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New Perceptions of Old Constructs: Re-examining Ease of Movement and Trustworthiness

BY

Ryan Phillip Currie

A Dissertation Submitted in Partial Fulfillment of the Requirements for the Degree

Of

Doctor of Philosophy

In the Robinson College of Business

Of

Georgia State University

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ACCEPTANCE

This dissertation was prepared under the direction of the Ryan Currie Dissertation Committee. It has been approved and accepted by all members of that committee, and it has been accepted in partial fulfillment of the requirements for the degree of Doctor of Philosophy in Business Administration in the J. Mack Robinson College of Business of Georgia State University.

Richard Phillips, Dean

DISSERTATION COMMITTEE

Dr. Lisa Schurer Lambert

Dr. Kris Byron

Dr. Nikolaos Dimotakis

Dr. Leigh Anne Liu

ABSTRACT

New Perceptions of Old Constructs: Re-examining Ease of Movement and Trustworthiness

BY

Ryan Currie

July 2, 2018

Committee Chair: Lisa Schurer Lambert

Major Academic Unit: Department of Managerial Sciences

The constructs of ease of movement and trustworthiness are well-known to management researchers. Ease of movement has often been included in turnover models, and trustworthiness is an important antecedent in the integrative trust model. However, despite the familiarity with ease of movement and trustworthiness, our understanding of both constructs may be incomplete. While ease of movement is often included in turnover models, its relationship with outcome variables such as turnover and turnover intent are weak, which may call into question the validity of the construct. As for trustworthiness, prior models appear to assume that the relationship between trustworthiness and trust is linear even though this assumption may not be consistent with common experience. In re-examining ease of movement and trustworthiness by using different methodologies, contexts and analysis, I theorize that I can develop a more complete understanding of both constructs that will allow us to better explain how ease of movement and trustworthiness influence attitudes, behaviors and feelings.

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Chapter 1

INTRODUCTION

Re-examination is part of the learning process. As new perspectives are considered, previous ideas are re-evaluated and clarified. This re-evaluation and clarification will hopefully lead to a more refined understanding of the relevant theory, model or construct. This process of re-examination is used in many fields of research including the field of management. While considering new perspectives, management scholars have regularly developed new theories, refined existing theories, identified new relationships among constructs and clarified existing relationship among constructs (Allen, Weeks, & Moffitt, 2005; Colquitt & Rodell, 2011; Matta, Scott, Koopman, & Conlon, 2015; Mayer, Davis, & Schoorman, 1995; Rodell & Judge, 2009). Within the turnover and trust literatures, the constructs of ease of movement and trust appear to be good candidates for re-examination. While both constructs are well-known, new perspectives may be insightful in providing a more complete understanding of both constructs.

Ease of movement, or the likelihood of obtaining another job, is a construct that has a long history dating back to the 1950s when it was originally introduced by March and Simon as part of their turnover model (March & Simon, 1958). Yet, despite this longevity and the continued relevance of turnover, research pertaining to ease of movement has been limited. Furthermore, when ease of movement has been used, there has been a lack of consistency in both defining ease of movement and measuring it (Griffeth, Steel, Allen, & Bryan, 2005; Jackofsky, 1984; Mobley, Griffeth, Hand, & Meglino, 1979; Steel & Griffeth, 1989). Given the aforementioned inconsistencies, the findings from these previous studies have been limited with ease of movement having weak correlations with other variables in the turnover models (Griffeth et al., 2005; Michaels & Spector, 1982; Steel & Griffeth, 1989). The lack of research related to ease of movement could be an indicator that researchers question the continued relevance of ease of movement based upon the weak prior findings. In the current business environment in which employees are constantly thinking about other jobs (Hall, 2013), variables related to turnover and turnover intent should be extremely pertinent, yet researchers do not consistently include ease of movement in their studies. While the prior limited findings with ease of movement may provide some validation for ignoring ease of movement, the inconsistency in both defining ease of movement and measuring it suggests that we may want to re-examine ease of movement before labeling it an irrelevant variable.

Like ease of movement, a new perspective may be needed for trust, or the willingness to be vulnerable. Over the past twenty-five years, research related to trust has been extensive (Colquitt, Scott, & LePine, 2007; Dirks & Ferrin, 2002; Korsgaard, Brower, & Lester, 2015; Mayer & Davis, 1999; Mayer et al., 1995; Schoorman, Mayer, & Davis, 2007). However, the relationship between trust and its antecedent trustworthiness has always been viewed as a linear one (Colquitt et al., 2007; Mayer et al., 1995; Schoorman et al., 2007). To develop trust, one must first exhibit evidence of trustworthiness. Once this trustworthiness is observed, trust develops (Mayer et al., 1995). Furthermore, more trustworthiness should reinforce the relationship and lead to increases in trust (Colquitt & Rodell, 2011).

Common experience, however, suggests that the development of trust is more complicated. With some people, we may need to see lots of evidence of trustworthiness before trusting them, but with others, it may take much less evidence of trustworthiness before trusting them. Furthermore, once that initial trust has developed, additional evidence of trustworthiness may or may not lead to higher levels of trust. This inconsistency in the development of trust may indicate that there is a non-linear aspect to the relationship between trustworthiness and trust that has not previously been considered. Therefore, the relationship between trustworthiness and trust should be re-examined to account for this potential non-linear perspective.

With both ease of movement and trust, re-examination is needed. Therefore, in the following three essays, I attempt to bring new perspective to both of these constructs. For ease of movement, the construct has not been consistently defined or measured. Therefore, in my first essay, I seek to address these methodological issues by developing measures and then evaluating how these measures correlate with other similar and dissimilar variables. In my second essay, my re-examination of ease of movement goes beyond the methodological issues and considers other contexts in which ease of movement may be relevant. In prior research, ease of movement has been examined primarily within the context of turnover (Griffeth & Hom, 1988; Jackofsky, 1984; March & Simon, 1958; Steel & Griffeth, 1989). However, this narrow examination of ease of movement as all employees do not ultimately leave their organizations as part of the turnover process. For those that stay, ease of movement could be pertinent in other contexts at work besides turnover. Therefore, in re-examining ease of movement, I look at both methodological issues and context.

For trust, my re-examination of the construct is focused on the potential non-linear relationship between trust and its antecedent trustworthiness. Increases in trustworthiness may not always lead to increases in trust. Therefore, I look to the fit literature to develop a model that accounts for both linear and non-linear effects. With this re-examination of both ease of movement and trust, I hope to develop a more complete understanding of how these constructs influence feelings, attitudes and behaviors at work.

Chapter Two

EASE OF MOVEMENT: DEVELOPING MEASURES TO CAPTURE THE PERCEPTIONS OF OTHER JOBS

Despite being employed, employees likely think about other job opportunities. After all, most people do not quit their jobs without making arrangements for another one (Gerhart, 1990; Mattila, 1974). These thoughts about job opportunities with other organizations have long been included in models predicting whether employees will leave their current jobs (Cappelli, 2000; Henderson & Bierman, 2009; Jackofsky, 1984; March & Simon, 1958; Steel & Griffeth, 1989). Yet, the empirical research for these turnover models has found little evidence that employees' *ease of movement*, a judgement about the likelihood of obtaining another job is related to their decisions to stay or leave (Griffeth, Hom, & Gaertner, 2000; Steel & Griffeth, 1989).

The correlations between ease of movement and outcome variables such as turnover intent and actual turnover have been weak (Griffeth, Steel, Allen, & Bryan, 2005; Michaels & Spector, 1982; Steel & Griffeth, 1989). These weak correlations raise questions about the viability of the construct. Common experience suggests that thoughts about other jobs should matter when deciding whether to leave an organization. However, the research has not provided support for that intuition.

This tension between experience and research may be due to methodological issues. Prior definitions and measures of ease of movement have been fluid ranging from an objective measure of the labor market to a perceptive evaluation of job opportunities (Griffeth et al., 2005; Michaels & Spector, 1982; Mobley, Horner, & Hollingsworth, 1978). Furthermore, multiple measures of ease of movement have only used a single item, raising concerns about reliability and error (Steel & Griffeth, 1989). Recognizing some of these issues, researchers have previously attempted to address the aforementioned methodological problems. However, those studies found only weak correlations between *ease of movement* and other constructs (Griffeth et al., 2005; Hom, Caranikas-Walker, Prussia, & Griffeth, 1992; Steel & Griffeth, 1989).

The consistent weak correlations with ease of movement do raise questions about the continued use of the construct. However, instead of discarding the construct, perhaps, the scope of any attempt to rehabilitate the ease of movement construct needs to be expanded. Rather than just focusing on the methodological issues mentioned above, I shall instead concentrate on both the methodological issues and the context or theoretical spaces in which ease of movement may be helpful in explaining relationships involving variables related to employees' thoughts about the likelihood of obtaining other jobs.

The ease of movement construct is typically included within the turnover model (Griffeth & Hom, 1988; March & Simon, 1958; Steel & Griffeth, 1989). However, by focusing on ease of movement as it relates to turnover, an entire group of people have been ignored who could be influenced by ease of movement. After all, every employee who considers leaving an organization does not actually do so (Mobley et al., 1978). For those that remain, the thoughts about the likelihood of obtaining another job may not simply disappear. In 2013, Harris Interactive conducted a study, which found that 74% of people would today consider finding a new job (Hall, 2013). To be able to make such a statement, the aforementioned respondents likely had at least some awareness about other available jobs. This suggests that ease of movement may continue to be relevant even for those employees who are not involved in the turnover process.

The potential influence of ease of movement on employees who stay with an organization is unknown since prior researchers focused primarily on ease of movement within the turnover process (Griffeth & Hom, 1988; Griffeth et al., 2005; Steel & Griffeth, 1989). For employees with low ease of movement, perhaps, the small likelihood of obtaining another job could generate a host of negative emotions as these employees may recognize that they have limited options and are unlikely to be able to improve their current circumstances by looking to other organizations. In contrast, for employees with high ease of movement, the high likelihood of obtaining another job could assuage the negative feelings that they have about their current jobs because these employees recognize that there are alternatives if their current circumstances do not improve. Focusing on whether ease of movement is high or low may provide an opportunity to explain how ease of movement could possibly influence emotions and behavior for those who stay with their organizations.

Before examining how ease of movement may influence employees within an organization, I first need to identify circumstances in which ease of movement may be salient. The definition for ease of movement, thoughts about the likelihood of obtaining other jobs, suggests that the ease of movement construct may be relevant when employees are not content with their current work situation. After all, if employees were content, they likely would not be thinking about alternatives. Therefore, I look to situations in which employees may not be content, such as when employees experience stress, to identify when ease of movement may be relevant.

Stress occurs when demands in the environment tax or exceed an individual's resources (Lazarus & Folkman, 1984). For employees who experience stress at work, thoughts about other jobs could help mitigate the demands of the current job because employees recognize that there are likely alternatives if their current circumstances persist. Or, thoughts about other jobs could exacerbate the current situation because employees may realize that they are unlikely to resolve

their stressors, if they persist, by looking for other jobs. How employees perceive the situation will likely depend upon whether ease of movement is high or low. Therefore, ease of movement could be a relevant construct that influences how employees respond to stress.

In addressing the overarching question of whether ease of movement is relevant, I will use a different approach than previous researchers. Rather than focusing exclusively on methodological issues, I take the position that the methodology and the context in which the construct is applied both need to be addressed. In the following pages, I will first focus on the methodological issues. I will address the definition for the ease of movement construct and then evaluate construct validity by developing and testing measures that are consistent with that definition. Once construct validity has been addressed, I will then assess convergent and discriminant validity by investigating the relationship between ease of movement and other constructs (Essay 1).

After developing measures for the ease of movement construct, I will then focus on the influence of ease of movement outside of the turnover model. Using the transactional theory of stress (Lazarus & Folkman, 1984), I will explore how ease of movement may influence employees' feelings and behaviors in response to stressors.(Essay 2).

With this paper, I make several contributions to research. First, I clarify the definition of ease of movement and develop robust measures to address methodological issues with the construct. Second, I identify situations outside of the turnover model in which ease of movement may influence employees' feelings and behavior. Finally, I identify a relevant moderator that could impact employees' responses to stress within the transactional theory of stress model.

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Theory Development

Conceptualization of Ease of Movement

Before addressing the methodological issues with the prior ease of movement measures, I first need to define the construct. Defining the construct is important as the definition will guide the development of measurement items (Hinkin, Tracey, & Enz, 1997) In examining prior definitions of ease of movement and inferring definitions from ease of movement measures when the construct was not explicitly defined, there is a lack of consistency across studies (Farrell & Rusbult, 1981; Griffeth et al., 2005; March & Simon, 1958; Mobley, Griffeth, Hand, & Meglino, 1979; Mobley et al., 1978). This lack of consistency suggests that there may be some disagreement regarding what the construct represents.

Despite the overall lack of consistency with the prior definitions, there does appear to be a regular focus on personal characteristics such as education, job skills, work experience and social networks (Arnold & Feldman, 1982; Griffeth & Hom, 1988; Griffeth et al., 2005; Lee, 1988; Michaels & Spector, 1982; Steel & Griffeth, 1989). This type of information may be relevant as it could help employees assess the likelihood of obtaining other jobs. However, by including the aforementioned personal characteristics within the definition for ease of movement, researchers are likely conflating ease of movement with possible antecedents, which may explain some of the low correlations found in previous studies.

With my definition for ease of movement, I need to clearly separate the antecedents of ease of movement from the actual perception about job alternatives. To do this, all explicit and implicit references to any antecedents should be removed from the definition. The definition should focus on the cognitive assessment that occurs after employees account for relevant prior

antecedents such as the personal characteristics mentioned above. Therefore, I define *ease of movement as the employee's perception of the likelihood of obtaining another job*.

Although this definition is similar to previous ones, I did deviate by not using words such as utility and quantity. The use of those words could draw unwarranted assumptions that there is an objective aspect to the construct. Therefore, to avoid ambiguity, I chose to exclude those words. Having defined the construct, I can now focus on the measures used to capture the ease of movement construct.

Measurement of Ease of Movement

Prior Measures of Ease of Movement. In reviewing the measures for ease of movement, there are two apparent problems: the use of single item measures and the conflation of distinctly different ideas within the individual items.

Single item measures are problematic because they raise concerns about reliability and error (Cortina, 1993; Nunnally, 1967). They have been shown to increase the number of Type II errors (false negatives) and to underestimate the magnitude of the relationship (Cortina, 1993). The problems associated with single item measures are particularly relevant for the ease of movement construct because one of the main issues in prior studies was small effect size (Griffeth & Hom, 1988; Hom et al., 1992; Steel & Griffeth, 1989). Given that single item measures were used with some of the prior studies, the small effect sizes could have been due to underestimation caused by the use of single item measures rather than weak substantive relationships.

The multi-item measures are also problematic because they appear to conflate ease of movement with possible antecedents. For example, one item states, "Given my qualifications and experience, getting a new job would not be very hard at all." (Griffeth et al., 2005). In

responding to this item, respondents are being asked to consider both potential factors that influence the likelihood of obtaining other jobs and the likelihood of obtaining those other jobs. With conflated items, a construct may not correlate with other constructs as expected because the item is measuring more than one construct.

Unfortunately, the previous item is not an anomaly. Multiple examples of conflation can be found in Table 1.

This issue with conflation raises questions about whether the items are actually capturing the ease of movement construct or its antecedents. Given the methodological issues with single item measures and conflation, new items for the ease of movement construct need to be developed.

Current Ease of Movement Measures. In developing measures for ease of movement, one of the goals is to establish good construct validity so that the measurement items capture the theoretical construct (Cronbach & Meehl, 1955). To address the aforementioned issues with reliability, three items were used instead of one. As for the previous problems with conflation, I sought to use items that focused on the employees' perceptions about the likelihood of obtaining another job and did not mention antecedents such as qualifications or skills. Additionally, by not mentioning specific terms such as qualifications and skills, I avoided potentially priming the employees. The three items that I developed to capture the construct can be found in Table 2.

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Other Measures Used for Ease of Movement/Perceived Alternatives Construct

Measures	Single-Item	Conflation	Comment
Study: Mobley, Horner & Hollingsworth (1978)			With a single item, the reliability of the item cannot be
1. What is the probability of finding an acceptable			measured. Additionally, the use of the word probability makes
alternative?	Х		it unclear if this measure is objective or subjective.
Study: Coverdale & Terborg (1980)			Like the previous measure, there are reliability issues because
1. If you quit your job at, what are the			there is only a single item. Additionally, the phrase "as good
chances that you would be able to find another			as, or better" potentially could lead respondents to exclude
job as good as, or better than, your present job?	Х		relevant jobs when assessing their chances.
Study: Peters, Jackofsky & Salter (1981)			The second item appears to be measuring economic conditions
1. It is possible for me to find a better job			so there is conflation between ease of movement and a possible
than the one I have now.			antecedent (economic conditions).
2. Acceptable jobs can always be found.			
3. There is no doubt in my mind that I can find a			
job that is at least as good as the one I now have.		Х	
Study: Arnold & Feldman (1982)			This measure combines possible antecedents of ease of
1. Given your age, education, and the general			movement with ease of movement, which will lead to
economic condition, what do you feel your chance			conflation. Additionally, there are reliability concerns because

is of attaining a suitable position in some other			there is only one measure.
organization?	Х	Х	
Study: Billings & Wemmers (1983)			The first two items appear to be measuring the opposite of the
1. Even if I really looked for another job, I probably			last two items, but they are not reversed scored. Therefore, the
could not find a better one.			items may have negative factor loadings and may load on a
2. It would be difficult to find another job if			different factor than the other two items. Additionally, the last
I couldn't keep this one.			item with the time restriction may be capturing some aspects of
3. There will always be another as good as this one			the current economic conditions along with ease of movement.
that I could get.			
4. If I had to leave this job, I would have another job			
as good as this one within a month.		Х	
Study: Griffeth, Steel, Allen & Bryan (2005)			The first item is reversed scored so there is concern that the
1. There simply aren't very many jobs for people			item may not load onto the same factor as the other items.
like me in today's job market. (R)			Additionally, the second item conflates antecedents and ease
2. Given my qualifications and experience, getting			of movement with the inclusion of the words "qualifications"
a new job would not be very hard at all.			and "experiences".
3. I can think of a number of organizations that			
would probably offer me a job if I was looking.		Х	

Note. The symbol (R) means that the item should be reverse scored.

Table 2Ease of Movement Measures

1. It would be easy for me to get another job.

2. Finding another job would be simple.

3. I could find another job without difficulty.

Note. These items are measured on a seven point scale with anchors of Strongly Disagree and Strongly Agree.

Convergent and Discriminant Validity

Having defined the construct and developed measures for that construct, convergent and discriminant validity need to be addressed by demonstrating that the construct has theoretically predictable relationships with other constructs (Hinkin, 1998). To this end, a nomological net has been developed by identifying a group of constructs that should have some relationship with the ease of movement construct (Hinkin, 1998). Some of these other constructs should correlate highly with the ease of movement (convergent validity) while others may have very small correlations (discriminant validity). With the nomological net, the goal is to demonstrate that the construct behaves as expected (Hinkin, 1998).

In identifying constructs to include within the nomological net, I looked to prior ease of movement research for guidance. Prior studies have consistently included personal characteristics such as education, work experience, social networks and skills (Griffeth & Hom, 1988; Griffeth et al., 2005; Jackofsky, 1984; March & Simon, 1958; Mobley et al., 1979) as antecedents of ease of movement or as variables that correlate with ease of movement. Furthermore, as discussed above, personal characteristics have often been included within the definitions and measures for ease of movement (Steel & Griffeth, 1989). Given the regularity with which ease of movement has been associated with personal characteristics, one of the categories for the nomological net is personal characteristics or attributes of a person that are relatively stable and can be either trait-like or state-like.

While the personal characteristics category may include some of the variables relevant to ease of movement, the personal characteristics category is likely not broad enough to cover all of the pertinent variables. To identify another relevant category, I turned to the turnover literature for assistance. In turnover models in which ease of movement is included, the turnover process often begins with low job satisfaction (Griffeth et al., 2000; Jackofsky, 1984; March & Simon, 1958; Mobley et al., 1978). Job satisfaction is often characterized as an attitude, which means that there are cognitive and emotional aspects to the construct (Judge & Kammeyer-Mueller, 2012). If emotions are part of the beginning of the turnover process in the form of job satisfaction, emotions and, perhaps attitudes, are likely associated with other constructs in the turnover process including ease of movement. Therefore, the second nomological net category is emotions/attitudes.

Whereas job characteristics are antecedents that may predict ease of movement, the constructs within the emotions/attitudes category are consequences of ease of movement. Once employees evaluate the likelihood of obtaining other jobs, they will likely feel some emotions. After all, it is unlikely that employees are thinking about other jobs out of curiosity. There is a purpose behind these thoughts, and this evaluation will likely encourage or frustrate that purpose and possibly generate emotions and/or attitudes. Figure 1 shows the proposed nomological net with both personal characteristics (antecedents) and emotions/attitudes (consequences).



Figure 1. Proposed nomological net with antecedents and outcomes.

Personal Characteristics

Job Experience. Job experience is the length of experience in a given occupation (McDaniel, Schmidt, & Hunter, 1988). Job experience is likely desired by organizations because employees who have worked longer will likely require less training and be more likely to perform their job well (McDaniel et al., 1988). Since organizations likely favor job experience, employees with more job experience will probably have a greater likelihood of obtaining other jobs than employees with less job experience. Given that the likelihood of obtaining another job increases as job experience increases, there will likely be a positive correlation between job experience and ease of movement.

While job experience may be an important factor in obtaining other jobs, employees will likely be aware of situations in which candidates with the most job experience were not hired. Therefore, although job experience may be helpful in obtaining other jobs, it is not determinative. This will likely temper the correlation between ease of movement and job experience. Consequently, there will likely be a medium correlation of greater than 0.30 between job experience and ease of movement.

Education. For the purpose of this study, education represents the number of years of formal education that an employee has had. In many situations, job openings have a minimum education requirement. Therefore, to be even considered for a job, employees must have a prerequisite amount of education. Otherwise, the likelihood of obtaining that job is low. As the education level increases, employees will likely be eligible for more jobs because they have more education. With more job opportunities, employees' likelihood of obtaining other jobs will likely increase. Therefore, there is probably a positive correlation between education and ease of movement.

