
d. Try to stand in his/her shoes and understand his/her opinion.

36. You are worried about your weight these days, so you decided to be on a diet. The first day, you could successfully control your food till lunch. However, in the evening, it appears that you have to dine together with your co-workers. What would you do in this situation?
   a. Have dinner as much as you want thinking 'I'll start the diet again tomorrow.'
   b. Don't dine together with your co-workers even though you have to.
   c. Plan that you will not eat much, but you cannot overcome the temptation when you see the food.
   d. Tell your co-workers about your diet and let them understand why you are not eating much.

37. You are waiting for a friend to watch a play together. The play starts to begin, but, as usual, your friend doesn't show up in time. Now the play is over, and you feel furious. What would you do in this situation?
   a. Go home at once.
   b. Wait till your friend comes and blame him/her for being late.
   c. Wait and ask your friend why he/she was late, then decide what to do.
   d. Wait your friend, but when he/she appears, you don't look at his/her face.

38. A teacher you respect introduced a person to you and proposed having a relationship with him/her. However, you did not call the person afterwards because he/she was not your type. One day your teacher tells you that the person wants to see you again. What would you do in this situation?
   a. See him/her again because your teacher told you to do so.
   b. Feel sorry for your teacher, but refuse to see him/her again to make things clear.
   c. Contact the person directly and ask for his/her understanding.
d. Wait until the person comes to know what you think of him/her.

39. You have given warnings to your neighbor for being too noisy. However, one day it is very hot, and your neighbor's windows are all open, so you can hear all the noise he/she makes. What would you do in this situation?
   a. Retaliate on your neighbor because talking to him/her is useless.
   b. Try to be patient and suppress your anger.
   c. Call the police because your neighbor is invading your privacy.
   d. Visit your neighbor and ask them to stop making noise.

40. Your spouse is quite meticulous and usually full of complaints. Because you had a rough time today, you wanted to have a good rest at home. However, your spouse is making complaints about little things as usual. What would you do in this situation?
   a. Get angry because your spouse crossed the line.
   b. Go outside to stay calm.
   c. Tell your spouse directly that you don't like her making complaints.
   d. Resent his/her not being able to understand your feelings.
Part III. How often do you do each of the following on an average day of work? Please respond to each question by checking the box that matches your perception best. Remember that there is no right or wrong answer here.

41. My genuine feelings match the emotions I should express to others (customers or coworkers).

42. I resist expressing my true feelings.

43. I make an effort to actually feel the emotions that I have to display to others.

44. I pretend to have emotions that I don’t really have.

45. The emotions I have to show to others come naturally.

46. I try to really feel the emotions that I have to show as part of my job.

47. I hide my true feelings about a situation.

48. I spontaneously feel the emotions I have to show to others.

49. I try to actually experience the emotions that I must show.
Part IV. For each statement, please indicate your level of agreement by checking the box that best matches your perception of self. Remember that there is no right or wrong answer.

50. I feel used up at the end of the workday. 1 2 3 4 5

51. I can easily understand how my customers or coworkers feel about things. 1 2 3 4 5

52. I feel fatigued when I get up in the morning and have to face another day on the job. 1 2 3 4 5

53. I feel I treat customers or coworkers as if they were impersonal ‘objects’. 1 2 3 4 5

54. I deal very effectively with the problems of my customers or coworkers. 1 2 3 4 5

55. I feel burned out from my work. 1 2 3 4 5

56. I feel I’m positively influencing other people’s lives through my work. 1 2 3 4 5

57. I’ve become more callous toward people since I took this job. 1 2 3 4 5

58. I feel very energetic. 1 2 3 4 5

59. I worry that this job is hardening me emotionally. 1 2 3 4 5
60. I feel frustrated by my job.  
61. I don’t really care what happens to some  
   customers or coworkers.  
62. Working with people directly puts too much  
   stress on me.  
63. I can easily create a relaxed atmosphere with  
   my customers or coworkers.  
64. I feel like I’m at the end of my rope.  
65. In my work, I deal with emotional problems  
   very calmly.  
66. I have accomplished many worthwhile things  
   in this job.  
67. I feel I’m working too hard on my job.  
68. I feel emotionally drained from my work.  
69. Working with people all day is really a strain  
   for me.  
70. I feel exhilarated after working closely with  
   my customers or coworkers.  
71. I feel coworkers blame me for some of their  
   problems.
Part V. The following questions are to obtain demographic information. The information is being collected to explore basic characteristics of the respondents and will not be used to identify you. Please respond by checking the appropriate box.

72. What is your gender?

[ ] Male  [ ] Female

73. What is your age?

[ ] Less than 30 years old  [ ] 30~39 years old
[ ] 40~49 years old  [ ] More than 49 years old

74. What is your highest level of completed education?

[ ] High school diploma  [ ] Two-year college degree
[ ] Four-year college degree  [ ] Master’s degree
[ ] Doctorate degree

75. What is your job title?

[ ] Clerk/Senior Clerk  [ ] Assistant Manager
[ ] Manager  [ ] Senior Manager
[ ] General Manager  [ ] Other (Please fill in) __________________________
76. What type of job do you do in your organization?

1. Administration
2. Management & Finance
3. Marketing/Sales Support
4. Personnel/Education & Training
5. Customer consulting
6. Engineering/Manufacturing
7. Research & Development
8. IT/Internet Service
9. Other (Please fill in) ______________________________

77. How many years have you worked in your current organization?

1. Less than 2 years
2. 2~4 years
3. 4~6 years
4. 6~8 years
5. More than 8 years

Thank you very much for your cooperation!
설문지

본 연구에 참여해 주셔서 감사합니다. 본 연구의 목적은 한국 기업에서 구성원의 정서지능과 감정노동이 직무소진에 어떠한 영향을 미치는지를 알아보는 데에 있습니다.

본 설문조사는 다섯 부분으로 구성되어 있고, 정서지능과 감정노동, 직무소진에 관한 자료와 인적 사항에 대한 정보를 수집하고 있습니다. 여러분이 제공하는 정보는 연구의 목적으로만 사용될 것이고, 익명으로 관리되며, 철저히 보호될 것입니다. 그리고 연구결과 보고 시에도 응답자의 반응이 모두 취합된 형태로만 제시될 것입니다.

본 설문지에 응답하시는 데에 15-20 분 정도 소요될 것으로 예상됩니다. 혹시 설문 내용에 대해 궁금하신 사항이 있으시면 언제든지 질문해 주시기 바랍니다. 그리고 이후에 문의 사항이 생길 시에는 leex1630@umn.edu 나 010-8330-0629으로 연락해 주시기 바랍니다.

다시 한 번 협조해 주셔서 감사합니다.

연구자
미네소타 대학교
이현응
Part I. 다음 문항을 읽고 여러분이 자신에 대해 가지고 있는 생각과 가장 일치하는 번호를 하나만 골라 √ 표시를 하세요. 아래 문항에 대해서는 옳고 그른 답이 없다는 것을 기억하시기 바랍니다.

<table>
<thead>
<tr>
<th>번호</th>
<th>내용</th>
<th>매우 그렇지 않다</th>
<th>약간 그렇지 않다</th>
<th>보통이다</th>
<th>약간 그렇다</th>
<th>매우 그렇다</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>나는 나와 친한 사람이 아니더라도 그 사람의 기분이나 감정을 잘 알아차린다.</td>
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<td>5</td>
</tr>
<tr>
<td>2</td>
<td>나는 하기 싫지만 해야 할 일이라면 마음을 돌이켜 하고 싶은 마음이 들도록 한다.</td>
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<td>5</td>
</tr>
<tr>
<td>3</td>
<td>나는 내 감정을 잘 다스릴 수 있다.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>4</td>
<td>나는 어떤 일이 끝나고 나서 헤택한 기분이 들더라도 다음 일을 위해서 마음을 다진다.</td>
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<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>5</td>
<td>나는 말투, 목소리 톤, 표정 등을 통해서 타인의 감정이나 기분을 알아차린다.</td>
<td>1</td>
<td>2</td>
<td>3</td>
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<td>5</td>
</tr>
<tr>
<td>6</td>
<td>나는 우울한 기분을 받고 긍정적인 기분으로 변하게 할 수 있다.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
<tr>
<td>7</td>
<td>나는 자신 또는 타인의 감정 상태에 적합한 이름(감정의 종류)을 붙일 수 있다.</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
</tr>
</tbody>
</table>
8. 나는 우울해지면 그것을 해결할 수 있는 나만의 비법이 있다.

9. 나는 하기 쉬운 일이더라도 그 마음을 극복하여 전력투구한다.

10. 나는 화라는 감정을 어떻게 가라앉힐 수 있는지 알고 있다.

11. 나는 동료에게 좋은 일이 생겼다는 소식을 들으면 진심으로 축하해 주고 싶다.

12. 나는 상황에 따라 감정을 전환시킬 수 있다.

13. 나는 기분 나쁜 일을 빨리 잊으려고 애쓴다.

14. 나는 그림이나 음악 속에 담겨있는 느낌과 감정을 이해하는 편이다.

15. 나는 복잡하고 미묘한 감정 및 정서 상태를 이해할 수 있다.

16. 나는 일이 잘 풀리지 않더라도 실망하거나 좌절하지 않는다.
17. 나는 내 감정을 파악해서 해야 할 일을 순서대로 할 수 있다.

18. 나는 두려운 마음이 들 때 회피하지 않고 적극적으로 해결한다.

19. 나는 애증의 의미가 무엇인지 이해할 수 있다.

20. 나는 타인을 달래거나 위로하는 행동을 익숙하게 잘한다.
Part II. 다음 문항을 읽고, 주어진 상황에서 여러분이 취할 행동과 가장 일치하는 답을 하나만 끝라 √ 표시를 하세요.