Although there likely will be a positive correlation between education and ease of movement, the correlation is likely to be small or greater than 0.10. Many people applying for a job may have the same amount of education. Therefore, in many instances, applicants will not be able to distinguish themselves from others based upon the amount of education that they have. Consequently, education may have a limited impact in obtaining other jobs. Employees will likely remember situations in which the person with the most education did not get a job, which will attenuate the correlation between ease of movement and education.

Networking. A network represents an employee's contacts that could assist in finding alternative employment (Griffeth et al., 2005). Prior research has found a positive correlation between networking activities and other ease of movement measures (Griffeth et al., 2005). Employees will likely consider the strength and depth of their network contacts in assessing the likelihood of obtaining other jobs. With more contacts, employees will likely expect to have a better chance of obtaining another job. Therefore, there should be a positive relationship between ease of movement and networking.

Networking may be one of the most significant factors in assessing the likelihood of obtaining other jobs. In many instances, personal contacts could be the main reason why employees obtain another job. However, in other instances, network connections were not enough. Employees can likely think of situations in which network connections did not lead to another job, which should somewhat temper the relationship between networking and ease of movement. Therefore, there will likely be a medium sized correlation of greater than 0.30 between ease of movement and networking.

Extraversion. Extraversion is one dimension of the five factor model used to describe personality. Extraversion refers to sociability, expressiveness, impulsiveness and ambition

(Barrick & Mount, 1991; Costa & McCrae, 1992) and has predicted overconfidence (Schaefer, Williams, Goodie, & Campbell, 2004). The relationship between extraversion and overconfidence suggests that individuals with high levels of extraversion are likely to evaluate situations with an overly positive view. Consequently, individuals with high levels of extraversion are more likely to believe they have a good chance of obtaining another job. Therefore, there should be a positive relationship between extraversion and ease of movement.

Although higher levels extraversion may lead employees to have a more positive outlook about other job opportunities, this does not mean that employees are completely unrealistic. For example, employees who do not have sufficient education or job experience will likely recognize that they are less likely to obtain other jobs even though they may have high levels of extraversion. Therefore, there will likely be a small correlation of greater than 0.10 between extraversion and ease of movement.

Neuroticism. Like extraversion, neuroticism is a dimension of personality. Traits associated with neuroticism include anxiety, depression, anger, embarrassment, worry and insecurity (Barrick & Mount, 1991). The characteristics associated with neuroticism are not appealing to organizations (Barrick, Mount, & Judge, 2001), and organizations would be more likely to hire applicants with low levels of neuroticism than with high levels of neuroticism. Based upon the low value that organizations place on neuroticism, employees with high levels of neuroticism will likely recognize the barrier that neuroticism presents in obtaining other jobs. Therefore, there is likely an inverse relationship between neuroticism and ease of movement.

Although there may be a negative correlation between neuroticism and ease of movement, the correlation is likely to be small or greater than 0.10. While high levels of neuroticism are not appealing, employees are likely aware of many situations in which

organizations hired employees even though they had high levels of neuroticism. Therefore, the perception of neuroticism as an impediment to obtaining other jobs will be less apparent, which will weaken the correlation between neuroticism and ease of movement. As a result, the correlation between neuroticism and ease of movement will likely be small.

Emotions/Attitudes

Positive Affect. Positive affect is a mood that reflects the extent to which a person feels enthusiastic, active and alert (Watson, Clark, & Tellegen, 1988). When employees consider the likelihood of obtaining another job, this evaluation will likely generate some type of emotions so positive affect could be a consequence of ease of movement. Employees with high ease of movement are likely to experience positive feelings. The fact that these employees have a good chance of obtaining other jobs suggest that employees with high ease of movement are desired by other organizations. On the other hand, employees with low ease of movement are unlikely to have positive feelings when they realize that they are less likely to obtain other jobs with other organizations. If their current organizations do not meet their needs, they are less likely to have other options.

The correlation between ease of movement and positive affect will likely be positive. As ease of movement increases, positive affect should increase. Furthermore, employees should have no trouble identifying ease of movement as the source of their positive feelings. Therefore, I would expect a large correlation of greater than 0.50 between positive affect and ease of movement.

Negative Affect. Negative affect reflects a mood of subjective distress and unpleasurable engagement that can include feelings such as anger, disgust, fear and nervousness (Watson et al., 1988). Like positive affect, negative affect is a potential consequence of ease of movement. The

emotions that employees probably experience when they evaluate the likelihood of obtaining other jobs may not be limited to positive emotions. For those who have a low likelihood of obtaining other jobs, I would expect some negative feelings about the limited opportunities. These employees are unlikely to do better than their current jobs, and this realization may generate feelings of anger or fear.

As ease of movement increases, obtaining jobs with other organizations is a more realistic possibility. Employees are less likely to feel that they are stuck in their current jobs, which will likely reduce the negative feelings. Therefore, there could be an inverse relationship between negative affect and ease of movement. As ease of movement increases, I would expect to see corresponding decreases in negative affect. Furthermore, the correlation will likely be large or greater than 0.50 as employees should have no problem connecting their negative feelings with ease of movement.

Continuance Commitment. Continuance commitment is the perceived economic value of remaining with an organization versus leaving it (Allen & Meyer, 1990; Meyer, Allen, & Smith, 1993). Similar to positive and negative affect, continuance commitment is a consequence of ease of movement. As ease of movement increases, the likelihood of employees obtaining other jobs approaches certainty. At the same time, the perceived economic value of remaining with an organization may diminish because employees have a strong likelihood of obtaining the same thing, if not better, with another organization. On the other hand, a decrease in ease of movement is likely to correspond with an increase in continuance commitment because the perceived economic value of a job will likely be greater if employees are less likely to obtain the same benefits elsewhere.

The inverse relationship between ease of movement and continuance commitment should have a medium-sized correlation of greater than 0.30. With ease of movement, there is an element of speculation so employees may not have a clear idea of the economic value of staying versus leaving, which may attenuate the correlation between ease of movement and continuance commitment.

Methods

Overview of the Studies

I used two samples to evaluate the construct validity for the new ease of movement measures. With the first study, I focused on the adequacy of the ease of movement measures. Using qualitative data, I looked for evidence that employees were interpreting the measures as expected. With the second study, I collected quantitative data and used confirmatory factor analysis to examine the factor structure for ease of movement. Furthermore, I assessed my predictions about the relationship between ease of movement and other relevant constructs.

Study One

Sample. Participants were recruited from individuals who were working more than thirty hours per week in a large city in the southeastern United States. Sixteen participants completed an in person cognitive interview. The average age of the participant was 49 years old. A majority of the participants were male (75%). The racial distribution was 94% Caucasian and 6% Asian. On average, participants had worked at their current jobs for 7 years and had been with their current organizations for 8 years.

The cognitive interviews were structured to capture information about the participants' thought processes as they heard each ease of movement item. Participants were first asked open

ended background questions regarding their prior education and work experience. Then, each ease of movement item was read aloud to the participants. After hearing each item, participants were asked to provide a rating and discuss what thoughts came to mind when the item was read. Additionally, participants rated each item on a 7 point scale with anchors of 1=Strongly Disagree and 7=Strongly Agree. The interview protocol for the cognitive interviews is included in Appendix 2.

Analysis

The text of the cognitive interviews was reviewed to confirm the adequacy of the ease of movement items (Hinkin et al., 1997) by looking for evidence that measures spurred thoughts related to the likelihood of obtaining other jobs. Given my focus on ease of movement, I looked for words that might be commonly associated with thoughts about other jobs such as network, experience, and job market. To avoid biasing the participants, none of those words were mentioned in any of the interview questions (Appendix 2). Therefore, any mention of the words network, experience or job market would have been spontaneous.

In addition to adequacy, I reviewed the text of the interviews for saturation. Saturation occurs when new data does not provide further insight about the issue being investigated (Glaser & Strauss, 2009; Mason, 2010). For this study, the consistent repetition of themes such as network, experience, and job market across multiple interviews suggests that the later interviews were not producing new information and that saturation had occurred.

Results

The results of the first study support the conclusion that the measures are adequate and are capturing thoughts about the likelihood of obtaining other jobs. When reviewing the text from these interviews, the themes of network, experience and the job market consistently appear.

Of the sixteen interviews, the network and experience themes appear in 12 of the interviews, and the job market theme is present in 8 of the interviews. The following quotes illustrate the themes that I found in reviewing the text of the interviews.

I believe it would be fairly simple in the fact that my skill set, my experience, the amount of portable business that I would take with me would make me very marketable to other law firms.

... so I think that the combination of the contacts that I have, the reputation that I have developed and my actual abilities make it highly likely that I will have no trouble finding another job.

Based on the current job market, I think it ... my inclination and effort ... the people who I talk to in the Atlanta area is there is [*sic*] very few openings for what I do. My category of work, the creative category of work, is being done by younger and younger people so as you get older and your rates get more expensive people don't see a value in your experience.

Representative quotes that touch on the themes of network, experience and job market can also be found in Table 3. The experience and network themes were referenced by 75% of the participants, and 50% of the participants mentioned the job market. As can be seen in the sample quotes above, participants did reference more than one theme in their responses. Furthermore, the interview protocol did not directly or indirectly reference any of three themes (Appendix 2) so any references to the aforementioned themes were spontaneous.

The spontaneous frequent references to the network, experience and job market themes indicate that the measures are capturing thoughts related to the likelihood of obtaining other jobs. Therefore, the measures are adequate. Furthermore, the consistent appearance of the aforementioned themes suggests that further interviews will probably not reveal new insight. Therefore, saturation was achieved, and additional interviews were not needed.

Since the results support the conclusion that the measures were adequate and that saturation had been achieved, I then collected a second sample to evaluate the ease of movement measures from a quantitative perspective. With Study Two, I examined the factor structure of the measurement items and looked for evidence that ease of movement had convergent and discriminant validity.

Table 3 Representative Quotes from Study One

Quote	Network	Experience	Job Market	Comment
"I think job hunting is very difficult. I think that I have to do it myself. I don't have really any associations or institutions that sort of help me find a job. So I think a lot of it is on my back."	X			Good example of an employee considering his network when he heard the ease of movement measures. It also shows that employees can view their ease of movement negatively.
"The area that I am working in, immigration, I know for a fact that there are opportunities that are available for me to take.			X	A nice example of an employee who thought about the job market when he heard the ease of movement measures.
"I think at this point with my experience I am pretty it would be pretty easy to find another job."		X		A good example of an employee who focused on her job experience when she heard the ease of movement measures.
"I think that the combination of the contacts that I have, the reputation that I have developed and my actual abilities make it highly likely that I will have no trouble finding another job."	X	X		This quote shows that some employees considered more than one thing when they heard the ease of movement measures.
"Based on the current job market, I think it my inclination and effort, the people who I talk to in the Atlanta area is there are very few openings for what I do. My category of work, the creative category of work, is being done by younger and younger people so as you get older and your rates get more expensive, people don't see a value in				A good example of an employee who considered all three factors (network, experience and job market) when he heard the ease of movement measures. This quote also demonstrates that employees may consider multiple factors when assessing their ease of movement.
your experience."	Х	Х	X	

Note. Each of these quotes came from a different participant in the study. The three periods within the quotes indicates that the participant paused.

Study Two

Sample. Participants were recruited from undergraduates taking management courses at a large university in the southeastern United States and were given extra credit for completing the study. Two hundred twenty four participants who were currently working completed the survey. A majority of the participants were female (57%), and the racial distribution was 35% African American, 27% Caucasian, 15% Asian, 13% Hispanic and 10% other racial categories. The average participant age was 24 with a range in age from 18 to 59. On average, participants had been at their current jobs for 26 months and with their current organizations for 26 months. The number of hours worked per week by participants ranged from 4 to 60 with an average of 27.

Measures

Education. This was assessed with a single item measure "Starting with kindergarten, how many years of school have you completed?".

Job Experience. This was assessed with a single item measure "How many months have you worked in your current job?".

Self-perceived Individual Employability. The 11-item scale developed by Rothwell and Arnold (2007) was used. Sample items are "My personal networks in this organization help me in my career" and "If I needed to, I could easily get another job like mine in a similar organization.

Extraversion. This was assessed with the 8-item Minimarkers for Extraversion developed by Saucier (1994). Participants were provided a list of 8 adjectives and asked to rate how accurately each adjective described them. Sample adjectives include "Talkative" and "Bold".

Neuroticism. This was assessed with the 8 item Minimarkers for Neuroticism developed by Saucier (1994). Participants were provided a list of 8 adjectives and asked to rate how accurately each adjective described them. Sample adjectives include "Moody" and "Jealous".

Positive Affect. The 20-item PANAS Scale developed by Watson, Clark and Tellegen (1988) was used. Participants were provided a list of 20 words. For each word, participants were asked to "indicate to what extent do you feel this way right now when thinking about other jobs." Some of the sample words used include "interested", "enthusiastic" and "inspired."

Negative Affect. The 20-item PANAS Scale developed by Watson, Clark and Tellegen (1988) was used. Participants were provided a list of 20 words. For each word, participants were asked to "indicate to what extent you feel this way right now when thinking about other jobs." Some of the sample words used include "guilty", "scared" and "hostile."

Continuance Commitment. The eight item scale developed by Allen and Meyer (1990) was used. Sample items include "It would be very hard for me to leave my organization right now, even if I wanted to" and "Right now, staying with my organization is a matter of necessity as much as desire".

Ease of Movement. I developed a three item scale to assess employees' perceptions about the likelihood of obtaining another job. The three items are "It would be easy for me to get another job", "Finding another job would be simple" and "I could find another job without difficulty".

Networking. This was assessed using the three items developed by Griffeth, Steel, Allen and Bryan (2005). A sample item used was "I have contacts in other companies who might help me line up a new job".

Analysis

Confirmatory factor analysis (CFA) of a two factor model with the factors of ease of movement and networking was conducted using LISREL 8.51(Joreskog & Sorbom, 2001). A one factor model for ease of movement could not be used because the one factor model would have zero degrees of freedom, which would have prevented me from testing the model. Additionally, two three factors models (ease of movement, networking and continuance commitment; ease of movement, networking and employability) were tested. The other variables were included in the CFA to help the evaluate validity of the ease of movement items. If the ease of movement items had good validity, all of the ease of movement items should load onto one factor and have low cross-loadings with the other factors (Kline, 2015).

Following accepted practice, the chi-square statistic and the p-value were reported. The chi-square statistic is extremely sensitive to sample size, which often leads to a model being rejected despite the fact that the data may fit the model well from a practical standpoint (Bentler & Bonett, 1980). Therefore, additional fit indices- goodness of fit indice (GFI; (Bentler, 1983)), root mean squared error of approximation (RMSEA; (Steiger, 1990)) and comparative fit indice (CFI; (Bentler, 1990))- were also examined.

Although there is some ambiguity regarding the standards for evaluating fit (Marsh, Hau, & Wen, 2004), some general rules of thumb have been established (Hu & Bentler, 1999). An RMSEA with a value of 0.06 or less and a GFI and a CFI with values of 0.95 or greater are considered evidence of good fit for a model. Beyond the overall model, I also examined the standardized factor loadings. There is no agreed upon cutoff value for standardized factor loadings. However, higher standardized loadings are preferred because they indicate that more of the variance in the measurement item is explained by the factor (Kline, 2015). The variance in
the measurement item explained by the factor can be calculated by squaring the standardized factor loading. A standardized factor loading of greater than 0.70 indicates that a majority of the variance in the item is explained by the factor (Kline, 2015).

To evaluate convergent and discriminant validity for ease movement, the correlations and effect sizes between ease of movement and other constructs were examined. Effect sizes were placed into one of three categories (small, medium and large) with corresponding values of 0.10, 0.30 and 0.50 respectively (Cohen, 1992).

Results

Confirmatory Factor Analysis. The descriptive statistics and correlations for all of the variables are listed in Table 4. Table 5 contains the χ^2 and other fit statistics for all of the factor models tested. The χ^2 for the two factor model (ease of movement and networking) was not significant (χ^2 =8.48; p>0.05, 8 degrees of freedom). The RMSEA of 0.01 was less than the threshold level of 0.06, and the CFI and GFI of 1.00 and 0.99 respectively were greater than the cutoff value of 0.95. With both three factor models (ease of movement, networking and continuance commitment; ease of movement, networking and employability), the χ^2 was significant (χ^2 =365.75; p<0.05, 74 degrees of freedom; χ^2 =524.58; p<0.05, 116 degrees of freedom). Additionally, the CFI and GFI for both three factor models were less than 0.95, and the RMSEA was greater than 0.06 (CFI 0.83, 0.81; GFI 0.77, 0.74; RMSEA 0.15, 0.14).

As shown in Table 6, the factor loading for each ease of movement measurement item in the two factor model was greater than 0.70, which indicates that a majority of the variance for each item was explained by the corresponding factor. Similarly, with both three factor models, the factor loadings for all ease of movement measurement items also exceeded 0.70 (See Tables 7 and 8).

Descriptive Statistics and Correlations

		Mean	S.D.	1	2	3	4	5	6	7	8	9
1	Education	16.14	2.34									
2	Experience	25.79	31.12	0.19*								
3	Extraversion	6.16	1.39	0.04	0.09	(0.79)						
4	Neuroticism	3.61	1.24	-0.01	-0.12	-0.18*	(0.70)					
5	Positive Affect	3.39	0.96	0.05	0.03	0.13	-0.08	(0.93)				
6	Negative Affect	1.87	0.76	0.05	0.02	-0.30*	0.39*	0.00	(0.88)			
7	Continuance Commitment	4.00	1.04	-0.03	0.08	0.07	0.07	0.03	0.13	(0.68)		
8	Ease of Movement	4.56	1.57	0.00	-0.04	0.14*	-0.05	0.15*	-0.12	-0.32*	(0.93)	
9	Networking	4.55	1.47	0.03	0.03	0.21*	-0.07	0.21*	-0.13	0.04	0.32*	(0.88)

Note. Reliabilities for each measure are in parentheses. One item measures do not have reliabilities. Correlations highlighted in dark gray either partially or fully supported the hypothesized

relationship with ease of movement. Correlations in light gray did not provide support for the hypothesized relationship with ease of movement.

N = 220, *p < 0.05

Comparison of Measurement Models χ2 CFI GFI RMSEA 90% CI df 8.48 Two Factor Model^a 8 1.00 0.98 0.01 [0.00, 0.08] [0.14, 0.16] Three Factor Model^b 356.75* 74 0.83 0.77 0.15 524.58* Three Factor Model^c 0.81 0.74 0.14 [0.13, 0.15] 116

 Table 5

 Comparison of Measurement Model

Note. a. Two factors are ease of movement and networking. b. Three factors are ease of movement, networking and continuance commitment. c. Three factors are ease of movement, networking and employability.

N = 220; *p<0.05

Table 6

Two Factor Model with Ease of Movement and Networking

Measurement Item	Factor 1	Factor 2
Ease of Movement		
1. It would be easy for me		
to get another job.	0.89	-
2. Finding another job		
would be simple.	0.96	-
3. I could find another job		
without difficulty.	0.90	-
Networking		
1. I have a far-reaching "network"		
of contacts which could help me		
find out about other job opportunities.	-	0.85
2. I have contacts in other companies		
who might help me line up a new		
job.	-	0.95
3. My work and/or social activities		
tend to bring me in contact with a		
number of people who might help me		
line up a new job.	-	0.85
N = 210. All loadings are standardized.		

Table 7

Three Factor Model with Ease of Movement, Networking and Continuance Commitment

Measurement Item	Factor 1	Factor 2	Factor 3	
Ease of Movement				
1. It would be easy for me				
to get another job.	0.89	-	-	
2. Finding another job				
would be simple.	0.96	-	-	
3. I could find another job				
without difficulty.	0.90	-	-	
Networking				
1. I have a far-reaching "network"				
of contacts which could help me		0.0 7		
find out about other job opportunities.	-	0.85	-	
2. I have contacts in other companies				
who might help me line up a new				
job.	-	0.94	-	
3. My work and/or social activities				
tend to bring me in contact with a				
number of people who might help me		0.85		
line up a new job.	-	0.05	-	
Constitution Constitution				
Lom not afreid of what might hannon				
if I guit my job without having another				
one lined up. (R)	-	-	0.81	
one mied up. (K)				
2. It would be very hard for me to				
leave my organization right now even				
if I wanted to.	-	-	0.88	
3. Too much in my life would be				
disrupted if I decided I wanted to leave	`			
my organization now.	-	-	0.66	

4. It wouldn't be too costly for me to leave my organization now. (R)	(-0.34) -	0.44
5. Right now, staying with my organization is a matter of necessity		
as much as desire.	(-0.45) -	0.39
6. I feel that I have too few options		0 28
7. One of the few serious consequences		
of leaving this organization would be	(0.28)	0.08
the scarcity of available alternatives.	(-0.20)	0.00
8. One of the major reasons I continue		
to work for this organization is that		
leaving would require considerable		
personal sacrifice - another organization		
may not match the overall benefits		
I have here.	(-0.31) -	0.11

N = 208. The numbers in bold are the loadings for each factor taken from the CFA. The numbers in parentheses are

cross loadings and were obtained from the modification indices of expected change if items were allowed to cross-load. Only cross loadings of 0.20 or greater are shown. All factor loadings are standardized.

Three Factor Model with Ease of Moven	nent, Networking a	nd Employability		<u> </u>
Measurement Item	Factor 1	Factor 2	Factor 3	
Ease of Movement				
1. It would be easy for me				
to get another job.	0.89	-	-	
2. Finding another job				
would be simple.	0.96	-	-	
3. I could find another job				
without difficulty.	0.90	-	-	
Networking				
1. I have a far-reaching "network"				
of contacts which could help me				
find out about other job opportunities.	-	0.86	-	
2. I have contacts in other companies				
who might help me line up a new				
job.	-	0.94	-	
-				
3. My work and/or social activities				
tend to bring me in contact with a				
number of people who might help me				
line up a new job.	-	0.86	-	
Employability				
1. Even if there was downsizing in this				
organization I am confident that I would				
be retained.	-	-	0.51	
2. My personal networks in this				
organization help me in my career.	-	-	0.31	
3. I am aware of the opportunities arising	g			
arising in this organization even if they	-			
are different to what I do now.	-	-	0.29	

Table 8

4. The skills I have gained in my

present job are transferable to other occupations outside this organization.		0.4	L
5. I could easily retrain to make myself more employable elsewhere.	(-0.20) -	0.50	5
6. I have a good knowledge of			
opportunities for me outside of this			
organization even if they are quite			
different to what I do now.		0.58	8
7. Among the people who do the same			
job as me, I am well respected in this			
organization.		0.69)
8. If I needed to, I could easily get			
another job like mine in a similar			
organization.		0.78	3
9. I could easily get a similar job to			
mine in almost any organization.	(0.22) -	0.70	5
10. Anyone with my level of skills			
and knowledge, and similar job and			
organizational experience, will be highly			
sought after by employers.		0.78	3
11. I could get any job, anywhere, so			
long as my skills and experience were			
reasonably relevant.		0.75	5

N = 207. The numbers in bold are the loadings for each factor taken from the CFA. The numbers in parentheses are

cross loadings and were obtained from the modification indices of expected change if items were allowed to cross-load. Only cross loadings of 0.20 or greater are shown. All factor loadings are standardized.

Convergent and Discriminant Validity. I examined the correlations between ease of movement and other constructs for evidence of convergent and discriminant validity. The correlations for all of the constructs can be found in Table 4. For convergent validity, I found evidence to support my predictions regarding the relationships between ease of movement and extraversion, continuance commitment and networking. There were positive correlations with both extraversion (r = 0.14) and networking (r = 0.32), and a negative correlation with continuance commitment (r = -0.32). All three correlations were significant, and the size of the correlations were consistent with what I previously predicted. For the correlations with networking and continuance commitment, I predicted medium effect sizes or correlations of greater than 0.30 while for extraversion I predicted a small effect size of greater than 0.10.

For the relationship between positive affect and ease of movement, there was some support for my prediction. The relationship had a significant positive correlation, but the effect size was not as large as expected. I predicted a large effect size (a correlation greater than 0.50) for positive affect, but I only found evidence of a small effect size (r = 0.15).

Finally, there was no evidence to support the predictions regarding correlations between ease of movement and job experience, education, neuroticism and negative affect. None of the aforementioned relationships had a significant correlation.

Discussion

With the second study, I found further support for construct validity between the ease of movement construct and the measurement items. For the two factor model, the chi-square test was not significant, and all model fit indices were within the range of acceptable values, which suggests the measurement model for ease of movement fits the data well. Furthermore, in the CFA, all of the ease of movement factor loadings in all of the models were 0.85 or greater. This

indicates that the ease of movement factor explains at least 70% of the variance in each measurement item.

All of the evidence, however, did not support construct validity. For both of the three factor models, the chi-square statistic was significant, and the fit indices did not meet the threshold levels. Based upon these findings, additional refinement of the ease of movement items may be needed. On the other hand, I may just need to gather another sample. Within the second sample, there may have been some range restriction because many of the participants did not have extensive job experience. Adding participants to the sample with more job experience may have produced a sample with stronger loadings on each factor and better fit indices for the model as a whole because these additional participants would have provided more variance.

Within the second study, I found some support for convergent and discriminant validity. There were significant correlations between ease of movement and extraversion, networking, continuance commitment and positive affect, and the magnitude of some of those relationships (extraversion, networking and continuance commitment) were consistent with my predictions. However, several expected correlations between ease of movement and other constructs were not significant, and the effect size for the correlation with positive affect was less than anticipated.

The lack of significant correlations does raise some concerns about convergent and validity, but some of these concerns may be due to the sample itself. Two predicted relationships that were not supported by the data were correlations between ease of movement and education and ease of movement and job experience. With the education construct, there may have been some range restriction. All participants in this sample were undergraduate students. Therefore, most of the responses were very similar, meaning that the variance was small, which limited the likelihood of finding a significant relationship.

With regards to job experience, my measurement may have been too coarse to capture what might be pertinent when individuals assess the likelihood of obtaining another job. Job experience was based upon the number of months that participants had worked at their current jobs. Although this measure does capture experience, it may not capture relevant experience. The fact that the participants were working towards a college degree suggests that their current experience may not be pertinent for their future careers. Perhaps, some participants plan to use their college degree to work in a new field. In that situation, prior work experience may be irrelevant. As such, the construct would be less likely to correlate with ease of movement.

General Discussion

The overarching purpose of this essay and the second essay centers on addressing the question of why ease of movement is not more predictive. Before analyzing ease of movement, I first had to have confidence that the measures for ease of movement were reliable and valid. Prior research did not always define the ease of movement construct, and when the construct was defined, there was a lack of consistency in the definition across studies. Consequently, many measures did not have good psychometric properties.

In this paper, I addressed the methodological issues that appeared to be present in many of the prior studies. Relying upon prior descriptions, definitions and measures of ease of movement (Arnold & Feldman, 1982; Griffeth & Hom, 1988; Griffeth et al., 2005; Lee, 1988; Michaels & Spector, 1982; Steel & Griffeth, 1989), I created a definition of ease of movement that focused on an individual's perceptions about the likelihood of obtaining other jobs. With this definition, I was able to clarify that ease of movement was a perceptual measure. The definition was not based upon objective information and did not include any antecedents. Items consistent with this definition were developed, and I used both qualitative and quantitative data to provide evidence that that the items were consistent with my definition of ease of movement.

In addition to construct validity, I found some support for convergent and discriminant validity. Ease of movement correlated with extraversion, continuance commitment, positive affect and networking as predicted. However, several predicted correlations were not supported by the data.

Research Implications

Although prior studies found weak effects for ease of movement, there were always questions as to whether the findings were due to a lack of a substantive relationship or issues with the measures themselves. With the development of these items for ease of movement, the questions about measurement have been partially addressed. Going forward, researchers can have greater confidence that the ease of movement items are valid and reliable, and research on ease of movement can focus more on the substantive relationships.

This study also began to explore relationships with ease of movement outside of the turnover model. Prior research with ease of movement has been focused almost exclusively on ease of movement as an antecedent of turnover intent and turnover (Griffeth & Hom, 1988; Steel & Griffeth, 1989). However, the significant correlations with constructs that are typically not found in turnover models such as positive affect and continuance commitment suggests that ease of movement may be relevant in other processes at work. Furthermore, prior research has primarily framed ease of movement as a cognitive process (Griffeth et al., 2005; Mobley et al., 1978; Steel & Griffeth, 1989), but the correlation with positive affect suggests that there may be an emotional aspect that should be further explored within the turnover model and in other relevant situations.

Practical Implications

Ease of movement may be more relevant in addressing emotions than previously thought. The significant correlation between ease of movement and positive affect suggests that ease of movement may influence emotions. Perhaps, the level of ease of movement could moderate the emotions that employees experience in certain situations. For example, at high levels, ease of movement may weaken the relationship between a behavior and emotion, making the emotion less intense because thoughts about other jobs will help employees to realize that they can escape the situation and pursue other employment while at low levels of ease of movement may strengthen the relationship between the same behavior and the corresponding emotion because employees recognize that they are stuck in their current situations. They probably cannot escape by pursuing another job. The role that ease of movement may play will certainly vary depending upon the other variables in the model. However, the findings from this study suggest that ease of movement could be relevant in other areas outside of the turnover process, and employers may want to account for ease of movement in situations in which it was previously ignored.

While the findings from this study suggest the value in examining the potential influence ease of movement could have on emotions, ease of movement may also help inform cognitive processes. Ease of movement did have a significant relationship with continuance commitment, which involves weighing the perceived economic value of staying with an organization (Allen & Meyer, 1990; Meyer et al., 1993). Since there is likely a cognitive aspect in weighing perceived economic value, the significant correlation with continuance commitment suggests that ease of movement could also be pertinent in situations involving cognition. Given that prior research regarding ease of movement focused almost exclusively on the turnover process, there may be plenty of situations in which ease of movement could be relevant that have not previously been examined. Therefore, employers should explore situations outside of the turnover model in which thoughts about the likelihood of obtaining other jobs may inform thoughts, attitudes and behaviors.

Limitations

The present study has several limitations. First, the sample from the second study was drawn from undergraduate students, which may raise concerns about whether the participants were representative of the current work force. Some aspects of this data are consistent with the current work force. On average, participants worked 27 hours per week, which suggests that many of the participants were working full time or close to full time. Furthermore, participants worked in a variety of industries including government, insurance, retail, marketing, criminal justice and restaurant/hospitality. Based upon this information, there is evidence to support the conclusion that participants are representative of the current work force. However, the average age of the participants was 24. This indicates that the sample may have excluded older workers who have more experience and could have brought a different perspective regarding the likelihood of obtaining other jobs. As such, there could be some merit to the claims that the sample size is not representative, and another sample may be needed to confirm the findings.

A second limitation was that the study was based upon self-reports and had a crosssectional design. However, given the psychological nature of many of the constructs, the use of self-reports was appropriate (Schmitt, 1994). Many of the constructs in this study focused on thoughts and feelings, and an individual is in a better position than a third party to report on what he or she felt or thought. As for the use of cross-sectional data, one of the concerns in using this type of data is the weakened causal inferences. However, with this study, the analysis was focused on correlations and not causal relationships, which should mitigate concerns raised about using cross-sectional data.

Future Research

I recommend future research pursue two paths regarding ease of movement. The findings from this paper suggest that ease of movement may be relevant outside of the turnover model where it has been traditionally included as an antecedent of turnover. The correlation with positive affect suggests that thoughts about other jobs elicits some emotions and should be explored further. Given the association with feelings, ease of movement could moderate relationships. For example, in a stress model, the relationship between stressors and negative emotions could be moderated by ease of movement. High levels of ease of movement could weaken the relationship between stressors and emotions as employees recognize that they do have other options if the stressors at their current jobs persist.

In addition to exploring areas where ease of movement may be relevant outside of the turnover model, I would suggest further research examining the role of ease of movement within the turnover model. Prior researchers have found weak correlations and non-significant relationships (Griffeth et al., 2000; Steel & Griffeth, 1989). However, those findings may have been due to issues with the measures rather than a lack of a substantive relationship. Therefore, another look is warranted. Ease of movement should be examined within the model as a whole and in relation to specific antecedents of turnover. Perhaps, the value of ease of movement is not in its influence on turnover but on other antecedents that have a significant influence on turnover.

Conclusion

Given the increasing rate at which employees are changing jobs, there will continue to be interest in constructs related to decisions to leave such as ease of movement. This article has clarified the definition of ease of movement and developed new measures that are consistent with that definition. Having developed new measures, I recommend that future research examine the influence of ease of movement both within and outside of the turnover model.

Chapter Three

REIMAGINING AN OLD IDEA: THE ROLE OF EASE OF MOVEMENT WITHIN AN ORGANIZATION.

Although ease of movement has typically been included in turnover models to help explain why people leave an organization (Griffeth & Hom, 1988; March & Simon, 1958; Mobley, Griffeth, Hand, & Meglino, 1979; Steel & Griffeth, 1989), perhaps our focus should shift away from those leaving an organization and instead concentrate on those that remain. There are likely many people who have perceptions about the likelihood of obtaining another job yet choose to remain with their current organizations. For those that stay, these thoughts about ease of movement may not simply disappear and could influence emotions and behaviors.

In identifying contexts in which ease of movement may be relevant, I turn to the turnover literature for guidance. Within turnover models that include ease of movement, the turnover process is often initiated by employees' dissatisfaction with their current circumstances (Griffeth, Hom, & Gaertner, 2000; Jackofsky, 1984; Mobley et al., 1979). This suggests that ease of movement is likely to be relevant in negative situations in which employees may desire a change. Ease of movement provides perspective about alternatives if employees decide to act on that desire to change. Although ease of movement has traditionally been used in turnover models, there is nothing to suggest that ease of movement may not also be pertinent in other negative situations at work.

Under the transactional theory of stress, work place stressors can create unpleasant situations in which employees experience negative feelings such as anger and anxiety, which may lead to negative behavior such as counterproductive work behaviors (Edwards & Rothbard, 1999; Lazarus & Folkman, 1984; J. A. LePine, LePine, & Jackson, 2004). Given that work place stressors can initiate unpleasant situations, it is possible that thoughts about the likelihood of obtaining other jobs may be salient to employees as they respond to those stressors.

For employees with high ease of movement, the thoughts about other jobs could make the situation more bearable because these employees recognize that they could obtain other jobs if the stressors at their current jobs persist, which may weaken the relationship between negative emotions such as anger and anxiety and negative behavior such as counterproductive work behaviors. On the other hand, for employees with low ease of movement, thoughts about other jobs may exacerbate the situation. Employees are already experiencing negative emotions associated with the stressors from their current jobs (Cavanaugh, Boswell, Roehling, & Boudreau, 2000), and when employees think about other jobs, they recognize that they may not be able to escape the situation, which could strengthen the relationship between negative emotions and negative behavior. Within the transactional theory of stress model, ease of movement could be a relevant construct that influences the relationship between negative emotions and behavior.

With this paper, I make two contributions to research. First, I seek to identify contexts or theoretical spaces in which ease of movement may be relevant outside of the turnover model by examining the role of ease of movement within the transactional theory of stress model. Second, within the stress literature, I address the previous call to develop a more nuanced understanding of the relationships among stressors, emotions and behaviors (Rodell & Judge, 2009) by identifying a potentially relevant moderator.

Theory Development

Ease of Movement

As addressed in Essay 1, there has been a lack of clarity in defining ease of movement (Steel & Griffeth, 1989). Therefore, it is important to define the construct. For the purposes of this study, *ease of movement is defined as employees' perceptions about the likelihood of obtaining other jobs*.

Having clarified the definition for ease of movement, I can now build my model examining how ease of movement may influence the relationship between negative emotions and behaviors as employees respond to stressors. Using the transactional theory of stress, I will first build my model connecting stressors, negative emotions and behavior and then identify those relationships within the model that may be influenced by ease of movement.

Transactional Theory of Stress

The transactional theory of stress is well-established model within the stress literature (Lazarus & Folkman, 1984; J. A. LePine et al., 2004; Rodell & Judge, 2009) and focuses on the cognitive evaluation of stressors along with the response to that initial evaluation. The cognitive evaluation begins when demands in the environment exceed individuals' resources (Folkman & Lazarus, 1985; Lazarus, 1991; Lazarus & Folkman, 1984). In response to those demands or stressors, employees make a primary appraisal and reach one of three conclusions about the stressors. Employees will assess the stressors as irrelevant, an obstacle to personal growth or an opportunity for personal growth (Folkman & Lazarus, 1985; Lazarus & Folkman, 1984). As part of this initial evaluation, individuals will likely experience various emotions such as anger, anxiety and attentiveness. The type of emotions employees experience will vary based upon how

employees perceive the stressors (Lazarus, 1991; J. A. LePine et al., 2004; J. A. LePine, Podsakoff, & LePine, 2005).

After the primary appraisal assessing the stressor, employees will then make a secondary appraisal to determine how to respond (Lazarus & Folkman, 1984). If the stressor is perceived as irrelevant, employees will likely see no reason to respond and may take no further action. In contrast, if the stressor is perceived as an obstacle to or an opportunity for personal growth, then employees may cope by considering what thoughts or behaviors that they could use to manage the stressor (Folkman & Moskowitz, 2004; Lazarus & Folkman, 1984). If individuals believe that they can probably resolve the stressor, they are more likely to engage in problem-focused coping taking actions that address the cause of the stressor (Cooper, Dewe, & O'Driscoll, 2001; Rodell & Judge, 2009) On the other hand, if individuals believe that they are unlikely to resolve the stressor, they may be more likely to turn their attention inwards and engage in emotion-focused coping by attempting to make themselves feel better about the stressor. (Cooper et al., 2001; Rodell & Judge, 2009).

Although the transactional theory of stress model provides a broad framework to explain how individuals generally respond to stressors, it offers less guidance regarding responses to specific types of stressors. Since ease of movement may not be relevant in addressing all of the stressors that employees may experience at work, the types of stressors included within model will be important. To identify those stressors which will likely be most salient, I look to the challenge/hindrance stressor framework for guidance.

Challenge/Hindrance Stressor Framework

The challenge/hindrance framework focuses on stressors associated with job demands and classifies them into two categories, challenge or hindrance, based upon whether the stressor impedes or promotes personal growth and goal attainment (Boswell, Olson-Buchanan, & LePine, 2004; Cavanaugh et al., 2000; J. A. LePine et al., 2004). Although individuals' perceptions of stressors may vary, the categories are broad enough that most individual experiences can easily be classified as either a hindrance or challenge stressor (Cavanaugh et al., 2000; Webster, Beehr, & Love, 2011). This distinction in classifying stressors as challenge or hindrance is important because researchers have found evidence that emotions and behaviors will vary based upon the type of stressor (J. A. LePine et al., 2004; Podsakoff, LePine, & LePine, 2007; Rodell & Judge, 2009).

Although both hindrance and challenge stressors could be influenced by ease of movement, ease of movement will likely be most relevant with hindrance stressors. Hindrance stressors are those stressors that are likely appraised as hindering personal growth and goal attainment (Cavanaugh et al., 2000). Some examples of hindrance stressors include role ambiguity, role conflict, red tape and inconveniences (Cavanaugh et al., 2000; J. A. LePine et al., 2004; Podsakoff et al., 2007). While employees may be able to resolve some of these stressors, others such as red tape or inconveniences may just be characteristics of certain organizations or jobs and will not go away.

As employees attempt to respond to these stressors that they may not be able to resolve (Lazarus & Folkman, 1984), ease of movement may be relevant because it offers a potential alternative. Employees with high ease of movement and employees with low ease of movement are both likely to think about the likelihood of obtaining other jobs because it informs whether the hindrance stressors could be resolved by pursing options outside of the organization. Therefore, when employees experience hindrance stressors and attempt to manage them, ease of movement could influence those attempts. In contrast to hindrance stressors, employees may be unlikely to think about ease of movement when they experience challenge stressors. Challenge stressors are those stressors that are appraised as opportunities for growth, learning and goal attainment (Cavanaugh et al., 2000). Some examples of challenge stressors include job complexity and workload (J. A. LePine et al., 2005; Podsakoff et al., 2007). Challenge stressors are generally perceived positively by employees (Cavanaugh et al., 2000; M. A. Lepine, Yiwen, Crawford, & Rich, 2016; Podsakoff et al., 2007) because they present opportunities for growth.

Employees are likely to embrace challenge stressors because they potentially provide opportunities to meet needs for growth, learning and goal attainment. When employees consider how to manage challenge stressors, they are unlikely to think about anything that could pull them away from their current situations such as the likelihood of obtaining other jobs because it would mean losing the potential opportunities provided by the challenge stressors. Therefore, ease of movement will likely not be relevant as employees seek to manage challenge stressors.

Having identified which stressors are likely to be more relevant for ease of movement, I look to integrate the challenge/hindrance typology within the transactional stress model. Researchers have previously integrated these two approaches in an attempt to explain why stressors sometimes produced differential results and found some support for this approach (J. A. LePine et al., 2004; J. A. LePine et al., 2005; Podsakoff et al., 2007; Rodell & Judge, 2009). However, prior research suggests that additional moderators could be added to the model to provide a fuller understanding of the relationships among stressors, emotions and behaviors (Rodell & Judge, 2009). Ease of movement could be one of those moderators given its potential relevance to employees as they seek to manage hindrance stressors. However, before examining the role of ease of movement within this integrated model, I first will identify the integrated model developed by previous researchers to clarify the role of ease of movement within the model and to test the underlying relationships between hindrance stressors, negative emotions and counterproductive work behavior.

Hindrance Stressors and Primary Appraisal

Given that ease of movement is more likely to be pertinent with hindrance stressors, these stressors will be my focus as I examine the emotions that employees may experience during the primary appraisal within this integrated model. As previously mentioned, hindrance stressors are likely to be appraised as interfering with personal growth. Therefore, when employees identify a stressor as a hindrance stressor, they likely will experience negative emotions. This conclusion is consistent with prior studies that found significant correlations between hindrance stressors and negative emotions (Boswell et al., 2004; Rodell & Judge, 2009) and the transactional theory of stress model in which stressors that harm or threaten valued outcomes are likely to generate negative emotions (Folkman & Lazarus, 1985; Lazarus & Folkman, 1984).

The specific negative emotions that employees could experience in response to hindrance stressors may depend upon how hindrance stressors are perceived. Lazarus (1991) has suggested that employees may experience both anger and anxiety in response to attacks on personal values. Given that hindrance stressors impede personal growth (Cavanaugh et al., 2000), employees may perceive these impediments as an attack on their personal values and could experience anger and anxiety (Rodell & Judge, 2009). Prior studies have found positive correlations between hindrance stressors and both anger and anxiety (Boswell et al., 2004; Rodell & Judge, 2009), which provides support for both the relationship between hindrance stressors and anger and the relationship between hindrance stressors and anxiety. Furthermore, anxiety and anger are not mutually exclusive as researchers have found that the same hindrance stressors correlated with both anger and anxiety (Rodell & Judge, 2009).

H1a: Within individuals, hindrance stressors will be positively associated with anger.H1b: Within individuals, hindrance stressors will be positively associated with anxiety.

Hindrance Stressors and Secondary Appraisal

After experiencing negative emotions during the primary appraisal, individuals must decide how to cope with those stressors and the corresponding emotions during the secondary appraisal (Folkman & Lazarus, 1985; Lazarus & Folkman, 1984). According to the transactional theory of stress, employees may cope by engaging in specific behavior to reduce negative feelings (Lazarus, 1991; Lazarus & Folkman, 1984; Rodell & Judge, 2009; Weiss & Cropanzano, 1996). Furthermore, researchers have consistently found that employees responded to hindrance stressors by engaging in negative behavior including counterproductive work behavior (Boswell et al., 2004; Cavanaugh et al., 2000; Podsakoff et al., 2007; Rodell & Judge, 2009).

Within this integrated model, the decision to engage in negative behaviors such as counterproductive work behaviors after experiencing a specific negative emotion such as anger could be related to personal values. Lazarus (1991) proposed that individuals may engage in retaliation and vengeance in response to damage to their personal values. Many hindrance stressors such as red tape and inconveniences that have generated feelings of anger may be seen as attacking employees' personal values because they could be perceived as impeding personal growth (Cavanaugh et al., 2000). Furthermore, since the presence of hindrance stressors may be due to organizational policies and procedures, employees may see the organization as the cause of these hindrance stressors. Therefore, in response, employees may retaliate against the organization, rather than a specific individual.