21. 당신은 겨울에 설악산 등반을 하다가 폭설 때문에 하산을 하지 못하고 조그만 동굴에 피신하게 되었다. 이때 날이 어두워졌고 워낙 깊은 산속이라 구조대도 찾아올 것 같지 않다. 이럴 때 당신이라면 어떻게 하겠는가?
① 느긋하게 마음먹고 날이 밝을 때까지 잠을 자도록 노력한다
② 조난 사실을 밖에 알리고자 할 만한 행동은 무엇이든지 해보려고 한다
③ 무섭고 겁이 나서 바들바들 떨기만 하고 별로 도움이 되는 행동은 못한다
④ 동굴 속에 갇혀있기보다는 위험을 무릅쓰고라도 하산길을 찾아 나선다

22. 당신은 인기있는 의사로서 사무실 밖에 10여 명의 환자가 늘 차례를 기다리고 있다. 어느날 진료 중에 창밖을 내다보니, 오래 전에 헤어져 소식이 궁금했던 친구가 줄의 끝에 서있다. 이럴 때 당신이라면 어떻게 하겠는가?
① 반가운 김에 왜나가서 인사를 하고 사무실로 안내해서 먼저 진료를 해준다
② 차례가 되면 자연히 만나게 될 것이므로 환자들을 순서대로 진료해 나간다
③ 밖으로 나가 친구에게 인사를 한 후에 돌아와 순서대로 진료해 나간다
④ 일부러 장시 휴식시간을 만들어 친구를 불러 인사하고, 친구가 급하다고 하면 그 시간에 진료해 준다

23. 당신은 주사가 조금 심한 편이다. 어느날에도도 상사와 부하 직원이 함께 있는 회식 자리에서 술주정을 상당히 심하게 했다는 소리를 들었으나, 전혀 기억이 나지 않는다. 아침에 출근했을 때 당신이라면 어떻게 하겠는가?
① 술자리에서 벌어진 일을 운운하는 것은 웃기는 일이므로 그냥 가만히 있는다
② 미안하고 창피하므로 찾아다니면서 사과를 한다
③ 우선 무슨 내용의 술주정을 들었는지 알아본 후 어떻게 할지 생각한다
④ 술주정 한 것이 창피하고 부끄러워서 두 번 다시는 취하지 않겠다고 결심한다

24. 당신은 어느 직장의 상사이다. 직장 내에서 영호남 등 지역 차별 의식이 생기면 조직과 국가가 발전할 수 없다고 긁게 믿고 있다. 그래서 직원들에게 그런 자신의 입장을 널리 알리려 한다. 어느날 당신은 직원 몇 명이 지역 차별적 논란을 하며 비웃어도 한다고 경감하게 들게 되어 대단히 불쾌해졌다. 이럴 때 당신이라면 어떻게 하겠는가?
140

① 아무리 그래도 농담을 한 것에 지나지 않으므로 모든 체한다
② 후에 정식으로 호출해서 나무란다
③ 즉석에서 그들의 잘못을 나무라고, 어떻게 나쁜 일인지 설명한다
④ 그 사람들에게 정계 조치를 내린다

25. 당신은 어느 보험회사의 설계사이다. 오늘 하루종일 고교 동창생을 중심으로 15 명에게 전화를 걸어 모집 권유를 했으나 모두 거절당했다. 그래서 지금 당신은 매우 기분이 저조한 상태다. 이럴 때 당신이라면 어떻게 하겠는가?
① 오늘은 거절을 많이 당했으니 내일은 오히려 더 좋아질 것이라고 스스로 위로하면서 어느 친구에게 내일 전화를 걸 것인지 생각한다
② 친구들에게 공연히 부담을 주고 사이만 말어지게 한 것 같으므로 내일부터는 친구 아닌 다른 사람들에게 모집 권유를 하기로 마음먹는다
③ 보험설계사 자체가 나의 적성과 맞는지 아닌지에 대해서 다시금 심각하게 생각해 보고, 필요하면 여길을 걸러서라도 따져본다
④ 친구들에 대한 원망과 실망이 크지만 그들이 결국 보험을 들어줄 가능성이 가장 큰 집단이므로 속아음을 진정시키고 계속 전화한다

26. 어느날 방놀게 귀가하던 중 골목 여귀에서 빽소니 차량사고가 발생했다. 그런데 우연히 목격한 빽소니 운전자는 같은 동네 친구였다. 이럴 때 당신이라면 어떻게 하겠는가?
① 친구를 찾아가서 자수하라고 권유한다
② 이런 일에 연루되는 것은 성가신 일이므로 모르는 체한다
③ 피해자의 다친 정도에 따라 다르게 행동한다
④ 가해자가 친구일지라도 빽소니는 나쁜 행동이므로 피해자에게 알려 준다

27. 당신은 오늘 아침 부인(혹은 남편)과 돈 문제로 심한 언쟁을 벌이고 출근했다. 하루종일 그 일이 마음에 걸려 일손이 잡혀있지 않는다. 자존심을 잃고 급여 놓은, 욕에 가까운 인신공격 때문에 아직도 그에 대한 분은 풀리지 않는다. 이런 때 당신이라면 어떻게 하겠는가?
① 이 상태로 집에 들어갈 마음이 들지 않기 때문에 퇴근 후에 어디든 갈지 생각해 본다
② 집으로 돌아가서 상대방이 한 말을 어떻게 따지고 내 입장이 다른 것을 어떻게 효과적으로 설득할지 짐짓 생각한다
③ 배우자와의 이런 갈등이 두 사람 모두에게 얼마나 손해인지를 느끼면서 어떤 방식으로든 화해할 필요가 있다고 생각한다
집에 있는 아내(혹은 남편)도 오늘 하루 매우 연蹁게 보냈을 것이라는 생각에 미안한 마음을 가지고 빨리 집에 돌아가야겠다고 생각한다.