By engaging in counterproductive work behaviors, employees have the opportunity to get back at their organizations by creating some negative outcomes, which in turn may help employees manage their anger and feel better about the hindrance stressors. This reasoning is consistent with prior research that has found positive correlations between anger and counterproductive work behavior (Chen & Spector, 1992). Therefore, within the transactional stress model, anger mediates the relationship between hindrance stressors and counterproductive work behaviors. However, since the decision to engage in counterproductive work behaviors is likely driven by multiple factors, this mediation will only be partial.

Hypothesis 2*a*: *The within person relationship between hindrance stressors and counterproductive work behaviors will be partially mediated by anger.*

While anxiety may also induce employees to act to try to reduce their negative feelings, the kind of behavior associated with anxiety will likely differ from the behavior typically associated with anger. The actions commonly connected with anxiety are avoidance and escape (Lazarus, 1991). With avoidance, employees do not address the stressors. By ignoring the stressors, the stressors are no longer a main focus for the employees, which allows individuals to gradually deal with the stressors and the corresponding emotions and should reduce the effects of the stressors (Roth & Cohen, 1986).

Within the workplace, employees may address their anxiety due to hindrance stressors by withdrawing, which could include some counterproductive work behaviors such as arriving at work late, leaving early and missing meetings (Bennett & Robinson, 2000; Spector, Bauer, & Fox, 2010). Since employees will be at work less, they have more opportunities to avoid the

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hindrance stressors, which may allow these employees to more gradually deal with the hindrance stressors and the corresponding anxiety and make them feel better about the situation. Therefore, there may be an indirect positive relationship between hindrance stressors and counterproductive work behaviors that is mediated by anxiety. Furthermore, this relationship is supported by prior research, which found evidence that hindrance stressors and counterproductive work behaviors were mediated by anxiety (Rodell & Judge, 2009). As with anger, this mediation will likely only be partial because multiple factors will likely contribute to the decision to engage in counterproductive work behaviors.

Hypothesis 2b: The within person relationship between hindrance stressors and counterproductive work behaviors will be partially mediated by anxiety.

Ease of Movement as a Moderator

Having outlined the role of hindrance stressors, negative emotions and counterproductive work behaviors within the transactional theory of stress model, I can now examine how ease of movement may influence these variables. Within this integrated model, ease of movement could be a potential moderator of the relationship between the negative emotions that employees experience in response to hindrance stressors and the counterproductive work behaviors that employees may engage in to cope with those stressors. To the extent employees engage in counterproductive work behaviors, it is likely in response to their perceptions that hindrance stressors are interfering with personal growth (Lazarus, 1991; Rodell & Judge, 2009). However, thoughts about the likelihood of obtaining other jobs may alter employees' perceptions about the extent to which hindrance stressors are interfering with their personal growth.

For employees with high ease of movement, they will likely recognize that they do have alternatives. If these hindrance stressors persist, employees could pursue other options to help them achieve personal growth. These job alternatives may suggest that hindrance stressors are not a significant impediment to personal growth and could weaken the relationship between negative emotions and counterproductive work behaviors.

While anger and anxiety are distinct emotions, the reason why employees may experience either or both emotions is likely the same. Employees may experience either of those emotions because hindrance stressors are likely perceived as impeding personal growth (Lazarus, 1991; Lazarus & Folkman, 1984; Rodell & Judge, 2009). The type of emotion is unlikely to alter employees' perceptions about hindrance stressors as an impediment. I have theorized that ease of movement influences the relationship between negative emotions and counterproductive behaviors because it may alter perceptions about the extent to which hindrance stressors are an impediment to personal growth. Since the type of emotion is unlikely to impact perceptions about hindrance stressors as an impediment, the influence of ease of movement would likely be similar whether employees experience anger or anxiety.

At high levels, ease of movement will likely weaken the relationship between negative emotions and counterproductive work behavior. But, it is possible that thoughts about the likelihood of obtaining other jobs could encourage employees to engage in counterproductive work behavior because the penalties for engaging in such behavior would be low. If organizations attempt to punish these employees for their bad behavior, they probably could leave and obtain jobs with other organizations. Therefore, there is less of a disincentive to engage in counterproductive work behavior.

While employees with high ease of movement may be tempted to engage in counterproductive work, they will likely will not engage in counterproductive work behaviors due to self-monitoring. Self-monitoring is an individual difference regarding the extent to which employees' behaviors are sensitive to situational and interpersonal cues (Snyder, 1974). Employees with high-self monitoring are more likely to be influenced by external expectations and cues (Allen, Weeks, & Moffitt, 2005; Snyder, 1974), making them less likely to behave in a way that their employers would view negatively because these employees want to meet those external expectations.

Researchers have previously found evidence of a significant positive relationship between ease of movement and self-monitoring (Allen et al., 2005). Therefore, employees with high ease of movement will likely have high levels of self-monitoring. This positive relationship between ease of movement and self-monitoring suggests that many employees with high ease of movement are likely to have high levels of self-monitoring, making them less likely to engage in counterproductive work behaviors. Counterproductive work behaviors are generally perceived negatively and undesirable (Fox, Spector, & Miles, 2001) so employees with high selfmonitoring, including those with high ease of movement, would be less likely to engage in such behavior because it might be inconsistent with the external expectations of their employers. Therefore, although it is possible that high ease of movement could strengthen the relationship between negative emotions (anger and anxiety) and counterproductive work behavior, it is more likely that high ease of movement will weaken the relationship between the aforementioned variables.

For employees with low ease of movement, thoughts about the likelihood of obtaining other jobs will likely have the opposite effect. These employees likely have few job alternatives and may not be able to achieve their goals for personal growth elsewhere. The lack of job alternatives may reinforce the significant impediment that hindrance stressors are to personal growth. Therefore, low levels of ease of movement will likely strengthen the relationship between negative emotions (anger and anxiety) and counterproductive work behaviors.

H3a: Ease of movement will moderate the relationship between anger and counterproductive work behaviors such that the relationship between anger and counterproductive work behaviors is weaker when ease of movement is high than when ease of movement is low.

H3b: Ease of movement will moderate the relationship between anxiety and counterproductive work behaviors so that the relationship between anxiety and counterproductive work behaviors is weaker when ease of movement is high than when ease of movement is low.

Methods

Sample

The data for this study was collected from a fast food company with locations in the Southeastern United States and from undergraduate students at a college in the Southeastern United States. In total, there were 130 participants. The average age for the participants was 21.51 years, and a majority of the participants were female (56%). The racial composition of the participants was Caucasian (88%), African Americans (5%), Hispanic (2%), Other (2%), Asian (1%) and Multi-racial (1%). On average, participants had worked in their current jobs for 22 months and for the organization for 27 months.

Procedure

Emotions, by their nature, are ephemeral (Frijda, Manstead, & Bem, 2000). Given the important role that emotions play in the transactional theory of stress model, I wanted to make sure that I captured the emotions that employees experience. It was an imperative I used a sampling method that allowed me to collect data shortly after employees actually experienced emotions. Therefore, I adopted an experience sampling methodology (Wheeler & Reis, 1991),

which allowed me to collect data on the day that it occurred rather than several days or weeks later.

Participants completed an initial one time survey that gathered information about demographics and ease of movement. Once participants completed the first survey, they began receiving surveys at work. Participants were sent two surveys per day for five working days. The first survey was sent within a one and half hour time frame around the beginning of a participant's shift, and the second survey was sent within a one and half hour time frame around the end of the participant's shift. If participants missed a day, they had the opportunity to make up that day by adding another day. With the first survey of the day, I gathered data pertaining to hindrance stressors and emotions. In the second survey of the day, I collected data regarding emotions and counterproductive work behaviors.

Due to missing data, all participants were not included in the final sample. Only participants who provided at least one full day of data were included. The final sample included 130 participants. From those 130 participants, I obtained 553 day level observations.

Measures

Hindrance Stressors. This was assessed daily based upon previously developed measures (Cavanaugh et al., 2000; M. A. Lepine et al., 2016; Rodell & Judge, 2009). Sample items include "Today, I have received conflicting requests from two or more people" and "Today, I have not fully understood what is expected of me". A five point scale was used with anchors of 1 = strongly disagree to 5 = strongly agree.

Emotions. Ten adjectives (*alert, excited, angry, enthusiastic, irritable, nervous, attentive, jittery, hostile and determined*), from the PANAS-X scale (Watson & Clark, 1999) were measured twice daily. Measures for anger were calculated by adding the daily scores for *angry,*

hostile and irritable. Measures for anxiety were calculated by adding the daily scores for *nervous and jittery*. In the survey, the participant was instructed "For each word listed below, indicate to what extent you feel this way right now." A five point scale was used with anchors of 1 = none at all to 5 = extremely.

Counterproductive Work Behaviors. I measured counterproductive work behaviors using the 11-item measures developed by Bennett and Robinson (2000). Sample items include "Today I worked on a personal matter instead of working for my employer" and "I came in late to work without permission today". I used a five point scale with anchors of 1 = strongly disagree and 5 = strongly agree.

Ease of Movement. I used the three item measures described in <u>Essay 1</u>. The three items are "It would be easy for me to get another job", "Finding another job would be simple" and "I could find another job without difficulty". The items were measured on a seven point scale with anchors of 1 = strongly disagree and 7 = strongly agree.

Analysis

Before testing the hypotheses, I first conducted a confirmatory factor analysis (CFA). The measures for the nested within person variables (hindrance stressors, anger, anxiety and counterproductive work behaviors (CWBs)) are well-established (Bennett & Robinson, 2000; Cavanaugh et al., 2000; Rodell & Judge, 2009; Watson & Clark, 1999). However, with nested data, the factor structure of the measurement model could be influenced by the clustering of the data, which may result in biased parameter estimates and misestimated standard errors that distort the fit of the model (Julian, 2001; Kaplan & Elliott, 1997; Muthen & Satorra, 1995). Therefore, in conducting a CFA, I accounted for the possible influence of clustering on the factor structure of the measurement model for the possible influence of clustering on the factor

sample covariance matrix into the pooled within covariance matrix and the between group covariance matrix. I then used the pooled within covariance matrix to conduct a CFA on the within person variables (Hox & De Leeuw, 2002; Huang, 2017).

After conducting the CFA, I then moved on to the hypotheses. Since the data in this study has a nested structure due to the within-between person design, I used hierarchical linear modeling (HLM) (Snijders & Bosker) to test my hypotheses by regressing the daily score of the outcome variable (counterproductive work behaviors) on the daily scores of the level-1 within person variables (hindrance stressors, anger and anxiety) and the level-2 between person variable (ease of movement) across days. For Hypothesis 1a and Hypothesis 1b, I used two random effects models to capture the effects of hindrance stressors on anger and anxiety.

To test the proposed mediation in Hypotheses 2a and 2b, I used a modified path analysis approach (Bauer, Preacher, & Gil, 2006; MacKinnon, Lockwood, Hoffman, West, & Sheets, 2002). With a path analysis approach, the indirect effect is normally calculated by multiplying the two values on the indirect path together. However, for a 1-1-1 multilevel mediated model in which all three variables are at the first level, both of the values for the indirect effect (a and b) can vary across level-1 units (Preacher & Selig, 2010). Consequently, a and b may co-vary. This means that the estimation for the indirect mediated path is not just a x b but a x b + $\tau_{a,b}$, which is the level-2 covariance between the two random effects (Preacher & Selig, 2010). Since bootstrapping cannot be applied to multilevel models, confidence intervals for the indirect mediated paths were calculated using a Monte Carlo approach to resampling (Bauer et al., 2006; Preacher & Selig, 2010).

Finally, to test the cross-level mediated moderation (Hypotheses 3a and 3b), I added a Level-2 predictor ease of movement (EM) and product terms of EM and anger and EM and anxiety to my two models. If either of the product terms was significant, then simple slope analysis was conducted at the mean for EM and one standard deviation above and below the mean (Cohen, Cohen, West, & Aiken, 2013)

With all models, level-1 predictor variables were group mean centered to remove any between-person confounds (Enders & Tofighi, 2007; Hofmann & Gavin, 1998). The level-2 variable was grand mean centered to assist in the interpretation of results (Enders & Tofighi, 2007).

Results

Before addressing the results, it is first necessary to discuss power. Calculating power for multilevel models is complex. Multiple factors must be considered, and the level of precision is not the same as power estimates for multiple regression (Mathieu, Aguinis, Culpepper, & Chen, 2012; Snijders & Bosker). However, multi-level power estimates do provide a rough approximation of the size of the sample necessary to have sufficient power to detect effects.

Using Power in Two Levels or PINT (Bosker, Snijders, & Guldemond, 2003), I calculated the suggested sample size for a multi-level model with three level-1 variables and one level-2 variable. While power estimates with multiple regression include an effect size estimate (Cohen, 1992; Cohen et al., 2013), I did not have to provide an effect size estimate for my power calculations with the PINT program. To have power (β) of 0.80, I estimated that I would need 450 level-1 observations. Since this sample has 553 level-1 observations, I should have sufficient power to detect the effects that I hypothesized.

Descriptive Statistics. The correlations and descriptive statistics for all variables can be found in Table 1. Every correlation between two Level-1 variables was significant. However, there were no significant correlations between ease of movement and any of the Level One

variables. The correlations among the Level-1 variables was encouraging because the results were consistent with prior research that found evidence of significant relationships among the same variables (Boswell et al., 2004; J. A. LePine et al., 2005; Rodell & Judge, 2009). As for the lack of significant correlations between ease of movement and the Level-1 variables, the finding could suggest the lack of a substantive relationship. However, there may be a potential power issue. In calculating the correlations for ease of movement, the Level-1 variables had to be aggregated to Level-2, which reduced my sample size from 553 to 130, the number of Level-2 participants. Since the significant correlation between ease of movement and the other variables. The effect of the reduced sample size can also be seen in the relationships among the Level-1 variables. Several of the significant correlations were insignificant after the Level-1 variables were aggregated.

Table 1

Descriptive Statistics and Correlations

		Mean	S.D.	1	2	3	4	5
1	Stressors	2.71	0.76	-				
2	Anger	1.46	0.62	0.23*	-			
3	Anxiety	1.39	0.59	0.11*	0.56*	-		
4	Counterproductive Work Behaviors	1.48	0.59	0.12*	0.49*	0.46*	-	
5	Ease of Movement	4.97	1.37	0.15	0.04	0.03	-0.04	-

Note. N at level 1 =553, N at level 2=130. Variables 1-4 are within individual (level-1) variables. Their means and standard deviations are based upon daily observations. Intercorrelations are based on within-individual scores. Ease of movement is a between individual variable. Its intercorrelation with variables 1-4 are based on between individual scores (e.g. The level-1 variables were aggregated).

*p < 0.05

Confirmatory Factor Analysis. I used confirmatory factor analysis to evaluate the dimensionality of the four within person variables (hindrance stressors, anger, anxiety and CWBs). To evaluate the measurement model for these four variables, I tested a one-factor solution, a three factor solution in which the measures for anger and anxiety were collapsed onto one factor and a four factor solution in which the measures for each of the aforementioned variables were loaded onto a separate factor. The results are in Table 2.

Each of the four variables are distinct constructs, and the measures for each construct would be expected to load onto separate factors. Therefore, the CFA with the best fit should be a four factor solution. The four factor model for the four within person variables had a significant chi-square (χ^2 =936.95; p<0.05, 344 degrees of freedom). The confirmatory fit index (CFI) was 0.72 while the root mean square error of approximation (RMSEA) was 0.07, and the standardized root mean square residual (SRMR) was 0.07. The fit indice for SRMR did meet the recommended cutoff value (SRMR <0.08), but the fit indices for CFI and RMSEA did not meet the recommended cutoff values (CFI > 0.95; RMSEA < 0.06)(Hu & Bentler, 1999).

While the positive chi square test and some of the fit indicators suggest the model could be improved, the model showed some evidence of good fit. The chi square statistic for the four factor model (χ^2 =936.95; p<0.05, 344 degrees of freedom) was smaller than the chi-square statistic for the three factor model (χ^2 =1002.75; p<0.05, 347 degrees of freedom) and the one factor model (χ^2 =936.95; p<0.05, 344 degrees of freedom). Additionally, the four factor model did meet the cutoff value for the SRMR fit indice (0.07; cutoff value <0.08) and was close to the cutoff value for the RMSEA fit indice (0.07; cutoff value <0.06).
Tal	ble	2

Confirmatory	Factor Analysis
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	χ2	df	RMSEA	90% CI	CFI	SRMR
1. One Factor Model	2027.94*	350	0.11	[0.10; 0.11]	0.23	0.13
2. Three Factor Model	1002.75*	347	0.07	[0.06; 0.07]	0.70	0.07
3. Hypothesized Four Factor Model	936.95*	344	0.07	[0.06; 0.07]	0.72	0.07

Note. N at level 1 =553, N at level 2=130. One factor solution represents one factor for all four within person variables (hindrance stressors, anger, anxiety, and counterproductive work behaviors (CWBs)). The three factor solution represents three factors for the four within person variables. For this solution, anger and anxiety are assigned to the same factor. For the hypothesized four factor model, each of the four within person variables was assigned a separate factor. For the 90% Confidence Intervals, it appears that the RMSEA statistic is not within the confidence interval. However, if each of the statistics and confidence intervals are confidence intervals are expanded to three decimal points, the statistics do fall within the corresponding confidence intervals. *p<0.05

Hierarchical Linear Modeling. Before testing my hypotheses, I first wanted to confirm that there was sufficient variance between individuals to use HLM (Snijders & Bosker). Therefore, I ran a null model with the criterion variable counterproductive work behaviors. Between person variance accounted for 69% of the total variance, which was within the range of acceptable variance (Snijders & Bosker). Therefore, it was appropriate to use HLM to analyze the data.

In Table 3, the results of the hypothesis testing using the hierarchical linear models can be found. Hypotheses 1a and 1a predicted that, at the within person level, hindrance stressors would be positively associated with both anger and anxiety. As can be seen in Table 3, hindrance stressors were positively associated with both anger ($\gamma = 0.11$) and anxiety ($\gamma = 0.04$). However, only the regression coefficient for anger was statistically significant (p = 0.01; p = 0.34). Therefore, Hypotheses 1a was supported, but Hypothesis 1b was not.

Hypothesis 2a predicted, at the within person level, that anger would mediate the relationship between hindrance stressors and counterproductive work behaviors while Hypothesis 2b predicted that anxiety would mediate the relationship between hindrance stressors and counterproductive work behaviors at the within person level. According to Table 3, the regression coefficient from hindrance stressors to anger (the a path) was $\gamma = 0.13$, and the regression coefficient from anger to counterproductive work behaviors (the b path) was $\gamma = 0.15$. Therefore, the regression coefficient for the indirect mediated path (the ab path) from hindrance stressors to anger to counterproductive work behaviors was $\gamma = 0.01$. A confidence interval for the regression coefficient was constructed [-0.03, 0.05]. Since the confidence interval included zero, the regression coefficient was not significant.

As for Hypothesis 2b, Table 3 shows that the regression coefficient from hindrance stressors to anxiety (the a path) was $\gamma = 0.04$, and the regression coefficient from anxiety to counterproductive work behaviors (the b path) was $\gamma = 0.00$.¹ Therefore, the regression coefficient for the indirect mediated path (the ab path) from hindrance stressors to anxiety to counterproductive work behaviors was $\gamma = -0.02$. A confidence interval for the regression coefficient was constructed [-0.04, 0.01] and included zero so the regression coefficient was not significant. Since the regression coefficients for both ab paths were not significant, Hypotheses 2a and 2b were not supported.

With Hypotheses 3a, I predicted a cross-level interaction effect in which ease of movement moderated the relationship between anger and counterproductive work behaviors such that high levels of ease of movement would weaken the relationship between anger and counterproductive work behaviors while low levels of ease of movement would strengthen the relationship between anger and counterproductive work behaviors. Similarly, Hypothesis 3b predicted a cross-level interaction effect in which ease of movement moderated the relationship between anxiety and counterproductive work behaviors such that high levels of ease of movement would weaken the relationship between anxiety and counterproductive work behaviors, and low levels of ease of movement would strengthen the relationship between anxiety and counterproductive work behaviors.

According to Table 3, neither product term (anger x ease of movement; anxiety x ease of movement) was significant (anger x ease of movement 0.00 p > 0.05; anxiety x ease of movement 0.04, p>0.05). Therefore, Hypothesis 3a and 3b were not supported.

¹ The coefficient is not actually zero. However, the coefficient is so small that when it is rounded to the hundredths place, it rounds to 0.

Table 3.

Effects of hindrance stressors on emotions and counterproductive work behaviors (CWBs), and the mediating effects of emotions and the moderating effect of ease of movement. (Hypotheses 1-3)

Predictors	Anger	T-value	Anxiety	T-value	CWBs	T-value
Main effects of hindrance stressors						
Intercept	1.45*	31.46	1.39*	30.43	1.37*	18.34
Hindrance Stressors	0.11*	2.54	0.04	0.94	-0.14	-1.60
Mediating Role of Anger						
Intercept					1.47*	31.64
Hindrance Stressors					0.13*	3.41
Anger					0.15*	3.70
Mediating Role of Anxiety						
Intercept					1.47*	31.67
Hindrance Stressors					0.04	-0.52
Anxiety					0.00	1.47
Interaction of Anger and Ease of Movement						
Intercept					1.47*	31.68
Hindrance Stressors					-0.03	-0.80
Anger					0.15*	3.85
Ease of Movement					-0.01	-0.37
Anger X Ease of Movement					0.00	0.03
Interaction of Anxiety and Ease of Movement	:					
Intercept					1.47*	31.72
Hindrance Stressors					-0.03	-0.59
Anxiety					0.10	1.48
Ease of Movement					-0.01	-0.34
Anxiety X Ease of Movement					0.04	0.77

Note. Estimates were obtained using 553 daily points provided by 130 individuals. All level-1 one predictor variables were group-mean centered to eliminate between individual variance. All regression coefficients are unstandardized. The regression coefficients with a zero are not actually zero. However, the coefficients are so small that the coefficients round to zero when rounding only to the hundredth's place. *p < 0.05

Discussion

With the transactional theory of stress framework, I used an experience sampling approach in a sample of working adults to investigate the potential influence of ease of movement on hindrance stressors, negative emotions and counterproductive work behaviors. The data, however, did not support my position that ease of movement moderated the relationships between negative emotions and counterproductive work behaviors. Furthermore, the underlying transactional theory of stress model was only partially supported by the data.

Implications

Although my hypotheses for high and low ease of movement were not supported by the data, these findings may not be inconsistent with the transactional theory of stress. For employees to engage in a secondary appraisal, they have to first perceive the stressor as relevant during the primary appraisal (Lazarus, 1991; Lazarus & Folkman, 1984). If employees do not perceive the stressor as relevant, employees will not engage in a secondary appraisal (Lazarus, 1991; Lazarus & Folkman, 1984).

The fact that ease of movement did not moderate the relationship between negative emotions and counterproductive work behaviors may be evidence that the stressors were not perceived as relevant. Employees with high ease of movement will have a high likelihood of obtaining other jobs. As a result, the stressors with their current jobs may not be perceived as significant impediments. If the stressors persist, these employees could always leave and pursue other job opportunities. Therefore, employees with a high likelihood of obtaining other jobs may not perceive the stressors as something that they need to respond to, which would make it unnecessary for employees with high ease of movement to engage in a secondary appraisal. Consequently, I may have not found support for my hypotheses because a significant amount of participants did not engage in a secondary appraisal of the stressors.

Limitations

One potential limitation with this study is the limited age range. Many of the participants are young and may be working in part time jobs that may not lead to full time employment. Since these jobs are likely temporary, these employees may not be as influenced by stressors in the same way as someone who intends to stay with an organization for the foreseeable future. Many of the participants in the study may not have perceived work stressors as threats because they do not plan to be with their organizations for the long term. If the stressors were not considered a threat, participants would have been unlikely to experience negative emotions and engage in counterproductive work behaviors to cope. Consequently, there may not have been a relationship between negative emotions and counterproductive work behaviors for ease of movement to moderate.

Future Research

I would like to further explore ease of movement within the transactional theory of stress model. While the hypotheses related to ease of movement were not significant, there were some significant relationships that provided support for the transactional theory of stress model. The non-significant results with the other hypotheses could be due to the lack of range in age of the participants that I mentioned above. Therefore, to fully evaluate this model, I think additional data needs to be collected from participants with a broader range of age and work experience. With a more diverse sample with regards to age and work experience, I could evaluate if ease of movement does have a place within the transactional theory of stress model. Additionally, I would like to explore ease of movement as a possible moderator of challenge stressors. In Paper One, there was a significant positive correlation between positive affect and ease of movement, but the relationship between ease of movement and negative affect was not significant. These findings could suggest that ease of movement may be more salient in situations in which employees experience positive emotions rather than negative emotions. While hindrance stressors are typically associated with negative emotions (Rodell & Judge, 2009), challenge stressors can be associated with positive emotions (Cavanaugh et al., 2000). Therefore, it may still be appropriate to include ease of movement within the transactional stress model. However, the model should include challenge stressors rather than hindrance stressors.

Conclusion

The purpose of this study was to investigate how ease of movement may influence employee emotions and behaviors outside the context of turnover. Ease of movement was perceived as a construct that could influence the relationship between negative emotions and counterproductive work behavior in the transactional theory of stress model. While my hypotheses related to ease of movement were not supported, additional research may be warranted given the limitations of the study.

Chapter Four

EXAMINING THE RELATIONSHIP BETWEEN TRUSTWORTHINESS AND TRUST

With the development of the integrative model of trust in the mid-1990s (R. C. Mayer, Davis, & Schoorman, 1995), there was increased focus on research related to trust. Two decades later, the benefits of trust at the individual level are well established. Trust has been shown to positively influence a variety of individual level outcomes including performance (Aryee, Budhwar, & Zhen Xiong, 2002) satisfaction (Edwards & Cable, 2009; Gulati & Sytych, 2007), citizenship behavior (R. C. Mayer & Gavin, 2005) negotiation outcomes (Lee, Yang, & Graham, 2006) and leadership effectiveness (Dirks & Ferrin, 2002). Given the many positive benefits associated with trust, supervisors should want their employees to trust them as much as possible. However, the steps supervisors must take to obtain higher level of trust may not be as straightforward as previously thought.

In the integrative trust model, trustworthiness, an antecedent of trust, consists of three components- ability, benevolence and integrity (R. C. Mayer et al., 1995). According to this model, once employees perceive that supervisors have exhibited behaviors consistent with ability, benevolence and integrity, then employees will trust their supervisors (Colquitt, Scott, & LePine, 2007; R. C. Mayer & Davis, 1999; R. C. Mayer et al., 1995). However, trust is not static, and can fluctuate (Korsgaard, Brower, & Lester, 2015; R. C. Mayer et al., 1995), which suggests that increases in ability, benevolence or integrity should lead to increases in trust.

This relationship between the components of trustworthiness and trust is theorized such that as trustworthiness increases so should trust (R. C. Mayer et al., 1995). In the case of ability, high levels of ability could be beneficial to subordinates. Supervisors with high levels of ability would be able to share their technical expertise, which could help subordinates improve their own competence and job performance. Furthermore, with good supervision, subordinates may become more integrated within the company and have more opportunities to succeed.

More of a good thing, however, is not always better (Pierce & Aguinis, 2013). With trustworthiness, I propose that high amounts of trustworthiness may not always be positively related to trust. While high levels of ability may benefit subordinates, this may not be the case with benevolence and integrity. At high levels of benevolence, subordinates may perceive that their supervisors have become too protective in trying to look out for them and are fostering a closer relationship than what subordinates desire. Supervisors may be perceived as smothering and may alienate their subordinates, which may lead subordinates to trust their supervisors less. As for integrity, at high levels, subordinates may perceive that supervisors are strongly emphasizing following the rules without considering, perhaps, principles of ethicality and justice in a larger context. Even slight transgressions are not permitted. This obsessive insistence on rule following may isolate subordinates from their supervisors, perhaps making them less likely to trust their supervisors.

Subordinates' perceptions of ability, benevolence and integrity vary from subordinate to subordinate and with the supervisor that subordinates are evaluating. Subordinates evaluate ability, benevolence and integrity on the effects that they have on their individual relationships with their supervisors. Subordinates may vary in how much of these components they need because subordinates vary in their own skills, abilities and preferences (Schultz, 1961) Therefore, there is an opportunity to compare what subordinates perceive in their supervisors with what they need.

This approach of jointly considering what was supplied relative to was needed has been used in other areas of research such as leadership (Lambert, Tepper, Carr, Holt, & Barelka, 2012). The value of using such an approach could be seen when employees received less or more than what they needed. When employees received less than what they needed (deficiency), the outcomes were negative because what was provided failed to meet the underlying need (Lambert et al., 2012). However, surprisingly, there were some negative outcomes when employees received more than what they needed (excess) (Lambert et al., 2012). The results suggest outcomes may not be always be maximized by providing more than what is needed, but instead supervisors should focus on calibrating their behavior to meet their employees' needs (Lambert et al., 2012).

To be able to evaluate the potential influence of deficient and excess ability, benevolence and integrity on trust, I need a framework that accounts for deficiencies and excesses so I turned to the Person-Environment (P-E) fit literature for guidance. The P-E fit paradigm evaluates the congruence between individuals' perceived needs and those supplies provided to address the individuals' needs along with their joint effect on attitudes and behaviors (Edwards, Caplan, & Harrison, 1998; Edwards & Shipp, 2007). Therefore, the P-E framework presents an opportunity to evaluate the amounts of trustworthiness supplied relative to what is needed or beneficial to subordinates.

While my primary focus is the potential joint influence of trustworthiness supplied and needed on trust, the credibility of the model will be stronger if I can demonstrate that the trust variable in my model relates to an outcome variable similar to what previous researchers have found. According to social exchange theory, trust is necessary for the development of an exchange relationship (Blau, 1964). Furthermore, once an exchange relationship has developed, employees are more likely to engage in organizational citizenship behaviors (OCBs) or behavior that is helpful to the supervisors or others within the organization (Dansereau, Graen, & Haga, 1975; Konovsky & Pugh, 1994). Therefore, if my model accurately captures the relationship between trustworthiness and trust, then trust should predict OCB as researchers have previously found (Konovsky & Pugh, 1994).

With this paper, I make a contribution to the trust literature by developing a fuller understanding of the trustworthiness-trust relationship by accounting for both the perceived amount of trustworthiness that supervisors supply and the amount of trustworthiness that employees need and how the joint effects may influence trust. Using a P-E fit framework, I will evaluate how deficiencies and excesses in each component of trustworthiness (ability, benevolence and integrity) can influence trust. Furthermore, I will also explore how the joint effects of trustworthiness supplied and needed may have an influence beyond trust.

Theory Development

Integrative Model of Trust

Before examining the relationship between the different components of trustworthiness and trust, I first need to define the constructs within the model. Within the integrative trust model, trust is the willingness of the trustor (subordinate) to be vulnerable to the actions of a trustee (supervisor) based on the expectation that the trustee (supervisor) will perform a similar action (Colquitt et al., 2007; R. C. Mayer et al., 1995; Schoorman, Mayer, & Davis, 2007). The antecedent of trust is trustworthiness, which consists of ability, benevolence and integrity. Ability encompasses the trustor's (subordinate's) perception of the trustee's (supervisor's) capabilities and skills required for success in a particular domain (Colquitt et al., 2007; Gabarro, 1978; R. C. Mayer et al., 1995; Zapata, Olsen, & Martins, 2013). Benevolence is the perceived extent to which a trustee (supervisor) is believed to want to do good for the trustor (subordinate) apart from any profit motive (Colquitt et al., 2007; R. C. Mayer et al., 1995). Finally, integrity involves the extent to which a trustee (supervisor) is believed to adhere to sound moral and ethical principles that are acceptable to the trustor (subordinate) (Colquitt et al., 2007; R. C. Mayer et al., 1995). All three aspects of trustworthiness are essential to the development of trust (R. C. Mayer et al., 1995). Having defined trust and the components of trustworthiness, I now seek to expand the model by incorporating P-E fit.

P-E Fit

P-E fit is "the congruence, match, similarity or correspondence between the person and the environment" (Edwards & Shipp, 2007). This congruence can be based upon psychological needs in which attitudes and behaviors are influenced by a comparison of environmental supplies related to psychological needs (Edwards & Rothbard, 1999; Kristof, 1996; Lambert et al., 2012). Environmental supplies are resources provided by the organization (Cable & Edwards, 2004). Some examples of supplies include money, social involvement and achievement. However, this list is not exhaustive (Cable & Edwards, 2004; Edwards & Rothbard, 1999; French, Caplan, & Van Harrison, 1982; Kristof, 1996). Anything offered by an organization could be a supply if it is a resource that meets an employee's need (Cable & Edwards, 2004). Psychological needs refers to needs acquired through learning and socialization (Cable & Edwards, 2004; French & Kahn, 1962; Harrison, 1978; Kristof, 1996; Maslow, 1954).

Applying P-E fit to the trust relationship

Having established the general framework for P-E fit, I now apply that framework to the integrative trust model. I take the position that trust is a function of the joint effects of the amount of trustworthiness supplied and the amount of trustworthiness needed. My

conceptualization of trustworthiness behavior using the P-E fit framework, although new, is consistent with prior research which suggests that subordinates can evaluate non-economic resources such as interpersonal treatment by supervisors for fit in a manner similar to how they evaluate economic resources such as pay (Korsgaard, Brodt, & Whitener, 2002; Lambert, Edwards, & Cable, 2003; Lambert et al., 2012; Pillai, Schriesheim, & Williams, 1999).

Initially, it may not be self-evident why the components of trustworthiness (ability, benevolence and integrity) should be characterized as supplies. However, after focusing on how trustworthiness relates to trust, the connection should become clearer. In looking for evidence of ability, benevolence and integrity, employees are ultimately determining if they are willing to be vulnerable towards their supervisors or trust them (R. C. Mayer et al., 1995). This willingness to be vulnerable towards the supervisor suggests a desire by subordinates to reveal more to their supervisors so that they can know them better. In other words, subordinates are trying to meet an underlying need for belonging, a well-established fundamental need (Baumeister & Leary, 1995). Since the components of trustworthiness are a resource that may be used to meet an underlying psychological need, they should be considered a supply. Therefore, it would be appropriate to apply the P-E fit paradigm and frame trustworthiness in terms of supplies and needs. In doing so, people can only respond to the level of fit/misfit that they are aware of (French et al., 1982) so this comparison between trustworthiness supplied and trustworthiness needed is framed as a subjective comparison.

Trustworthiness supplied will likely vary between subordinates. Trustworthiness supplied is based upon subordinates' perceptions regarding the amount of behavior that supervisors supplied that was consistent with ability, benevolence and integrity. Subordinates often have different supervisors so the subordinates' perceptions will be based upon the behavior of different individuals. Therefore, it is not unreasonable to think that the behavior of the supervisor will vary along with the perceptions of that behavior. As for subordinates with the same supervisor, supervisors may not behave the same towards both subordinates. Within the LMX literature, researchers have consistently found evidence that supervisors do not treat all of their subordinates the same (Graen & Uhl-Bien, 1995; Liden, Sparrowe, & Wayne, 1997; Matta, Scott, Koopman, & Conlon, 2015). If the supervisor exhibits different behavior towards different employees, then the perceptions of the subordinates will likely vary because subordinates are not observing the same thing. Finally, even if the supervisor's behavior is the same, individual perceptions of the same behavior can vary (Gerstner & Day, 1997; Sin et al., 2009). Therefore, trustworthiness supplied will likely vary between employees.

All three components of trustworthiness supplied (ability, benevolence and integrity) could be considered together, or each component of trustworthiness supplied could be considered separately. Prior researchers have found that trust correlates with each component of trustworthiness (ability, benevolence and integrity) (Colquitt et al., 2007), which suggests that all three components of trustworthiness independently influence trust. This conclusion is also consistent with how Mayer, Davis and Schoorman (1995) theorized the model. Therefore, in evaluating trustworthiness supplied, each component of trustworthiness supplied should be considered separately.

Like trustworthiness supplied, trustworthiness needed will likely vary between subordinates. Trustworthiness needed is an individual perception based upon what is beneficial to the subordinate. Subordinates are different so what is beneficial will likely not be the same for every subordinate (Porter, 1961). As for evaluating trustworthiness needed, I should use the same approach that I selected for trustworthiness supplied so that supplied and needed trustworthiness match. Furthermore, the rationale for evaluating each aspect of trustworthiness supplied separately would be equally true for trustworthiness needed so each aspect of trustworthiness needed will be evaluated separately.

Having identified my expanded model of trust that includes trustworthiness supplied and trustworthiness needed, I can now examine how supplies and needs of each component of trustworthiness (ability, benevolence and integrity) may jointly influence trust. In comparing supplies relative to needs, there are three possible outcomes-deficiency, excess and fit (Edwards & Shipp, 2007). In the following pages, I will use these ideas of deficiency, excess and fit to examine the expanded integrative trust model.

In discussing the trust relationship, there are two parties the trustor and the trustee. These terms can be confusing as they are not typically used within everyday language. Subordinates do not discuss trusting a trustee. They instead will address whether they trust their supervisors. Therefore, in examining deficiency, excess and fit, I will examine trust from the perspective of subordinates (trustor) trusting their supervisors (trustee).

I am using the terms subordinate-supervisor rather than trustor-trustee to try to make it easier to see the effects of my expanded model of trust. The use of the labels subordinates and supervisors does not imply that the model is only limited to trust from the perspective of a subordinate. To the contrary, I would assert that the expanded model would apply to any trust relationship between individuals.

Deficiency and Excess

Deficiency occurs when the supplies received by the subordinate are not sufficient to meet his or her psychological needs (Edwards et al., 1998; Locke, 1976). The needs for

competence, security, belonging and control are several psychological needs (Baumeister & Leary, 1995; Bolton, 1980; Cropanzano, Byrne, Bobocel, & Rupp, 2001; Schwartz, 1994; White, 1959) and resources supplied by the organization can be used to fulfill those psychological needs. When supplies are deficient, subordinates are unable to fully meet their needs, often resulting in negative attitudes and behaviors. (Edwards et al., 1998; Edwards & Shipp, 2007).

For ability, benevolence and integrity, deficiencies will likely lead to negative outcomes as subordinates are unable to meet their needs with the supplies provided. Although the outcome for all three components of trustworthiness will likely be the same, the underlying reasoning for each component is different. Therefore, I will address the deficiencies for ability, benevolence and integrity separately.

Excess occurs when subordinates receive more supplies relative to what they need (Edwards & Shipp, 2007). The influence of excess on attitudes varies based upon how the excess supply is perceived (Edwards & Rothbard, 1999; Edwards & Shipp, 2007). If the excess supply can be used to meet multiple needs, it creates a synergy, which positively influences attitudes (Edwards et al., 1998; Edwards & Shipp, 2007; Lambert et al., 2012; Locke, 1976). However, if the excess supply interferes with the abilities of subordinates to meet their needs, the excess supply will be perceived as antagonistic and will likely have a negative influence on attitudes (Edwards et al., 1998; Edwards & Shipp, 2007; Lambert et al., 2012; Locke, 1976). This synergistic/antagonistic distinction functions on a continuum and varies based upon the type of supplies (Edwards et al., 1998; Lambert et al., 2012).

Given that the effect of excess is contingent upon the type of supply, ability, benevolence and integrity will be addressed separately. **Deficiency-Ability.** Ability is " that group of skills, competencies, and characteristics that enable a party to have influence within a specific domain." (R. C. Mayer et al., 1995). This encompasses all aspects of a supervisor's job including all technical skills associated with the job, managing and inspiring subordinates and managing relationships with others within the organization (R. C. Mayer et al., 1995). In managing subordinates, some of the competencies and skills that supervisors may demonstrate include defining and organizing the roles of subordinates, establishing channels of communication, sharing appropriate information and making time for the subordinates (Butler, 1991; Fleishman, 1953; Zand, 1972). With a deficiency, subordinates do not perceive that the supervisors are exhibiting enough of the aforementioned behaviors relative to their needs.

Insufficient amounts of supervisor ability may cause confusion and uncertainty. Subordinates' roles could be poorly defined, and subordinates may have difficulty communicating with their supervisors. Furthermore, subordinates may perceive that their supervisors did not exhibit enough technical skill to assist them so that they could become more productive at their jobs, and the apparent lack of technical skills will likely not inspire subordinates to work harder. This confusion and uncertainty could interfere with subordinates' need for competence.

Competence is an employee's capacity to interact effectively with his or her work environment (White, 1959). When subordinates receive insufficient amounts of ability, they cannot interact effectively with their work environment. Poorly defined roles will leave subordinates with lots of questions as to what exactly they should be doing, and they may not be able to communicate with their supervisors to address those questions. Furthermore, when subordinates are able to communicate with their supervisors, those contacts may not be helpful because subordinates may not believe supervisors are demonstrating the technical skill necessary to help subordinates improve and become more productive. When supervisors supply less ability than is needed, they likely impede subordinates' capacities to interact effectively with their work environments, which may lead to low levels of trust.

As subordinates perceive that their supervisors are exhibiting more behavior consistent with ability, subordinates' roles will likely be better defined, and there will probably be more opportunities for subordinates to communicate with their supervisors. During these more frequent communications, subordinates may perceive that their supervisors are clarifying job roles more clearly and exhibiting more technical skill, which may help subordinates become more productive at their jobs. With less confusion and uncertainty, subordinates will likely find it easier to meet their need for competence and effectively interact with their work environments. Therefore, subordinates may be more willing to be vulnerable towards their supervisors, which could lead to increases in trust.

Excess-Ability. With excess ability, subordinates perceive that supervisors are acting in ways that demonstrate higher amounts of ability than what subordinates need. Since ability is associated with competence and perceived expertise (R. C. Mayer et al., 1995), excess ability would likely mean that supervisors have clearly defined subordinates' roles, and there are plenty of opportunities for subordinates to communicate with their supervisors. With well-defined roles and open communication, there should be little to no uncertainty. Supervisors are likely to be perceived as having designed jobs and created work environments that allow subordinates to complete their work responsibilities. Furthermore, subordinates will likely observe supervisors regularly demonstrating their technical skills in performing their jobs, which may help subordinates improve their own productivity. With opportunities to be more productive,

subordinates likely will be more effective in interacting with their environment, which should meet subordinates' need for competence and may lead to high levels of trust.

As the supplies of ability continue to increase beyond what subordinates need, subordinates will likely perceive that supervisors are providing more and more evidence that they can perform all aspects of their jobs well. Communication continues to improve, and roles are even more clearly defined as supervisors try to reduce as much uncertainty as possible. Furthermore, subordinates may perceive that supervisors are demonstrating more of their technical skill, which will probably increase the supervisor's productivity and potentially provide the opportunity for subordinates to become better at their jobs as well. Although these supplies are beyond what the subordinates need, these excess supplies should not be antagonistic, as they are unlikely to interfere with any of the subordinates' needs and may be appreciated as subordinates are likely to perceive the excess supplies as an attempt to help. In response, subordinates may be more willing to be vulnerable towards their supervisors, which could lead to increases in trust. However, at high levels of excess, subordinates may have more difficulty seeing how additional supplies of ability are helpful. Subordinates likely have little use for these excess supplies because their underlying need has already been met. Therefore, additional supplies of ability may not increase subordinates' trust in their supervisors as much as previous supplies did. However, trust is unlikely to decline because excess amounts of ability are unlikely to interfere with subordinates' efforts to meet other needs.

H1: When supplied ability is less than needed ability, trust will be low but will increase as the amount of supplied ability increases, and trust will continue to increase as supplied ability exceeds needed ability, but the increases will be smaller at high levels of excess.

Deficiency-Benevolence. Supervisors who exhibit benevolence are demonstrating the desire to do good for their subordinates aside from any egocentric profit motive (R. C. Mayer et al., 1995). A good example of benevolence can be seen in the role of the mentor in the mentor-protégé relationship. The mentor wants to help the protégé and does so even though the mentor is not required to help and does not receive extrinsic rewards (R. C. Mayer et al., 1995). Some examples of behavior consistent with benevolence may include providing advice about the job and relationships at work beyond what is required, and standing up for the subordinate when the subordinate is not available. Supervisors acting benevolently are trying to take care of their subordinates and act in their best interests.