28. 당신은 지금 공항으로 가는 택시 안에 있다. 30분내로 도착하지 못하면 비행기를 놓칠 것 같다. 그러나 웨낙 차가 많아서 택시는 꼭짝도 못하고 있다. 어릴 때 당신이라면 어떻게 하겠는가?
   ① 마음을 졸여 보았자 소용이 없으므로 책을 읽거나 라디오를 듣는다
   ② 조바심이 나서 판단 생각은 하기가 어렵다
   ③ 늦어서 비행기를 놓치게 되면 그 대신 무엇을 어떻게 할 것인지 꼼꼼히 생각해본다
   ④ ‘가면 가고 못가면 못가는 것’이라고 느긋하게 생각하고 편한 마음을 갖도록 애쓴다

29. 어느 날 제일 친하다고 생각했던 친구가 내 험담을 하고 다닌다는 사실을 제삼자로부터 들게 되었다. 어릴 때 당신이라면 어떻게 하겠는가?
   ① 이런 일은 즉시 해결하는 것이 좋으므로 당장 친구에게 전화해서 진위를 파악한다
   ② 당장은 기분이 나쁘지만 일단 참기로 한다
   ③ 당사자에게서 직접 들은 것이 아니므로 일단 못 들은 걸로 하고 나중에 확인해 본다
   ④ 별로 마음의 동요가 없다

30. 당신의 직장에서 오늘 아침 인사발령 통고가 있었다. 벌써 며칠전부터 직장 동료들과 상사들 사이에서는 당신이 승진할 것이라는 소문이 우성했다. 그런데 기분 발령이 나고 보니 당신이 아니라 학교 후배가 먼저 승진하였다. 어릴 때 당신이라면 어떻게 하겠는가?
   ① 기분이 연뜩아 어느 누구와도 말을 하고 싶지 않다
   ② 나보다 못한 사람이 먼저 승진한 것에 대해서 불만을 터뜨린다
   ③ 올직한 기분을 풀기 위해 친한 친구에게 전화를 걸어 술 한잔 하기로 한다
   ④ 비록 실망스럽긴 하지만 다음 기회를 기다리기로 다짐하고 평정을 잃지 않는다

31. 당신은 오늘 아침부터 되는 일이 하나도 없다. 사람들들은 당신에게 계속해서 짜증을 내고, 설상가상으로 오늘 중요한 악순을 한 사람들도 악순 장소가 어긋나서 계획했던 일들이 틀어졌다. 그렇지만 아직도 해야 할 일이 많이 남아 있다. 어릴 때 당신이라면 어떻게 하겠는가?
   ① 내일은 좀 더 잘 될 것이라는 생각으로 다시 계획을 세운다
   ② 일단 뒤돌아진 감정을 바꾸는 대는 시간이 걸리기 때문에 그냥 기다려 본다
32. 당신은 산악 구조대원이다. 폭설로 눈사태가 나서 등산객 몇명이 실종되어 구조에 나섰다. 3일간의 활동 후 이제 근무 다른 조와 교대하여 지친 몸을 쉬게 되었다. 내일 또 작업을 하려면 충분히 쉬어야한다고 생각해 본다. 그런데 실종자의 가족들은 당신에게 작업을 계속할 것을 요구한다. 이렇게 할 때 당신이라면 어떻게 하겠는가?

① 내 몸이 피곤하므로 일단 쉬다
② 가족들이 요구한다면 구조작업을 계속하다
③ 구조대원의 어려움을 이해해 주지 않는 점을 서운해 한다
④ 작업 능률을 위해서 좀 쉬는 것이 필요하다고 가족들에게 말하고 휴식을 취한다

33. 당신은 어떤 회사의 신입사원이다. 며칠 야근을 하며 열심히 일을 했는데 그만 실수를 했다. 일의 결과로 어쩔 수 없는 나의 실수는 아랑곳하지 않고 상사가 심한 질책을 해서 기분은 몸치 나쁘다. 이렇게 할 때 당신이라면 어떻게 하겠는가?

① 쌓인 스트레스를 풀기 위해서 무엇을 할까 궁리하다
② 아무리 노력해도 내가 해결할 수 없는 한계가 느껴져서 직장 생활에 힘들게 된다
③ 나의 실수를 인정하고, 직장 생활에 훌륭한 경험이 있다고 생각해 본다
④ 상사를 찾아가서 ‘비록 내가 실수를 하긴 했으나 그 동안의 노력은 무시하고 질책만 하는 것은 심하지 않나며 정중히 의사표시를 한다

34. 당신은 사업에 실패하여 버스에서 물건을 팔고 있다. 어느 날 물건을 팔려고 버스에 들어서는 순간, 고교 시절 당신을 아껴 주시던 은사님이 계신 것을 보았다. 그 분께서는 아직 당신을 알아보신 것 같지는 않는다. 이렇게 할 때 당신이라면 어떻게 하겠는가?

① 초라한 내 자신이 부끄러워 열른 버스에서 내린다
② 우연은 장사에 전념한 후, 선생님이 내리실 때 함께 내려 인사한다
③ 부끄럽긴 하지만 선생님께 다가가서 인사한다
④ 아는척하면 장사를 못하게 될 테니 모르는 척한다

35. 당신은 사랑하는 사람과 결혼을 하려고 한다. 그런데 결혼 준비를 하던 중 혼수 때문에 배우자와 다툼이 생겼다. 당신은 배우자의 의견이 함정이지 않다고 생각한다. 이렇게 할 때 당신이라면 어떻게 하겠는가?
① 상대방의 비합리적인 생각을 지적하며 합리적인 나의 의견에 따르도록 설득한다
② 비록 내 의견이 옳다고 생각하는 것 같지만 문제를 일으키기 쉽어서 상대방의 의견을 따른다
③ 내 의견이 여론 으로 적합하다고 예를 들어가며 이야기한다
④ 상대가 왜 그렇게 생각하는지 입장을 바꿔 생각해 보려고 노력한다

36. 당신은 요새 체중이 많이 불어서 걱정이다. 그래서 이런 저런 궁리끝에 식이요법으로 체중을 줄이기로 결심을 했다. 식이요법 첫 날, 굳은 결심으로 아침, 점심까지는 잘 견디어 냈는데, 저녁에 갑자기 회사에서 회식을 가지게 되었다. 사정상 도저히 빼칠 수도 없는 상황이다. 이런 상황이라면 어떻게 하겠는가?
① ‘오늘까지만 먹고 내일부터 해야지’라고 생각하고 회식 자리에서 양껏 먹는다
② 다른 사람들에게 눈총을 받더라도 내 계획을 위해서 회식 자리에 가지 않는다
③ 일단은 문에 굳게 막고 가지만 음식을 보니 마음이 약해져서 먹는다
④ 사람들에게 내 결심을 말하고 회식 자리에 참석하더라도 음식을 먹지 않는 것에 대한 양해를 구한다

37. 매번 약속 시간에 늦는 동성의 친구와 연극을 같이 보기로 했다. 그런데 연극 공연 시간이 임박했는데도 나타날 생각을 하지 않는다. 공연 시간은 이미 지났고, 당신은 이제 화가 머리끝까지 나버렸다. 이런 상황이라면 어떻게 하겠는가?
① 그냥 가버린다
② 기다렸다가 오면 화풀이를 한 후 그냥 가버린다
③ 일단 기다려 이유를 들여보고 나서 그 이유에 따라 행동한다
④ 기다리긴 해도 분이 풀리지 않아 눈도 마주보지 않고 뚱하게 있는다

38. 평소 존경하는 은사님이 이성친구를 소개시켜 주셨는데 별로 마음에 들지 않아서 연락을 하지 않았다. 그런데 어느 날 은사님을 통해서 다시 만나자고 연락이 왔다. 이럴 때 당신이라면 어떻게 하겠는가?
① 소개시켜 주신 분의 얼굴을 봐서 마음에 안들어도 다시 만난다
② 이런 일은 분명히 할수록 좋기 때문에 은사님께 죄송해도 분명히 거절한다
③ 소개시켜 주신 분이 만장할 수 있으므로 당신에게 직접 연락하여 양해를 구한다
④ 태도를 너무 분명히 하면 은사님이나 소개받은 분에게 실례가 되므로 자연스럽게 내 뜻이 알려지게끔 시간을 끄다
39. 옆집 사람이 평소 소란스럽게 곁에서 몇번이나 주의를 주었다. 그런데 오늘은 날씨가 더워서인지 창문까지 열어놓고 온갖 소란을 부리고 있다. 이런 사람이라면 어떻게 하겠는가?
① 이런 사람을 말로 해서 안되므로 똑같이 맞대응한다
② ‘좋은 것이 좋은 것이다’ 생각하고 화를 꽉꾹 참는다
③ 이런 명백히 프라이버시 침해이므로 경찰에 신고할 생각을 한다
④ 직접 찾아가서 불만을 이야기하고 소란을 멈추도록 요청한다

40. 당신의 배우자는 꼼꼼한 성격이라 평소 당신에게 잔소리를 많이 하는 편이다. 오늘은 기분 상한 일도 있고 해서 조용히 쉴고 싶은 마음이 굴뚝 같았다. 그런데 오늘도 역시 당신의 배우자는 시시콜콜히 잔소리를 하고 있다. 이런 날 당신이라면 어떻게 하겠는가?
① 내 인내심에도 한계가 있고 나도 사람이므로 화를 난다
② 이런 날은 사람과 부딪히지 않는 것이 좋으므로 밖으로 나가 기분 전환을 한다
③ 배우자에게 ‘잔소리가 싫다’는 느낌 그대로로 이야기한다
④ 내 마음이나 기분도 헤아려주지 않는 배우자를 속으로 원망한다
Part III. 여러분은 직장에서 다음과 같은 행동을 얼마나 자주 하는 편입니까? 가장 가까운 번호를 하나만 골라 ✓ 표시를 하세요. 아래 문항에 응거나 그린 답이 없다는 것을 기억하시기 바랍니다.