When subordinates perceive that supervisors demonstrate less benevolence than needed, subordinates may see fewer examples of their supervisors doing good for them or protecting their welfare. In some instances, supervisors may have said nothing when subordinates expected them to speak up and defend them. In these instances, supervisors are creating uncertainty by not demonstrating benevolence that subordinates may expect, and this lack of benevolence may interfere with the subordinates' need for security.

The need for security is a basic human motive (Bolton, 1980; Schwartz, 1994). It reflects a belief that membership in a role is stable and likely to continue (Schwartz, 1994) and is relevant to relationships at work (Edwards & Rothbard, 1999; Kuhnert & Palmer, 1991). When subordinates receive less benevolence than they need, they may question whether their positions are stable. The few perceived examples of supervisors doing good for them could suggest that their positions may be in jeopardy because supervisors would likely look out for the interests of those subordinates that they expect to continue to work with. Therefore, with deficient benevolence, subordinates may have uncertainty about the future of their current positions making it potentially difficult for subordinates to fulfill their need for security, which may lead to low levels of trust in their supervisors.

As the supplies of benevolence increase and are closer to the amount of benevolence needed, subordinates' questions about whether their supervisors have their best interests at heart will likely decrease. There will likely be more examples in which subordinates perceive that supervisors are protecting their interests by providing advice or defending them to others. Given these additional examples of benevolence, subordinates are more likely to believe that their positions with their supervisors are stable and likely to continue. Therefore, subordinates may find it easier to meet their need for security, which could lead to an increase in trust.

Excess-Benevolence. Given that benevolence is associated with doing good for the subordinates (R. C. Mayer et al., 1995), subordinates who perceive that their supervisors are supplying more benevolence than needed might observe supervisors frequently checking in to see how the subordinates are doing. In small amounts, this excess benevolence could be appreciated. The excess benevolence may demonstrate to the subordinates that their supervisors really do care for them. To some extent, these additional contacts could help to meet an underlying need for security (Bolton, 1980; Schwartz, 1994) because these additional contacts help affirm subordinates' positons with their supervisors and could suggest that those positions are less likely to change. Therefore, subordinates may be more willing to be vulnerable towards their supervisors leading to higher levels of trust.

As supplies of benevolence continue to increase beyond what subordinates need, the actions of the supervisor may no longer be viewed positively. In attempting to watch out for the subordinates' best interests, supervisors' actions may be perceived as overprotective. Perhaps, supervisors are preventing subordinates from taking risks with their jobs that could pay off in the

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long run because there is some chance of harm in the short run. If subordinates perceive that their supervisors' behaviors are interfering with what they would like to do, subordinates may question whether their positions with their supervisors are stable and likely to continue. Consequently, subordinates may have a more difficult time meeting their need for security due to the excess benevolence, which may make the subordinates less willing to be vulnerable towards their supervisors leading to decreases in trust.

Hypothesis 2: When supplied benevolence is less than needed benevolence, trust will be low but will increase as the amount of supplied benevolence increases. Trust will increase as supplied benevolence exceeds needed benevolence, but will decrease at higher levels of excess.

Deficiency-Integrity. Integrity is the subordinate's perception that the supervisor adheres to a set of principles, and that set of principles is acceptable to the subordinate (R. C. Mayer et al., 1995). In observing supervisor behavior, subordinates are considering both the supervisor's values and the consistency with which the supervisor follows those values. Therefore, with a deficiency in integrity, subordinates perceive that supervisor behavior either does not represent acceptable values to the subordinate or that the supervisor is not consistently following those values.

Deficiencies in integrity may interfere with the subordinate's need for belonging. With the need for belonging, people seek meaningful attachment with others (Baumeister & Leary, 1995). In the workplace, fair procedures may help address a worker's underlying need for belonging (Cropanzano et al., 2001). Prior researchers have found that fair procedures can build stronger interpersonal bonds and trust (Cropanzano & Byrne, 2000; Konovsky & Pugh, 1994). As workers observe that the same processes are consistently applied, workers feel more connected with other employees in the organization, which helps to meet an underlying need for belonging (Cropanzano et al., 2001).

With deficient integrity, subordinates may feel like they have not been treated fairly because their supervisors are not adhering to the sets of principles that they have espoused as much as the subordinates need. For example, a supervisor may award spot bonuses to subordinates for their performances. The supervisor has established procedures for awarding these bonuses, but the supervisor is not consistent in following the procedures. With one subordinate, the supervisor may follow the procedures, but with another subordinate, the supervisor may completely ignore the procedures. The end result is that the awarding of spot bonuses appears to be arbitrary. Consequently, these subordinates may feel disconnected from others due to the actions of their supervisor and may be unable to address their underlying need for belonging. Since the behavior of the supervisor interfered with subordinates' efforts to meet their underlying need for belonging, subordinates will likely be unwilling to be vulnerable towards their supervisor, leading to low levels of trust.

As subordinates perceive that supervisors are more consistent in adhering to their values, the discrepancy between integrity supplied and integrity needed will decrease. Returning to our spot bonus example, the supervisor would likely be more consistent in following the procedures in awarding spot bonuses. There are fewer examples of the supervisor ignoring the procedures when awarding spot bonuses. Since the behavior of the supervisor is less likely to be perceived as arbitrary, subordinates are less likely to feel like they are isolated. With supervisors more consistently following established procedures, subordinates are more likely to feel connected to other employees within the organization including their supervisors, which may help subordinates meet their need for belonging. Consequently, subordinates may be more willing to be vulnerable to their supervisors resulting in higher levels of trust.

Excess-Integrity. Integrity is associated with supervisors adhering to a set of principles that are acceptable to the subordinate (R. C. Mayer et al., 1995). At small levels of excess, subordinates may perceive that supervisors are more concerned with adhering to a set a principles than is necessary. Although subordinates may believe supervisors are emphasizing adherence too much, this overemphasis on following procedures is unlikely to interfere with subordinates' need for belonging. The overemphasis on following procedures likely means that few or no deviations from the procedures are allowed. Since all subordinates would likely be treated the same, subordinates will probably feel connected with the other employees because they are all being treated equally, which may help subordinates meet their underlying need for belonging.

As the supplies of integrity continue to increase, the disparity between what is needed and what is supplied could become problematic because it could interfere with the subordinates' efforts to meet other needs such as the need for control. A need for control represents individuals' attempts to control their environment by predicting and managing important interactions including outcomes (Cropanzano et al., 2001). Within organizations, fair outcomes may help employees meet their underlying need for control (Cropanzano et al., 2001; D. M. Mayer, Bardes, & Piccolo, 2008).

With high levels of excess integrity, subordinates may not believe that the outcomes are fair. Returning to our spot bonus example, at high levels of excess integrity, a supervisor may have become increasingly stringent in following the procedures for spot bonuses. This emphasis on complying with the procedures is so great that the supervisor will not deviate from the procedures even when a subordinate's performance is so outstanding that it merits a spot bonus despite the fact that the subordinate may not qualify for the bonus based upon the established procedures. This failure to deviate, regardless of the circumstances, will likely lead to outcomes that subordinates do not believe are fair as common experience would likely lead subordinates to conclude that certain exceptions to the spot bonus procedure should be made. Due to the unfair outcome, subordinates may question whether they can control their environment, making it more difficult for subordinates to meet their underlying need for control. Given that the supervisor will likely be perceived as the one responsible for making it more difficult for subordinates to meet their underlying to be vulnerable towards their supervisors, leading to decreased levels of trust.

Hypothesis 3: When supplied integrity is less than needed integrity, trust will be low but will increase as the amount of supplied integrity increases. Trust will continue to increase as supplied integrity exceeds needed integrity, but at higher levels of excess, trust will begin to decrease.

Although the relationships among trustworthiness supplied, trustworthiness needed and trust are consistent with subordinates attempting to fulfill needs, an argument could be made that the aforementioned relationships are due to homophily. Homophily is the idea that people are more likely to associate with those that are similar to them as opposed to those who are different from them (Lazarsfeld & Merton, 1954; McPherson, Smith-Lovin, & Cook, 2001). This association can be based upon a variety of dimensions including similar values (Huston & Levinger, 1978).

Applying homophily to the integrative trust model, subordinates will observe their supervisors' behaviors and form perceptions about their supervisors' ability, benevolence and

integrity. Based upon these perceptions, subordinates can make inferences regarding their supervisors' values pertaining to ability, benevolence and integrity. To the extent supervisors' values are perceived as similar to those of the subordinates, then the subordinates will be more willing to be vulnerable towards their supervisors and trust their supervisors.

Under this reasoning, the relationship between trustworthiness and trust is based upon similarity. Therefore, the highest levels of trust should occur when the subordinate's values exactly match the subordinate's perceptions of their supervisor's values. If the perceived values of the supervisor are greater than or less than the subordinate's values, then trust should be less because the perceived values of the supervisor and the values of the subordinate are not as similar. As the similarity in values continues to decrease, trust should decrease as well.

The previous hypothesized relationships for benevolence and integrity are somewhat consistent with a homophily argument. As either deficiency or excess increases, there is a corresponding decrease in trust similar to what one would expect to see with homophily. However, on the excess side, the decreases may not begin as soon as supply exceeds need. With both benevolence and integrity, trust may be maximized at a point in which supply exceeds need even though the excess supply suggests that the value of the subordinate and the perceived value of the supervisor are not the same.

The hypothesized relationship for ability also undercuts the homophily argument. As excess ability or lack of similarity increases, trust also increases. If homophily was the underlying reasoning explaining the relationship between ability and trust, then trust should decrease and not increase because the similarities between the subordinate and the supervisor are decreasing. For all three aspects of trustworthiness, trust is not hypothesized to be maximized at the point where needs and supplies are equal. This suggests that the relationships among trustworthiness supplied, trustworthiness supplied and trust are not consistent with homophily.

Fit

Fit occurs when there is match between supplies and needs (Edwards & Shipp, 2007). Fit generally produces more positive outcomes than deficiency (Edwards & Rothbard, 1999; Kristof-Brown, Zimmerman, & Johnson, 2005). However, the outcomes are not the same across absolute levels of fit. In some instances, higher levels of fit will lead to higher outcomes (Edwards & Shipp, 2007). Since the type of supply may influence whether the outcome increases for higher levels of fit (Edwards & Rothbard, 1999; Edwards & Shipp, 2007), each component of trustworthiness should be examined separately.

Fit-Ability. At low levels of fit for ability, subordinates only need minimal levels of skills and competencies. Perhaps, these subordinates and supervisors do not have a highly interdependent relationship, and the subordinates do not need a lot of communication with their supervisors, clarification regarding their roles or instruction on how to perform their jobs. When subordinates perceive that supervisors exhibit the amount of behavior consistent with the ability that they need, the benefits of congruence may be minimal because the need was low. Consequently, subordinates only have a small willingness to be vulnerable towards the supervisors, which will lead to low levels of trust.

For high levels of fit for ability, the subordinates' needs are much greater. There may be lots of interdependence between the subordinate's job and the supervisor's job Therefore, subordinates may need lots of clarification on their roles and plenty of opportunities to communicate with their supervisors. Additionally, subordinates may need to see lots of examples of their supervisors' technical expertise to assist them with their productivity. When subordinates perceive that their supervisors supplied lots of behavior consistent with ability, subordinates will likely be very appreciate. Furthermore, these subordinates will likely have a greater appreciation for the supplies that they received relative to the subordinates with low needs for ability because their need was much greater. Consequently, at higher levels of fit, subordinates are probably more willing to be vulnerable towards their supervisors, which will likely lead to higher amounts of trust compared with low levels of fit.

Hypotheses 4a: When supplied ability equals needed ability and increases from low to high, trust will increase.

Fit-Benevolence. Similar to ability, there will likely be a positive relationship between the level of fit for benevolence and trust. At low levels of fit, subordinates do not have a strong need for supervisors to show care or watch out for their best interests. When this supply is met, there will likely be little appreciation because subordinates may perceive that their supervisors have done little to protect their interests or look out for them. Consequently, subordinates will probably not have a strong willingness to be vulnerable towards the supervisors, which may lead to low levels of trust.

At high levels of fit for benevolence, subordinates need a lot of care and reassurance that their interests are being protected. Perhaps, these subordinates work for organizations with lots of office politics or high turnover. In meeting these needs for benevolence, subordinates will likely believe that their supervisors are diligent in caring for them and are vigilant in making sure their interests are protected. Subordinates will likely be very appreciative and may recognize that their supervisors really have their best interests at heart. This appreciation is likely greater than those subordinates with a low need for benevolence because these subordinates had greater needs that were met by their supervisors. In response, subordinates with a high level of need for benevolence may be more willing to be vulnerable towards their supervisors. Therefore, at higher levels of fit for benevolence, there will likely be higher levels of trust.

Hypotheses 4b: When supplied benevolence equals needed benevolence and increases from low to high, trust will increase.

Fit-Integrity. As with the other two supplies, there will likely be a positive relationship between the level of fit for integrity and trust. At low levels of fit for integrity, there is not a strong need for supervisors to follow an acceptable set of principles and adhere to those principles. Perhaps, these subordinates only want to see some consistency in enforcing the rules. When subordinates perceive that supervisors have met this need by exhibiting some behavior consistent with integrity, the subordinates will likely have some appreciation since a need was met. However, given that the need was low, the willingness to be vulnerable towards the subordinate will probably be low. Subordinates will likely perceive that their supervisors did little to meet a need, leading to low levels of trust.

At higher levels of fit for integrity, there is a much greater need for following a set of principles and adhering to those principles. Subordinates may need to see lots of examples of consistency because other supervisors have been known to play favorites, and these subordinates may question whether their supervisors will do the same thing. When this higher need for integrity is met, then subordinates are likely to be very appreciative. Their appreciation is likely greater than that of subordinates with lower needs for integrity because supervisors are likely perceived as doing more to meet a greater need. Since the perceived supplies met a greater need, subordinates with high levels of need for integrity are probably more willing to be vulnerable towards their supervisors, which will likely lead to higher levels of trust.

Hypotheses 4c: When supplied integrity equals needed integrity and increases from low to high, trust will increase.

Trustworthiness, Trust and Organizational Citizenship Behaviors

Having examined the relationship between trustworthiness and trust, I now look to expand my model by considering trust as a potential mediator. Within the integrative trust model, subordinates trust their supervisors in response to observing behavior consistent with ability, benevolence and integrity (R. C. Mayer et al., 1995). Furthermore, the presence of trust suggests that social exchanges could then occur between subordinates and their supervisors (Blau, 1964; Konovsky & Pugh, 1994). If social exchanges do occur, then subordinates are more likely to engage in OCBs or extra role behaviors that directly benefit the supervisors or other individuals within the organization and indirectly help the organization (Dansereau et al., 1975; Konovsky & Pugh, 1994; Williams & Anderson, 1991).

Prior empirical research provides support for the proposed relationships among trustworthiness supplied and needed, trust and OCB. In prior empirical studies, trust in the supervisor has often been identified as an antecedent of OCB (Aryee, Budhwar, & Zhen Xiong, 2002; Dirks & Ferrin, 2002; Konovsky & Pugh, 1994; Lambert et al., 2012). Furthermore, according to prior research, subordinates often perform OCBs when their needs are met (Aryee et al., 2002; Dirks & Ferrin, 2002; Ilies, Nahrgang, & Morgeson, 2007). Given the prior findings, trust should mediate the relationship between trustworthiness supplied and needed and OCB.

While I anticipate that trust will mediate the relationship between each component of trustworthiness and OCB, the relationships will likely only be partially mediated. Trust is one of many variables that influences OCB (Aryee et al., 2002; Podsakoff, MacKenzie, Paine, &

Bachrach, 2000). Given the number of variables associated with OCB, no one variable, including trust, is likely to completely mediate any relationship with OCB.

Hypotheses 5a: The relationship between ability supplied and needed and organizational citizenship behavior will be partially mediated by trust.

Hypotheses 5b: The relationship between benevolence supplied and needed and organizational citizenship behavior will be partially mediated by trust.

Hypotheses 5c: The relationship between integrity supplied and needed and organizational citizenship behavior will be partially mediated by trust.

Methods

Sample

For this study, I collected data from two samples. The first sample was composed of employees of an education company based in the Southeastern United States with other locations throughout the U.S. With the second sample, participants were members of research panels managed by partners of Qualtrics. All participants on the panels were full time employees working in the United States who currently had supervisors.

With the first sample, all 280 employees within the company were sent an initial e-mail describing the study and encouraging them to participate. All employees were then subsequently sent an e-mail with an electronic link to the first survey. Reminder e-mails about the study were also sent out to encourage participation. For those employees that completed the first survey, an e-mail with a link to the second survey was sent five days after the first survey was completed. Reminder e-mails for the second survey were also sent out. Fifty-six employees provided completed data from both surveys.

The supervisors of the 56 employees who completed both surveys were sent an e-mail asking them for their assistance with the study. The supervisors were then sent an e-mail with a link to a survey to gather information about their subordinates' organizational citizenship behaviors (OCB). In response to these e-mails, I received 41 completed responses from supervisors.

For the second sample, a random sample of 922 panel participants completed the first survey. Those who completed the first survey were sent a second survey five days later. In total, 359 participants completed both surveys and provided a referral for their supervisors. The supervisors of those participants who provided a referral were given a link to complete a survey regarding their subordinates' organizational citizenship behaviors. 161 supervisors provided completed surveys. For participating in the study, subordinates received \$10 for completing each survey while supervisors received \$20 for completing one survey.

Between the two samples, 201 subordinates completed both surveys and had their supervisors complete a survey. A majority of the subordinates who completed both surveys were female (69%), and the average age of a subordinate in this study was 38 years old. The racial composition of the subordinates was Caucasian (75%), African Americans (12%), Hispanic (6%), Asian (5%), Multi-racial (2%) and Other (1%). On average, a subordinate had been at his or her current job for 59 months and with his or her organization for 70 months.

Fifty-five percent of the supervisors who completed the surveys were female, and the average age of a supervisor who completed the survey was 45 years old. The racial composition of the supervisors was Caucasian (75%), African Americans (13%), Hispanic (5%), Asian (4%), Multi-racial (2%), Native American (1%) and Other (1%). On average, supervisors had been at

their current jobs for 90 months and with their organizations for 111 months. Finally, supervisors had supervised their subordinates for an average of 31 months.

Most supervisors only completed a survey for one subordinate. However, some supervisors completed surveys for more than one subordinate. Therefore, approximately 19% of the data is nested.

Measures

Trustworthiness Needed. This was assessed based upon measures that I developed from the Mayer and Davis (1999) trustworthiness scale. The items were revised to capture behavior exhibited by the respondent's direct supervisor that are indicative of trustworthiness. Items that did not capture behavior were removed. Sample items are "Strongly considers my needs and desires" and "Always deals fairly with others". I measured trustworthiness needed by asking the respondents to report for each trustworthiness item how much of that specific behavior from their direct supervisor "would be right for you". A 7-point response scale was used with anchors of 1=none and 7=a great amount.

Trustworthiness Supplied. Using the same trustworthiness items that were developed for Trustworthiness Needed and the same 7-point scale, respondents were asked to report how much of each behavior their direct supervisor had demonstrated towards them.

Trust. This was assessed based upon measures developed from the Mayer and Davis (1999) trust scale. The three items were measured on a 7-point response scale with anchors of 1=strongly disagree and 7=strongly agree. The three items are "My direct supervisor is trustworthy.", "My direct supervisor has demonstrated that he or she is worthy of my trust." and "My direct supervisor deserves my trust.".

Organizational Citizenship Behaviors (OCBs). This was assessed with 8 items drawn from the scale developed by Williams and Anderson (1991). The eight items were measured on a 7-point response scale with anchors of 1=Never and 7=Always. Some of the sample items are "Helps others who have been absent." and "Helps others who have heavy workloads.".

Analysis

Before evaluating the data, I first needed to compare the two samples to see if they were similar. Otherwise, the samples could not be combined. To look for evidence of similarity, I first created a dummy moderator variable W. Samples drawn from the education company were assigned a 0, and samples drawn from the Qualtrics panel were assigned a 1. Hierarchical regression was then used (Cohen, Cohen, West, & Aiken, 2013) to test the moderating effects of W on the relationship between each aspect (ability, benevolence, and integrity) of trustworthiness and trust.

In testing for moderation, I used the following baseline equation:

(1)
$$Y = b_0 + b_1AS + b_2AN + b_3AS^2 + b_4AS^*AN + b_5AN^2 + e_3AN^2 + b_4AS^*AN + b_5AN^2 + e_5AN^2 + b_5AN^2 +$$

in which Y is the dependent variable trust, and AS and AN represent ability supplied and ability needed. Following the principles of moderated regression (Aiken, West, & Reno, 1991), I then added the moderator W to the above equation along with the product of W and each term in the first equation, which resulted in the following equation:

(2)
$$Y = b_0 + b_1AS + b_2AN + b_3AS^2 + b_4AS^*AN + b_5AN^2 + b_6W + b_7WAS + b_8WAN + b_9WAS^2 + b_{10}W^*AS^*AN + b_{11}WAN^2 + e.$$

To test for moderation, the incremental increase in \mathbb{R}^2 between the first equation and the second equation was tested (Edwards, 2002; Edwards & Rothbard, 1999). This analysis was conducted for all three aspects of trustworthiness (ability, benevolence and integrity).

Once I finished comparing the similarity of the two samples, I then evaluated my measures by conducting a confirmatory factor analysis (CFA). Within the CFA, I included measures for trustworthiness needed, trustworthiness supplied and trust. I tested a one-factor model, a two-factor model and three three-factor models. With the three-factor models, the measures for the individual aspects of trustworthiness needed and trustworthiness supplied were loaded onto separate factors, and trust was loaded onto a third factor. Therefore, I had three different three-factor models (ability needed, ability supplied and trust; benevolence needed, benevolence supplied and trust; integrity needed, integrity supplied and trust). I attempted to test a seven factor model in which each aspect of trustworthiness needed and trustworthiness supplied loaded onto a separate factor. However, one of the matrixes was not positive definite, which was likely due to high correlations between ability needed and integrity needed and between ability supplied and integrity supplied and trust were and between ability supplied and integrity supplied. Therefore, I could not evaluate the seven factor model.