전혀 그렇지 않다  거의 그렇지 않다  가끔 그렇다  자주 그렇다  언제나 그렇다

41. 나는 속으로 느끼는 감정을 그대로 다른 사람(고객이나 동료)에게 표현한다.  1  2  3  4  5

42. 나는 속으로 느끼는 감정을 다른 사람에게 표현하지 않는다.  1  2  3  4  5

43. 나는 고객이나 동료에게 보여야 하는 감정(예: 친절함, 유쾌함)을 속으로도 느끼려고 노력한다.  1  2  3  4  5

44. 나는 속으로는 느끼지 않는 감정을 느끼고 있는 척한다.  1  2  3  4  5

45. 나는 다른 사람에게 보여야 하는 감정을 자연스럽게 느낀다.  1  2  3  4  5

46. 나는 직무 수행 시에 다른 사람에게 보여야 하는 감정(예: 친절함, 유쾌함)을 실제로도 느끼려고 한다.  1  2  3  4  5

47. 나는 어떤 상황에 대해 느낀 감정을 숨긴다.  1  2  3  4  5
<table>
<thead>
<tr>
<th>번호</th>
<th>문장</th>
</tr>
</thead>
<tbody>
<tr>
<td>48.</td>
<td>나는 다른 사람에게 보여야 하는 감정을 별 노력 없이 느낀다.</td>
</tr>
<tr>
<td>49.</td>
<td>나는 다른 사람에게 보여야 하는 감정을 직접 느껴보려고 한다.</td>
</tr>
</tbody>
</table>
Part IV. 다음 문항을 읽고 여러분이 자신에 대해 가지고 있는 생각과 가장 일치하는 답을 하나만 골라 √ 표시를 하세요. 아래 문항에 대해서 옳고 그른 답이 없다는 것을 기억하시기 바랍니다.

<table>
<thead>
<tr>
<th>매우 그렇지 않다</th>
<th>약간 그렇지 않다</th>
<th>보통이다</th>
<th>약간 그렇다</th>
<th>매우 그렇다</th>
</tr>
</thead>
</table>

50. 나는 직장에서 하루가 끝나면 완전히 지쳐 버린다. [ ] [ ] [ ] [ ] [ √ ]

51. 나는 고객이나 동료가 어떤 감정을 느끼는지 쉽게 이해할 수 있다. [ ] [ ] [ ] [ ] [ √ ]

52. 나는 아침에 일어나면 직장에서 또 일을 해야 한다는 생각에 피곤함을 느낀다. [ ] [ ] [ ] [ ] [ √ ]

53. 나는 고객이나 동료를 마치 사람이 아니라 물건처럼 대하는 것 같다. [ ] [ ] [ ] [ ] [ √ ]

54. 나는 고객이나 동료의 문제를 매우 효과적으로 해결할 수 있다. [ ] [ ] [ ] [ ] [ √ ]

55. 나는 일 때문에 완전히 지쳐버린 것 같다. [ ] [ ] [ ] [ ] [ √ ]

56. 나는 일을 통해 다른 사람들의 삶에 긍정적인 영향을 미치는 것 같다. [ ] [ ] [ ] [ ] [ √ ]
57. 나는 현재의 일을 시작한 이후로 사람들을 더 냉소적으로 대하게 되었다.

58. 나는 직장에서 매우 활력을 느낀다

59. 나는 현재의 직업이 나를 정서적으로 무감각하게 만드는 것 같아 걱정이 된다.

60. 나는 일 때문에 좌절감을 느낀다.

61. 나는 고객이나 동료에게 어떤 일이 일어나는지에 대해 사실 별로 관심이 없다.

62. 사람들과 일하는 것이 내게 너무 많은 스트레스를 준다.

63. 나는 고객이나 동료를 대할 때 편안한 분위기를 쉽게 만들 수 있다.

64. 나는 직장에서 비행 끝에 몰린 느낌이 든다.

65. 나는 일을 할 때 감정과 관련된 문제들에 매우 철저하게 대처한다.

66. 나는 현재의 일을 통해 가치 있는
것들을 많이 성취했다.

67. 나는 지나칠 정도로 일을 열심히 하는 것 같다. 1 2 3 4 5

68. 나는 일 때문에 정서적으로 고갈된 느낌을 받는다. 1 2 3 4 5

69. 사람들과 하루 종일 일하는 것은 정말 피곤하다. 1 2 3 4 5

70. 나는 고객이나 동료와 친밀하게 일을 하고 나면 기분이 유쾌해진다. 1 2 3 4 5

71. 동료들이 자신의 문제에 대해 나를 비난하는 것 같다. 1 2 3 4 5
Part V. 다음은 여러분의 인적 사항에 대한 정보를 수집하기 위한 문항들입니다. 아래 문항을 통해 수집한 정보는 연구의 목적으로만 사용될 것이며, 응답자의 신원을 밝히는 데에는 결코 사용되지 않을 것입니다. 문항을 읽고 알맞은 항목에 √ 표를 해주시기 바랍니다.

72. 당신의 성별은 무엇입니까?

1) 남성  2) 여성

73. 당신의 연령은 어떻게 됨니까?

1) 29 세 이하  2) 30~39 세 사이
3) 40~49 세 사이  4) 50 세 이상

74. 당신의 최종 학력은 어떻게 됨니까?

1) 고졸  2) 2년제 대학졸
3) 4년제 대학졸  4) 석사
5) 박사

75. 당신의 직위는 무엇입니까?

1) 직원/주임  2) 대리
3) 과장  4) 차장
5) 부장  6) 기타 (적어주십시오) ___________
76. 당신의 직무는 무엇입니까?

1. 행정/업무 지원
2. 재무 회계
3. 마케팅/판매 영업
4. 교육/훈련
5. 고객 상담
6. 엔지니어링/제조
7. 연구 개발
8. IT/인터넷 서비스
9. 기타 (적어주세요)

77. 현재의 조직에서 근무한 연수는 어떻게 됐나요?

1. 2년 미만
2. 2~4년 사이
3. 4~6년 사이
4. 6~8년 사이
5. 8년 이상

대단히 감사합니다!!
APPENDIX C

Research Support Consent Form

(English and Korean Version)
Research Support Consent Form

I am a Ph. D. candidate majoring in Human Resource Development (HRD) at the University of Minnesota. I am conducting a dissertation study on “The relationship between emotional intelligence and emotional labor and its effect on job burnout.” You are being asked to support this study by soliciting participation from members of your organization. The members will respond to a survey questionnaire for the research.

Background information
The purpose of this study is to investigate the relationship between emotional intelligence (trait EI and ability EI) and emotional labor (surface acting, deep acting, emotional consonance) and explore its effect on job burnout (emotional exhaustion, depersonalization, and diminished personal accomplishment). This study has three research questions as follows:
1. What are the relationships between EI and processes of emotional labor?
2. What are the effects of EI and emotional labor on job burnout?
3. What are the relationships among emotional consonance, emotional labor, and job burnout?

Procedures
If you agree to support this study, I would ask you to help with the following:
1. Introduce the researcher to participants at the beginning of training and development sessions implemented by your HRD center
2. Solicit the participants to respond voluntarily to a survey questionnaire

Confidentiality
Participation in the procedure of this research is voluntary. All data are confidential. Your decision whether or not to participate will not affect your current or future relations with the researcher or the University of Minnesota. Any participants are free to withdraw at any time without affecting those relationships.
Contacts and Questions
The researcher conducting this study is Hyuneung Lee. You may ask any questions you have now. If you have questions later, you are encouraged to contact me at:
Address: 3106 Boramae Samsung Cherville, Sindaebang2-dong
Dongjak-gu, Seoul, South Korea
Phone number: 010-8330-0629 (Korea)
E-mail address: leex1630@umn.edu

Or you may contact my adviser, Dr. Gary McLean, at mclea002@umn.edu or at the following address: 420 Vocational and Technical Education Building, 1954 Buford Avenue, St. Paul, MN 55108.

If you have any questions or concerns regarding this study and would like to talk to someone other than the researcher or the adviser, you are encouraged to contact the Research Subjects’ Advocate Line, D528 Mayo, 420 Delaware St. Southeast, Minneapolis, MN 55455, USA; (612) 625-1650.

You may keep a copy of this form for your records.

Statement of Consent

I have read the above information. I have asked questions and received answers. I give consent for participation in this study.

Company:____________________________________________________________
Department:________________________________________________________
Title:_______________________________________________________________
Name:________________________ E-mail address:________________________
Signature:____________________ Date:_______________________________
 연구 지원 동의서 (Research Support Consent Form)

안녕하세요, 저는 미국 미네소타 대학에서 인적자원개발(HRD)을 전공하고 있는 박사과정생 이현응입니다. 현재 저는 박사 논문을 위해 “한국 기업에서 정서지능 및 감정노동이 직무소진에 미치는 영향”에 대한 연구를 실시하고 있습니다. 귀하의 조직 구성원이 본 연구를 위해 설문조사에 참여할 수 있도록 지원해주시면 고맙겠습니다.

연구 배경 (Background Information)
본 연구의 목적은 조직 구성원의 정서지능 및 조직에서의 감정노동이 직무소진에 어떠한 영향을 미치는지 알아보는 데에 있습니다. 주요 연구 질문은 다음과 같습니다.
1. 정서지능과 감정노동은 어떠한 관계가 있는가?
2. 정서지능과 감정노동이 직무소진에 어떠한 영향을 미치는가?
3. 감정부조화와 감정노동, 직무소진은 어떠한 관계가 있는가?

연구 지원 절차 (Procedures)
만일 귀하가 본 연구를 지원하기로 결정하신다면 연구자는 다음과 같은 도움을 요청할 것입니다.
1. 귀하의 HRD 센터에서 진행하는 훈련 과정 참여자를 대상으로 훈련 과정을 시작하기 전에 연구자를 소개해 주시기 바랍니다.
2. 귀하의 HRD 센터에서 진행하는 훈련 과정 참여자들을 대상으로 본 연구의 설문 조사에 자발적으로 협조하기를 요청해 주시기 바랍니다.