The purpose of conducting a CFA was to demonstrate that measures for trustworthiness supplied and trustworthiness needed were distinct. While a seven factor model could address this issue, the three three-factor models can serve the same purpose. With each of the three-factor models, the measures for one aspect of trustworthiness needed and trustworthiness supplied were loaded onto different factors, which allowed me to evaluate whether the measures for trustworthiness needed and trustworthiness supplied were distinct.

In conducting the CFAs, I did correlate some of the residuals. While residuals in a measurement model should normally not be correlated, correlating residuals can be appropriate when it is supported by research design (Cole, Ciesla, & Steiger, 2007).

With this study, many of the trustworthiness needed and trustworthiness supplied measurement items are very similar. For example, the first measure for ability needed is "performs his or her job as a supervisor very capably", and the first measure for ability supplied is "performs his or her job as a supervisor very capably". However, with ability needed, participants are instructed to "indicate how much of that specific behavior from your supervisor would be right for you" while with ability supplied participants are instructed to "indicate how much of that specific behavior your supervisor has demonstrated towards you." Given the similarity in the measures, it is not unreasonable to believe that both measures may capture the same unexplained variance not related to trustworthiness needed or supplied. Therefore, the design of the measures justifies correlating the residuals of trustworthiness needed and trustworthiness supplied.

After completing the CFAs, I then evaluated the relationships between trustworthiness, trust and organizational citizenship behaviors. To test Hypotheses 1-4, I used the polynomial regression and response surface methodology developed by Edwards (2002) by estimating the following base equation:

(1) $Y = b_0 + b_1AS + b_2AN + b_3AS^2 + b_4AS^*AN + b_5AN^2 + e.$

The two squared terms were included in the equation to capture curvilinear effects, and the product of ability supplied and ability needed was used to estimate any moderating effects (Edwards, 2002). In addition to this equation with ability supplied and ability needed, I estimated two other polynomial regression equations for the other two aspects of trustworthiness supplied and needed, benevolence and integrity. In those two equations, trust was the dependent variable. With all three equations, I used the estimated coefficients to plot the three dimensional relationships.
With the first three hypotheses (H1, H2 and H3), I focused on the misfit line because deficiencies and excesses correspond to points on the surface of the misfit line (Edwards, 2002). For the base equation with ability supplied and needed, the misfit line is equal to AS = -AN. The misfit lines for benevolence and integrity are BS = -BN and IS = -IN respectively. Using the estimated coefficients from Equation 1, I calculated the slope (b₁- b₂) and curvature (b₃-b₄+b₅) for the misfit lines (Edwards, 2002).

The fourth set of hypotheses (H4) concerned the fit line. For the base equation with ability supplied and needed, the fit line is equal to AS=AN and can range from absolute low levels of fit to absolute high levels of fit (Edwards, 2002). The corresponding fit lines for benevolence and integrity are BS=BN and IS=IN. The fit lines can be described by their slope and curvature. I calculated the slope (b_{1+} b_2) and curvature ($b_3+b_4+b_5$) using the estimated regression coefficients from Equation 1. Using SYSTAT 11, I followed the recommendations of Edwards (2002) and tested the standard errors for the slope and curvature along the fit and misfit lines for ability, benevolence and integrity.

For the fifth set of hypotheses (H5), I tested my mediated predictions by using the general principles of path analysis and creating block variables to estimate the direct and indirect effects (through trust in the supervisor) of each aspect of trustworthiness needed and supplied on OCB (Cable & Edwards, 2004; Edwards & Lambert, 2007; Heise, 1972).

To estimate the path from ability needed and supplied to trust (the a path in the mediation model), I first created a block variable by multiplying the estimated polynomial regression coefficients from Equation 1 with the data from ability needed and supplied to create a weighted linear composite, which had the same amount of explained variance as the five quadratic terms from Equation 1. After creating the block variable, I then regressed trust on the block variable.

The standardized estimated regression coefficient for the block variable was the path estimate of the relationship between ability supplied and needed and trust.

I then used the following equation to estimate the direct effects of ability supplied and needed and trust on OCB.

(3)
$$Y = b_0 + b_1 Trust + b_2 AS + b_3 AN + b_4 AS^2 + b_5 AS^* AN + b_5 AN^2 + e_5 AS^* AN + b_5 AN^2 + e_5 AN^2 + e_5$$

In the above equation, Y represents OCB. To estimate the quadratic effects of ability supplied and needed, I created another block variable and re-estimated the equation regressing OCB on trust and the new block variable. The standardized estimated regression coefficient for trust represents the path estimate from trust (the mediator) to OCB (the b path in the mediation model), and the estimated standardized regression coefficient for the block variable represents the direct effect of ability supplied and needed on OCB (the c path in the mediation model). The indirect effect of ability supplied and needed on OCB (the ab path in the mediation model) was calculated by multiplying the estimated standardized regression coefficients for the paths from ability supplied and needed to trust and from trust to OCB.

The data for the indirect effect was unlikely to be normally distributed (Springer, 1979) Therefore, to test the estimated standardized regression coefficient for significance, bias corrected confidence intervals were derived from 10,000 bootstrap samples (Efron & Tibshirani, 1994; MacKinnon, Lockwood, Hoffman, West, & Sheets, 2002). The same aforementioned procedures were used to test trust as a partial mediator of the relationship between benevolence supplied and needed and OCB as well as the relationship between integrity supplied and needed and OCB.

Results

Comparison of Samples. The results from the hierarchical regression can be seen in Tables 1 and 2. For ability needed and supplied, the moderator and the interaction terms were not significant. Additionally, the change in R-square ($\Delta R^2 = 0.01$; p=0.54) was not significant. As for benevolence needed and supplied, the moderator and the interactions were also not significant, and the change in R-square ($\Delta R^2 = 0.01$; p=0.78) was not significant. Finally, for integrity needed and supplied, the moderator and the interactions were not significant, and the change in R-square ($\Delta R^2 = 0.01$; p=0.78) was not significant, and the change in R-square ($\Delta R^2 = 0.01$; p=0.78) was not significant.

Collectively, these non-significant findings suggest that the samples are similar. If the samples were not similar, the variance in the two samples due to their differences would have likely produced at least one significant interaction term and a significant change in R-square. The lack of these findings suggest the samples are similar and support the decision to combine the two samples and analyze them together.

Regression Coefficients with Dummy Variable (W) from Hierarchical Regression comparing the Two Samples.

Variable	b_1X	$b_2 Y$	$b_3 X^2$	$b_4X * Y$	b_5Y^2	b_6W	b ₇ WX	b_8WY	b_9WX^2	$b_{10}WXY$	$b_{11}Y^2$
Effects of Ability Needed and Supplied	0.80	0.55	-0.10	0.09	-0.17	0.14	-0.06	-0.35	0.01	0.05	0.05
Effects of Benevolence Needed and Supplied	0.97	-0.07	-0.10	-0.10	0.08	0.02	-0.27	0.15	0.00	0.17	-0.13
Effects of Integrity Needed and Supplied	0.85	0.32	-0.15	0.15	-0.13	0.05	-0.01	-0.20	0.08	-0.10	0.06

Note. Table entries are unstandardized regression coefficients. X = supplied, Y = needed and W = dummy variable moderator. The regression coefficient listed as zero is not actually zero. However, the regression coefficient is so small that when the coefficients are only rounded to two decimal points, the regression coefficient rounds to zero.

N = 201; *p < 0.05

Change in R-square from Hierarchical Regression comparing the Two Samples

Variable	Model One R ²	Model Two R ²	ΔR^2	Significance
Ability Needed and Supplied	0.79	0.80	0.01	0.54
Benevolence Needed and Supplied	0.55	0.56	0.01	0.78
Integrity Needed and Supplied	0.67	0.68	0.01	0.78

Note. For Model One, the following general equation was used $Y = b_0 + b_1X + b_2Y + b_3X^2 + b_4X^*Y + b_5Y^2 + e$ in which X =supplied and Y =needed. For Model Two the following general equation was used $Y = b_0 + b_1X + b_2Y + b_3X^2 + b_4X^*Y + b_5Y^2 + b_6W + b_7WX + b_8WY + b_9WX^2 + b_{10}W^*X^*Y + b_{11}WY2 + e$ in which X=supplied, Y=needed and W=dummy moderator variable.

N=201.

Confirmatory Factor Analysis. I used confirmatory factor analysis to evaluate the dimensionality of trustworthiness needed and trustworthiness supplied. I tested a one-factor solution, a two-factor solution and three three-factor solutions. The results can be found in Tables 3, 4 and 5.

As I theorized above, trustworthiness needed and supplied should load onto separate factors, making the three-factor solutions a good fit for the data. The three factor model of ability needed, ability supplied and trust had a significant chi-square (χ^2 =87.13; p<0.05, 37 degrees of freedom). The confirmatory fit index (CFI) was 0.97 while the root mean square error of approximation (RMSEA) was 0.08, and the standardized root mean square residual (SRMR) was 0.04. The fit indexes for SRMR and CFI did meet the recommended cutoff values (SRMR <0.08; CFI>0.95), but the fit index for RMSEA did not meet the recommended cutoff value (RMSEA < 0.06)(Hu & Bentler, 1999).

The three factor model of benevolence needed, benevolence supplied and trust also had a significant chi-square ($\chi 2$ =56.58; p<0.05, 37 degrees of freedom). The CFI was 0.99 while the RMSEA was 0.05, and the SRMR was 0.03. Therefore, all three fit indexes met the recommended cutoff values (SRMR <0.08; CFI>0.95; RMSEA < 0.06)(Hu & Bentler, 1999). As for the three factor model of integrity needed, integrity supplied and trust, the chi-square was significant ($\chi 2$ =53.05; p<0.05, 37 degrees of freedom). The CFI for this model was 0.99. The RMSEA was 0.05, and the SRMR was 0.03. Therefore, all three of the fit indexes for this model met the recommended cutoff values (SRMR <0.08; CFI>0.95; RMSEA < 0.06)(Hu & Bentler, 1999).

The significant chi-square tests and one of the fit indexes for the model with ability needed, ability supplied and trust suggest that the three-factor measurement models could be

improved. However, according to Table 5, the factor loadings for all of the items but one was greater than 0.74, which indicates that the factors explain a majority of the variance (Kline, 2015). Collectively, the fit indexes and the factor loadings are good evidence that the data fits the three three-factor measurement models well.

Confirmatory Factor Analysis

Models	χ2	df	RMSEA	90% CI	CFI	SRMR
1. One Factor Model	1949.64*	312	0.16	[0.15, 0.17]	0.68	0.12
2. Two Factor Model (Trustworthiness and Trust)	1671.42*	311	0.15	[0.14, 0.16]	0.73	0.11
3. Three Factor Model (Ability Needed, Ability Supplied and Trust)	87.13*	37	0.08	[0.06, 0.11]	0.97	0.04
4. Three Factor Model (Benevolence Needed, Benevolence Supplied and Trust)	56.58*	37	0.05	[0.02, 0.08]	0.99	0.03
5. Three Factor Model (Integrity Needed, Integrity Supplied and Trust)	53.05*	37	0.05	[0.01, 0.07]	0.99	0.03

*p<0.05; N = 201

Factor Loadings for Confirmatory Factor Analysis

Measurement Items	One Factor	Two Factor
Ability Needed		
1. Performs his or her job as a supervisor very capably	0.63	0.65
2. Knows a great deal about the work that a supervisor must do.	0.61	0.66
3. Demonstrates specialized supervisor capabilities that can increase our performance.	0.60	0.64
4. Achieves great success in his or her job as a supervisor.	0.67	0.69
Benevolence Needed		
1. Shows excessive concern for my welfare.	0.50	0.54
2. Strongly considers my needs and desires.	0.64	0.68
3. Really looks out for what is important to me.	0.65	0.70
4. Makes extra effort to help me.	0.60	0.64
Integrity Needed		
1. Always sticks to his or her word.	0.64	0.68
2. Always deals fairly with others.	0.60	0.64
3. Guided by sound principles.	0.56	0.60
4. Very consistent in his or her actions.	0.57	0.61
Ability Supplied		
1. Performs his or her job as a supervisor very capably	0.78	0.76
2. Knows a great deal about the work that a supervisor must do.	0.81	0.79
3. Demonstrates specialized supervisor capabilities that can increase our performance.	0.79	0.78
4. Achieves great success in his or her job as a supervisor.	0.80	0.79
Benevolence Supplied		
1. Shows excessive concern for my welfare.	0.69	0.69
2. Strongly considers my needs and desires.	0.82	0.82
3. Really looks out for what is important to me.	0.80	0.80
4. Makes extra effort to help me.	0.81	0.80
Integrity Supplied		
1. Always sticks to his or her word.	0.80	0.78
2. Always deals fairly with others.	0.84	0.82
3. Guided by sound principles.	0.78	0.77
4. Very consistent in his or her actions.	0.84	0.83
Trust		
1. My direct supervisor is trustworthy.	0.84	0.96
2. My direct supervisor has demonstrated that he or she is worthy of my trust.	0.83	0.95
3. My direct supervisor deserves my trust.	0.83	0.92

N = 201. Note. The columns one factor and two factor represent the first two measurement models that were tested using confirmatory factor

analysis. For the one factor model, all 27 items were loaded onto one factor. With the two factor model, the 24 trustworthiness items were loaded onto one factor, and the 3 trust items were loaded onto a second factor.

Measurement Items	а	b	с
Ability Needed			
1. Performs his or her job as a supervisor very capably	0.80		
2. Knows a great deal about the work that a supervisor must do.	0.79		
3. Demonstrates specialized supervisor capabilities that can increase our performance.	0.82		
4. Achieves great success in his or her job as a supervisor.	0.83		
Benevolence Needed			
1. Shows excessive concern for my welfare.		0.67	
2. Strongly considers my needs and desires.		0.92	
3. Really looks out for what is important to me.		0.92	
4. Makes extra effort to help me.		0.82	
Integrity Needed			
1. Always sticks to his or her word.			0.84
2. Always deals fairly with others.			0.75
3. Guided by sound principles.			0.75
4. Very consistent in his or her actions.			0.85
Ability Supplied			
1. Performs his or her job as a supervisor very capably	0.80		
2. Knows a great deal about the work that a supervisor must do.	0.80		
3. Demonstrates specialized supervisor capabilities that can increase our performance.	0.82		
4. Achieves great success in his or her job as a supervisor.	0.83		
Benevolence Supplied			
1. Shows excessive concern for my welfare.		0.79	
2. Strongly considers my needs and desires.		0.92	
3. Really looks out for what is important to me.		0.87	
4. Makes extra effort to help me.		0.85	
Integrity Supplied			
1. Always sticks to his or her word.			0.83
2. Always deals fairly with others.			0.84
3. Guided by sound principles.			0.79
4. Very consistent in his or her actions.			0.86
Trust			
1. My direct supervisor is trustworthy.	0.96	0.96	0.96
2. My direct supervisor has demonstrated that he or she is worthy of my trust.	0.95	0.95	0.95
3. My direct supervisor deserves my trust.	0.92	0.92	0.92

N = 201. *Note.* The columns a, b and c represent the three three-factor measurement models that were tested using confirmatory factor analysis. For column a, the four measurement items for ability needed were loaded onto one factor. The four measurement items for ability supplied were loaded onto a second factor, and the three measurement items for trust were loaded onto a third factor. For column b, the four measurement items for benevolence needed were loaded onto one factor. The four measurement items for benevolence supplied were loaded onto a second factor, and the three measurement items for trust were loaded onto a third factor. For column b, the four measurement factor, and the three measurement items for trust were loaded onto a third factor. For column c, the four measurement items for integrity needed were loaded onto one factor. The four measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor, and the three measurement items for integrity supplied were loaded onto a second factor.

Descriptive Statistics. The correlations and the Cronbach's alphas for all of the variables can be found in Table 6. Most of the variables were positively correlated and significant. However, the correlation between benevolence needed and OCB as well as the correlation between integrity needed and OCB were not significant. Additionally, all of the Cronbach's alphas were greater than 0.86, which suggests that the items for each variable are reliable (Cortina, 1993).

For each aspect (ability, benevolence and integrity) of trustworthiness needed and trustworthiness supplied, I inspected a scatterplot to verify that the data was adequately distributed on either side of the fit line (Edwards, 2002). Additionally, to make interpretation of the lower order terms easier, I centered ability needed and supplied, benevolence needed and supplied, and integrity needed and supplied at the midpoint of their scales. Descriptive Statistics and Correlations

	Mean	S.D.	1	2	3	4	5	6	7	8
1. Ability Needed	5.79	1.15	(0.88)							
2. Benevolence Needed	5.38	1.33	0.74*	(0.90)						
3. Integrity Needed	5.88	1.17	0.84*	0.72*	(0.87)					
4. Ability Supplied	5.70	1.18	0.61*	0.52*	0.54*	(0.88)				
5. Benevolence Supplied	5.31	1.35	0.51*	0.59*	0.49*	0.78*	(0.91)			
6. Integrity Supplied	5.61	1.24	0.57*	0.53*	0.56*	0.89*	0.83*	(0.89)		
7. Trust	5.96	1.25	0.51*	0.43*	0.44*	0.78*	0.72*	0.80*	(0.96)	
8. OCBs	5.56	1.28	0.17*	0.10	0.14	0.19*	0.24*	0.18*	0.18*	(0.92)

*p<0.05; *N*=201.

Polynomial Regression Results. Table 7 shows the estimated regression coefficients for regressing trust on each of the three components of trustworthiness needed and supplied. Additionally, the slope and curvature along the fit and misfit line for each aspect of trustworthiness needed and supplied can be seen. The corresponding surface plots for ability supplied and needed, benevolence supplied and needed and integrity supplied and needed can be found in Figures 1, 2 and 3 respectively.

According to Table 7, the positive slope of the misfit line for the equation with ability supplied and needed was significant (p < 0.05), and the curvature for the misfit line was also significant (p < 0.05). This information suggests that the misfit line has a positive slope with a downward curvature as seen in Figure 1. This is not entirely consistent with H1 in which I hypothesized that the shape of the misfit line would be an upward sloping line in which the amount of trust would increase as the deficiency between ability supplied and ability needed decreased and would continue to increase as ability supplied exceeded ability needed but would level off at high levels of excess. The significant slope is consistent with the hypothesized shape of the misfit line, but the significant curvature is not so H1 was partially supported.

For the equation with benevolence supplied and needed, the positive slope and curvature for the misfit line are significant (p<0.05). These results from Table 7 are not entirely consistent with H2. According to this hypothesis, I expected the misfit line to be a symmetrical inverted ushape. With this predicted shape, the level of trust would likely increase as the deficiency between benevolence supplied and benevolence needed decreased. However, as benevolence supplied continued to increase and exceeded benevolence needed, trust would likely begin to decrease and continue to decrease as the excess benevolence increased. The significant negative curvature supports the hypothesis. As can be seen in Figure 2, the misfit line is curved downward on both the deficiency and excess sides.

The positive slope, however, does not support the hypothesis. If the misfit line was a symmetrical inverted u-shape, the slope should be non-significant. The positive slope on one side of the inverted u-shaped line would be counterbalanced by the negative slope on the other side of the inverted u-shaped line. Given that the significant positive slope is not consistent with the second hypothesis, H2 was only partially supported.

With the equation for integrity, the findings in Table 7 indicate that the slope and curvature for the misfit line were significant (p<0.05). Similar to benevolence supplied and needed, I hypothesized (H3) a similar symmetrical u-shaped misfit line for integrity supplied and needed. The significant negative curvature is consistent with the hypothesized shape of the misfit line, but the significant positive slope is not. Therefore, H3 was partially supported.

As for the fit hypotheses, the results from Table 7 indicate that the slope for all three equations along the fit line was positive and significant. These findings are consistent with H4a, H4b and H4c, in which I hypothesized that trust would increase as the level of fit increased. Furthermore, the shape of the fit lines with positive slopes for ability supplied and needed, benevolence supplied and needed, and integrity supplied and needed can be seen in Figures 1, 2 and 3. Hence, H4a, H4b and H4c were fully supported.

Regressing Trust on Ability, Benevolence and Integrity Needed and Supplied

	Estimated regression parameters						Misfit Line		Fit Line	
							Slope	Curvature	Slope	Curvature
Variable	b_1X	$b_2 Y$	$b_3 X^2$	$b_4X * Y$	b_5Y^2	\mathbb{R}^2	(b ₁ - b ₂)	$(b_3 - b_4 + b_5)$	(b ₁ +b ₂)	(b ₃ +b ₄ +b ₅)
Effects of Ability Needed and Supplied	0.83*	0.23*	-0.10*	0.10	-0.11*	0.64*	0.60*	-0.31*	1.06*	-0.11*
Effects of Benevolence Needed and Supplied	0.76*	0.06	-0.09*	0.04	-0.04	0.55*	0.70*	-0.17*	0.82*	-0.09*
Effects of Integrity Needed and Supplied	0.89*	0.12	-0.10*	0.07	-0.07	0.67*	0.77*	-0.24*	1.01*	-0.10*

Note. Table entries are unstandardized regression coefficients. X = supplied and Y = needed.

*p < 0.05



Figure 1. Estimated response surfaces relating fit between ability needed and supplied on subordinates' trust in their supervisors. The blue dots on the floor of the graph represent the data points. Misfit line = line on the floor of the graph that runs from the far left side of the graph to the far right side. Fit line = line on the floor of the graph that runs from the near corner of the graph to the far corner.



Figure 2. Estimated response surfaces relating fit between benevolence needed and supplied on subordinates' trust in their supervisors. The blue dots on the floor of the graph represent the data points. Misfit line = line on the floor of the graph that runs from the far left side of the graph to the far right side. Fit line = line on the floor of the graph that runs from the near corner of the graph to the far corner.



Figure 3. Estimated response surfaces relating fit between integrity needed and supplied on subordinates' trust in their supervisors. The blue dots on the floor of the graph represent the data points. Misfit line = line on the floor of the graph that runs from the far left side of the graph to the far right side. Fit line = line on the floor of the graph that runs from the near corner of the graph to the far corner.