개인 정보 보호 (Confidentiality)
본 연구에 참여할 지의 여부는 자발적으로 결정하실 수 있습니다. 본 연구를 통해 수집한 모든 자료에 대해서는 익명성과 개인 정보 보호를 보장합니다. 본 연구에 참여하는지의 여부는 귀하와 연구자 및 미네소타 대학 간의 관계에 어떠한 영향도 미치지 않을 것입니다. 연구 참여자에게는 언제라도 도중에 참여를 포기하실 수 있습니다.
연락처와 문의사항 (Contacts and Questions)
본 연구를 진행하는 연구자는 이현응입니다. 문의 사항이 있으신 경우, 귀하께서는 아래와 같이 주소와 전화번호, 이메일 주소를 통해 연구자와 연락하실 수 있습니다.
주소: 서울시 동작구 신대방 2동 보라매 삼성쉐르빌 3106호
전화번호: 010-8330-0629
이메일 주소: leex1630@umn.edu

연구자의 지도교수인 Gary McLean 교수와의 연락도 가능합니다. 주소와 이메일 주소는 다음과 같습니다.
주소: 420 Vocational and Technical Education Building, 1954 Buford Avenue, St. Paul, MN 55108, USA.
이메일 주소: mclea002@umn.edu

연구자나 연구자의 지도교수 외에 다른 분과 연락하고자 하시는 경우, 아래와 같은 주소로 연락하실 수 있습니다.
주소: Research Subjects’ Advocate Line, D528 Mayo, 420 Delaware St. Southeast, Minneapolis, MN 55455, USA
전화번호: 612-625-1650 (미국)

이 동의서를 기록으로 보관하셔도 됩니다.

연구 지원에 대한 동의 (Statement of Consent)

저는 위의 모든 내용을 읽었으며, 본 연구의 배경과 필요성을 이해하였습니다. 따라서 본 연구의 진행을 위해 필요한 활동에 협조하겠습니까.
회사: ____________________________________________________________
부서: ____________________________________________________________
직위: ____________________________________________________________
성명: ____________________________ 이메일 주소: ____________________________
서명: ____________________________ 날짜: ____________________________
APPENDIX D

IRB Approval Letter
The IRB: Human Subjects Committee determined that the referenced study is exempt from review under federal guidelines 45 CFR Part 46.101(b) category #2 SURVEYS/INTERVIEWS; STANDARDIZED EDUCATIONAL TESTS; OBSERVATION OF PUBLIC BEHAVIOR.

Study Number: 0901E56801

Principal Investigator: Hyuneung Lee

Title(s):
The Relationship between Emotional Intelligence and Emotional Labor and its Effect on Job Burnout in Korean Organizations

This e-mail confirmation is your official University of Minnesota RSPP notification of exemption from full committee review. You will not receive a hard copy or letter. This secure electronic notification between password protected authentications has been deemed by the University of Minnesota to constitute a legal signature.

The study number above is assigned to your research. That number and the title of your study must be used in all communication with the IRB office.

Research that involves observation can be approved under this category without obtaining consent.

SURVEY OR INTERVIEW RESEARCH APPROVED AS EXEMPT UNDER THIS CATEGORY IS LIMITED TO ADULT SUBJECTS.

This exemption is valid for five years from the date of this correspondence and will be filed inactive at that time. You will receive a notification prior to inactivation. If this
research will extend beyond five years, you must submit a new application to the IRB before the study’s expiration date.

Upon receipt of this email, you may begin your research. If you have questions, please call the IRB office at (612) 626-5654.

You may go to the View Completed section of eResearch Central at http://eresearch.umn.edu/ to view further details on your study.

The IRB wishes you success with this research.
APPENDIX E

Standardized Residual Plots
Figure 6. Histogram of standardized residuals in predicting surface acting.

Figure 7. Histogram of standardized residuals in predicting deep acting.
Figure 8. Histogram of standardized residuals in predicting emotional exhaustion.

Figure 9. Histogram of standardized residuals in predicting depersonalization.
Figure 10. Histogram of standardized residuals in predicting personal accomplishment.

Figure 11. Normal P-P Plot of standardized residuals in predicting surface acting.
Figure 12. Normal P-P Plot of standardized residuals in predicting deep acting.

Figure 13. Normal P-P Plot of standardized residuals in predicting emotional exhaustion.
Figure 14. Normal P-P Plot of standardized residuals in predicting depersonalization.

Figure 15. Normal P-P Plot of standardized residuals in predicting personal accomplishment.
Figure 16. Scatterplot of standardized residuals in predicting surface acting.

Figure 17. Scatterplot of standardized residuals in predicting deep acting.
Figure 18. Scatterplot of standardized residuals in predicting emotional exhaustion.

Figure 19. Scatterplot of standardized residuals in predicting depersonalization.
Figure 20. Scatterplot of standardized residuals in predicting personal accomplishment.