The results of the mediation analysis can be seen in Table 8. The column labeled "Trustworthiness to Trust" indicates that the standardized regression coefficient for the path from ability needed and supplied to trust was significant (a = 0.80, p < 0.05) as were the standardized regression coefficients for the paths from benevolence needed and supplied to trust (a = 0.74, p < 0.05) and integrity needed and supplied to trust (a = 0.82, p < 0.05). The column labeled "Trust to OCB" shows that the standardized regression coefficient for the path from trust to OCB was significant for ability needed and supplied (b = 0.15, p< 0.05) and integrity needed and supplied (b = 0.15, p< 0.05) and integrity needed and supplied (b = 0.15, p< 0.05) and integrity needed and supplied (b = 0.16, p< 0.05). The third column in Table 8 indicates that the standardized regression coefficients for direct paths from ability needed and supplied to OCB (c = 0.23, p < 0.05), benevolence needed and supplied to OCB (c = 0.26, p < 0.05), and integrity needed and supplied to OCB (c = 0.22, p < 0.05) were all significant.

According to Table 8, the indirect effects of ability needed and supplied on OCB (ab = 0.12, p > 0.05), benevolence needed and supplied on OCB (ab=0.04, p>0.05) and integrity needed and supplied on OCB (ab = 0.15, p > 0.05) were non-significant. Therefore, trust did not mediate the relationships between any of the aspects of trustworthiness and OCB. Given these results, H5a, H5b and H5c were not supported.

Path Estimates for Tests of Relations between Trustworthiness and OCB Mediated by Trust

	Trustworthiness to Trust	Trust to OCB	Direct effect of trustworthiness	Indirect effect of trustworthiness	95%
Variable	(a path)	(b path)	to OCB (c path)	to OCB (ab)	Confidence Interval
Ability Needed and Supplied	0.80*	0.15*	0.23*	0.12	[-0.08, 0.29]
Benevolence Needed and Supplied	0.74*	0.06	0.26*	0.04	[-0.17, 0.37]
Integrity Needed and Supplied	0.82*	0.18*	0.22*	0.15	[-0.19, 0.25]

Note. Tabled values are standardized coefficients.

* p < 0.05

General Discussion

With this study, I applied the P-E fit paradigm to the trust literature in attempt to develop a more nuanced approach to the relationship between trustworthiness and trust. I asserted that the relationship between trustworthiness and trust depended upon the subordinates' perceptions of the supplies of ability, benevolence and integrity and the subordinates' needs for ability, benevolence and integrity. The fit lines with significant positive slopes provided support for my argument that higher levels of absolute fit lead to higher levels of trust. Additionally, the significant curvature along the misfit lines mostly supported my predicted relationships. However, the significant curvature along the ability misfit line was unexpected. Furthermore, while the misfit lines for benevolence and integrity did curve downwards as predicted, the misfit lines were not symmetrical. Unlike my hypotheses about the fit and misfit lines, my predictions regarding trust mediating the relationship between trustworthiness needed and supplied and OCBs were not supported.

Theoretical Implications

With the significant findings for the fit line, this study does make a contribution to the trust literature. The amount of trustworthiness does matter. In absolute terms, subordinates who needed and received higher levels of ability, benevolence and integrity trusted their supervisors more. With prior research, the main focus of the integrative trust model was on whether supervisors (trustees) had demonstrated behavior consistent with ability, benevolence and integrity. If supervisors demonstrated ability, benevolence and integrity, subordinates would trust their supervisors. (Colquitt et al., 2007; R. C. Mayer et al., 1995). The relationship between the amount of trustworthiness supplied and needed relative to trust was not addressed. The results

from this study suggests that the amount of ability, benevolence and integrity that subordinates need influences the level of trust in their supervisors and should be accounted for.

Subordinates with higher needs for ability, benevolence and integrity will have higher levels of trust when supplies meet those needs as the larger amounts of ability, benevolence and integrity provide the opportunity to meet more significant needs. Therefore, although these subordinates need more ability, benevolence and integrity to trust their supervisors, when they receive it, they may exhibit higher levels of trust compared to those who need less. These findings are also consistent with other areas of fit research in which it has been found that higher levels of absolute fit lead to higher levels in the dependent variable (Edwards & Rothbard, 1999; Lambert et al., 2012; Matta, Scott, Koopman, & Conlon, 2015).

The significant findings along the misfit line suggest there are consequences from supplying too little or too much ability, benevolence or integrity. While the integrative trust model indirectly addresses deficiencies of ability, benevolence and integrity with the assumption that a threshold amount of ability, benevolence and integrity is needed for employees to trust other workers (R. C. Mayer et al., 1995), prior research had not addressed what occurs when employees receive more ability, benevolence and integrity than they need. With regards to deficiencies, the findings from this study affirms that deficient amounts of ability, benevolence and integrity will lead to lower level of trusts. Furthermore, the findings suggest deficiency is worse than excess. With all three supplies, the level of trust was lower for deficiency than for excess. While the overall levels of trust were higher for excess than deficiency, the findings from the study suggest excess may have a negative impact on trust.

The findings related to excess provide new insight as to what could occur when supervisors provide more ability, benevolence and integrity than they need. Prior research would imply that trust will increase as supervisors provide more ability, benevolence and integrity (Colquitt et al., 2007; R. C. Mayer et al., 1995; Schoorman et al., 2007). However, the findings with this study suggest that the relationship between trustworthiness and trust is more nuanced and that trust can decrease if supervisors supply more ability, benevolence or integrity than subordinates need. Furthermore, the results from this study are consistent with research in other areas which has found that too much of a good thing can be a problem (Pierce & Aguinis, 2013). Given the potential negative associations between trust and both deficiency and excess, supervisors may have to focus more on calibrating their relationships with their subordinates. Supervisors will need to know their subordinates better so that they can more closely match supplies with subordinates' needs.

Practical Implications

The significant findings along the fit line for ability, benevolence and integrity suggest the value of meeting the needs for ability, benevolence and integrity for all subordinates including those with higher needs. Supervisors may view subordinates with higher needs for ability, benevolence and integrity as difficult because more effort may be required to get these subordinates to trust them relative to those subordinates whose needs for ability, benevolence and integrity are lower. Therefore, supervisors may be more inclined to ignore those subordinates with higher needs. However, in meeting those higher needs with corresponding supplies of ability, benevolence and integrity, supervisors may be able to develop high levels trust. Given that trust is positively correlated with many attitudes and behaviors that organizations desire (Colquitt & Rodell, 2011; Dirks & Ferrin, 2002), it is likely in the best interests of supervisors to know all of their subordinates so supervisors can calibrate their supplies of ability, benevolence and integrity to closely match their subordinates' needs. The significant findings along the misfit line suggest the dangers in supervisors not calibrating their supplies of ability, benevolence and integrity well. While too little is worse than too much, both deficiency and excess may lead to diminished levels of trust.

Limitations

One potential limitation is the distribution of the data. In looking at the scatterplot of the data for ability, benevolence and integrity in Figures 1, 2 and 3, there was data distributed on both sides of the fit line. However, I did not have a lot of points in which a subordinate experienced extreme deficiency or extreme excess. Therefore, the curvature at the excess end of the misfit line may have been more pronounced than the data suggests. Even with this concern, the data was still dispersed broadly enough to capture the significant curvature on the misfit line.

Second, the fit for the three three-factor measurement models could have been better. For all three models, the chi-square was significant, and with the ability three-factor model, the RMSEA did not meet the cutoff value. However, in the evaluating measurement models, it is important to consider all of the information. Collectively, the fit indexes and the factor loadings provide good evidence that all three of the three-factor models fit the data well and have good validity.

Future Research

Based upon the findings of this study, I see two avenues for further research. First, I would like to further explore the impact of excess beyond trust. This study suggests that excess ability, benevolence and integrity may lead to lower levels of trust. But, we do not know how this excess may impact more distal variables. Therefore, as the next step, I would like to explore the influence of excess ability, benevolence and integrity beyond trust by examining how it may

influence other attitudes and behaviors such as job performance, job satisfaction and organizational commitment.

Second, I would like to further explore the relationship between trustworthiness and trust along the fit line. In this study, curvature along fit line was significant for all three aspects of trustworthiness, which was unexpected. This finding may suggest that the rate at which trust increases is less at high levels fit. The curvature along the fit line could represent a boundary condition for the relationship between trustworthiness and trust, which should be explored further so we can have a more complete understanding regarding the relationship between trustworthiness and trust.

Conclusion

This research demonstrates the value of applying the P-E fit framework to the trustworthiness-trust relationship within the integrative trust model. The findings suggest the value of supervisors calibrating supplies of trustworthiness so that they correspond to subordinates' needs for trustworthiness as deficient and excess amounts can influence the level of trust a subordinate has in his or her supervisor. Having identified the relevance of deficient and excess trustworthiness, hopefully, this study will be the first step in developing a more nuanced understanding of the relationship between trustworthiness and trust within the integrative trust model.

REFERENCES

- Aiken, L. S., West, S. G., & Reno, R. R. (1991). *Multiple regression: Testing and interpreting interactions*: Sage.
- Allen, N. J., & Meyer, J. P. (1990). The measurement and antecedents of affective, continuance and normative commitment to the organization. *Journal of Occupational Psychology*, 63(1), 1-18.
- Allen, D. G., Weeks, K. P., & Moffitt, K. R. (2005). Turnover intentions and voluntary turnover: the moderating roles of self-monitoring, locus of control, proactive personality, and risk aversion. *Journal of Applied Psychology*, 90(5), 980.
- Arnold, H. J., & Feldman, D. C. (1982). A Multivariate Analysis of the Determinants of Job Turnover. *Journal of Applied Psychology*, 67(3), 350-360.
- Aryee, S., Budhwar, P. S., & Zhen Xiong, C. (2002). Trust as a mediator of the relationship between organizational justice and work outcomes: test of a social exchange model. *Journal of Organizational Behavior*, 23(3), 267-285. doi:10.1002/job.138
- Barrick, M. R., & Mount, M. K. (1991). The Big Five Personality Dimensions and Job Performance: A Meta-Analysis. *Personnel Psychology*, 44(1), 1-26.
- Barrick, M. R., Mount, M. K., & Judge, T. A. (2001). Personality and performance at the beginning of the new millennium: What do we know and where do we go next?*International Journal of Selection and assessment*, 9(1-2), 9-30.
- Bauer, D. J., Preacher, K. J., & Gil, K. M. (2006). Conceptualizing and testing random indirect effects and moderated mediation in multilevel models: new procedures and recommendations. *Psychological Methods*, 11(2), 142.

- Baumeister, R. F., & Leary, M. R. (1995). The need to belong: desire for interpersonal attachments as a fundamental human motivation. *Psychological Bulletin*, *117*(3), 497.
- Bentler, P. M. (1983). Some contributions to efficient statistics in structural models: Specification and estimation of moment structures. *Psychometrika*, *48*(4), 493-517.
- Bentler, P. M. (1990). Comparative fit indexes in structural models. *Psychological Bulletin*, *107*(2), 238.
- Bentler, P. M., & Bonett, D. G. (1980). Significance tests and goodness of fit in the analysis of covariance structures. *Psychological Bulletin*, 88(3), 588.
- Bennett, R. J., & Robinson, S. L. (2000). Development of a measure of workplace deviance. Journal of Applied Psychology, 85(3), 349.
- Blau, P. M. (1964). Exchange and power in social life. . New York: Wiley.
- Bonett, D. G., & Wright, T. A. (2000). Sample size requirements for estimating Pearson, Kendall and Spearman correlations. *Psychometrika*, 65(1), 23-28.
- Bolton, B. (1980). Second-order dimensions of the Work Values Inventory (WVI). *Journal of Vocational Behavior*, *17*(1), 33-40.
- Bosker, R., Snijders, T., & Guldemond, H. (2003). PINT: Power IN Two-level designs. User1s Manual. Groningen.
- Boswell, W. R., Olson-Buchanan, J. B., & LePine, M. A. (2004). Relations between stress and work outcomes: The role of felt challenge, job control, and psychological strain. *Journal of Vocational Behavior*, *64*(1), 165-181.
- Butler, J. K. (1991). Toward understanding and measuring conditions of trust: Evolution of a conditions of trust inventory. *Journal of Management*, *17*(3), 643-663.

- Cable, D. M., & Edwards, J. R. (2004). Complementary and Supplementary Fit: A Theoretical and Empirical Integration. *Journal of Applied Psychology*, 89(5), 822-834.
 doi:10.1037/0021-9010.89.5.822
- Cappelli, P. (2000). A Market-Driven Approach to Retaining Talent. *Harvard Business Review*, 78(1), 103-111.
- Cavanaugh, M. A., Boswell, W. R., Roehling, M. V., & Boudreau, J. W. (2000). An empirical examination of self-reported work stress among US managers. *Journal of Applied Psychology*, 85(1), 65.
- Chen, P. Y., & Spector, P. E. (1992). Relationships of work stressors with aggression, withdrawal, theft and substance use: An exploratory study. *Journal of Occupational and Organizational Psychology*, 65(3), 177-184.
- Cohen, J. (1992). A power primer. *Psychological Bulletin*, 112(1), 155.
- Cohen, J., Cohen, P., West, S. G., & Aiken, L. S. (2013). *Applied multiple regression/correlation analysis for the behavioral sciences*: Routledge.
- Cole, D. A., Ciesla, J. A., & Steiger, J. H. (2007). The insidious effects of failing to include design-driven correlated residuals in latent-variable covariance structure analysis.
 Psychological Methods, 12(4), 381-398. doi:10.1037/1082-989X.12.4.381
- Colquitt, J. A., & Rodell, J. B. (2011). Justice, Trust, And Trustworthiness: A Longitudinal
 Analysis Integrating Three Theoretical Perspectives. *Academy of Management Journal*, 54(6), 1183-1206. doi:10.5465/amj.2007.0572
- Colquitt, J. A., Scott, B. A., & LePine, J. A. (2007). Trust, Trustworthiness, and Trust
 Propensity: A Meta-Analytic Test of Their Unique Relationships With Risk Taking and
 Job Performance. *Journal of Applied Psychology*, 92(4), 909-927.

- Cooper, C. L., Dewe, P. J., & O'Driscoll, M. P. (2001). Organizational stress: A review and critique of theory, research, and applications: Sage.
- Cortina, J. M. (1993). What is coefficient alpha? An examination of theory and applications. *Journal of Applied Psychology*, 78(1), 98.
- Costa, P. T., & McCrae, R. R. (1992). Four ways five factors are basic. *Personality and Individual Differences*, *13*(6), 653-665. doi:<u>http://dx.doi.org/10.1016/0191-</u> 8869(92)90236-I
- Cronbach, L. J., & Meehl, P. E. (1955). Construct validity in psychological tests. *Psychological Bulletin*, 52(4), 281.
- Cropanzano, R., & Byrne, Z. S. (2000). Workplace justice and the dilemma of organizational citizenship *Cooperation in modern society: Promoting the welfare of communities, states and organizations*. (pp. 142-161). New York, NY, US: Routledge.
- Cropanzano, R., Byrne, Z. S., Bobocel, D. R., & Rupp, D. E. (2001). Moral Virtues, Fairness Heuristics, Social Entities, and Other Denizens of Organizational Justice. *Journal of Vocational Behavior*, 58(2), 164-209. doi:https://doi.org/10.1006/jvbe.2001.1791
- Dansereau, F., Graen, G., & Haga, W. J. (1975). A vertical dyad linkage approach to leadership within formal organizations: A longitudinal investigation of the role making process. *Organizational behavior and human performance*, 13(1), 46-78.
- Dirks, K. T., & Ferrin, D. L. (2002). Trust in Leadership: Meta-Analytic Findings and Implications for Research and Practice. *Journal of Applied Psychology*, 87(4), 611-628.
- Edwards, J. R. (2002). Alternatives to difference scores: Polynomial regression and response surface methodology. *Advances in measurement and data analysis*, 350-400.

- Edwards, J. R., & Cable, D. M. (2009). The Value of Value Congruence. *Journal of Applied Psychology*, 94(3), 654-677.
- Edwards, J. R., Caplan, R. D., & Harrison, R. V. (1998). Person-environment fit theory:
 Conceptual foundations, empirical evidence, and directions for future research. . In C. L.
 Cooper (Ed.), *Theories of organizational stress* (pp. 28-67). Oxford: Oxford University
 Press
- Edwards, J. R., & Lambert, L. S. (2007). Methods for integrating moderation and mediation: a general analytical framework using moderated path analysis. *Psychological Methods*, *12*(1), 1.
- Edwards, J. R., & Rothbard, N. P. (1999). Work and family stress and well-being: An examination of person-environment fit in the work and family domains. *Organizational Behavior and Human Decision Processes*, 77(2), 85-129.
- Edwards, J. R., & Shipp, A. I. (2007). The Relationship Between Person-Environment fit and Outcomes: An Integrative. *Perspectives on organizational fit, 209*.
- Efron, B., & Tibshirani, R. J. (1994). An introduction to the bootstrap: CRC press.
- Enders, C. K., & Tofighi, D. (2007). Centering predictor variables in cross-sectional multilevel models: a new look at an old issue. *Psychological Methods*, *12*(2), 121.
- Farrell, D., & Rusbult, C. E. (1981). Exchange variables as predictors of job satisfaction, job commitment, and turnover: The impact of rewards, costs, alternatives, and investments. *Organizational behavior and human performance*, 28(1), 78-95.

doi:http://dx.doi.org/10.1016/0030-5073(81)90016-7

Fleishman, E. A. (1953). The description of supervisory behavior. *Journal of Applied Psychology*, *37*(1), 1.

- Folkman, S., & Lazarus, R. S. (1985). If it changes it must be a process: study of emotion and coping during three stages of a college examination. *Journal of Personality and Social Psychology*, 48(1), 150.
- Folkman, S., & Moskowitz, J. T. (2004). Coping: Pitfalls and promise. *Annu. Rev. Psychol.*, 55, 745-774.
- Fox, S., Spector, P. E., & Miles, D. (2001). Counterproductive work behavior (CWB) in response to job stressors and organizational justice: Some mediator and moderator tests for autonomy and emotions. *Journal of Vocational Behavior*, 59(3), 291-309.
- French, J. R., Caplan, R. D., & Van Harrison, R. (1982). The mechanisms of job stress and strain (Vol. 7): Chichester [Sussex]; New York: J. Wiley.
- French, J. R., & Kahn, R. L. (1962). A Programmatic Approach to Studying the Industrial Environment and Mental Health1. *Journal of social issues*, *18*(3), 1-47.
- Frijda, N. H., Manstead, A. S., & Bem, S. (2000). Emotions and beliefs: How feelings influence thoughts: Cambridge University Press.
- Gabarro, J. J. (1978). The development of trust, influence and expectations. In A. G. Athos & J.
 J. Gabarro (Eds.), *Interpersonal behaviors: Communication and understanding in relationships* (pp. 290-303). Englewoods Cliff, NJ: Prentice Hall.
- Gerhart, B. (1990). Voluntary Turnover and Alternative Job Opportunities. *Journal of Applied Psychology*, 75(5), 467-476.
- Glaser, B. G., & Strauss, A. L. (2009). *The discovery of grounded theory: Strategies for qualitative research*: Transaction publishers.

- Griffeth, R. W., & Hom, P. W. (1988). A comparison of different conceptualizations of perceived alternatives in turnover research. *Journal of Organizational Behavior*, 9(2), 103-111.
- Griffeth, R. W., Hom, P. W., & Gaertner, S. (2000). A meta-analysis of antecedents and correlates of employee turnover: Update, moderator tests, and research implications for the next millennium. *Journal of Management*, 26(3), 463-488.
- Griffeth, R. W., Steel, R. P., Allen, D. G., & Bryan, N. (2005). The development of a multidimensional measure of job market cognitions: The employment opportunity index (EOI). *Journal of Applied Psychology*, 90(2), 335-349.
- Hall, A. (2013, 03/11/2013). 'I'm Outta Here!' Why 2 Million Americans Quit Every Month (And 5 Steps to Turn the Epidemic Around). *Forbes*.
- Harrison, R. v. (1978). Person-environment fit and job stress. Stress at work, 175, 205.
- Heise, D. R. (1972). Employing nominal variables, induced variables, and block variables in path analyses. *Sociological methods & research*, *1*(2), 147-173.
- Henderson, W. D., & Bierman, L. (2009). Empirical analysis of lateral lawyer trends from 2000
 to 2007: The emerging equilibrium for corporate law firms *Georgetown Journal of Legal Ethics*, 22, 1395-1430.
- Hinkin, T. R. (1998). A Brief Tutorial on the Development of Measures for Use in Survey
 Questionnaires. *Organizational Research Methods*, 1(1), 104-121.
 doi:10.1177/109442819800100106
- Hinkin, T. R., Tracey, J. B., & Enz, C. A. (1997). Scale construction: Developing reliable and valid measurement instruments. *Journal of Hospitality & Tourism Research*, 21(1), 100-120.

- Hofmann, D. A., & Gavin, M. B. (1998). Centering decisions in hierarchical linear models:Implications for research in organizations. *Journal of Management*, 24(5), 623-641.
- Hom, P. W., Caranikas-Walker, F., Prussia, G. E., & Griffeth, R. W. (1992). A Meta-Analytical Structural Equations Analysis of a Model of Employee Turnover. *Journal of Applied Psychology*, 77(6), 890-909.
- Hox, J. J., & De Leeuw, E. D. (2002). The influence of interviewers' attitude and behaviour on household survey nonresponse: an international comparison *Survey Nonresponse* (pp. 103 null): Wiley.
- Hu, L. t., & Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis:
 Conventional criteria versus new alternatives. *Structural equation modeling: a multidisciplinary journal*, 6(1), 1-55.

Huang, F. (2017). Conducting Multilevel Confirmatory Factor Analysis Using R.

- Huston, T. L., & Levinger, G. (1978). Interpersonal attraction and relationships. *Annual Review* of Psychology, 29(1), 115-156
- Ilies, R., Nahrgang, J. D., & Morgeson, F. P. (2007). Leader-member exchange and citizenship behaviors: a meta-analysis: American Psychological Association.
- Jackofsky, E. F. (1984). Turnover and Job Performance: An Integrated Process Model. *Academy* of Management Review, 9(1), 74-83. doi:10.5465/AMR.1984.4277940

Joreskog, K., & Sorbom, D. (2001). LISREL 8.51 Chicago, IL: Scientific Software International.

Judge, T. A., & Kammeyer-Mueller, J. D. (2012). Job Attitudes. *Annual Review of Psychology*, 63(1), 341-367. doi:doi:10.1146/annurev-psych-120710-100511

Julian, M. W. (2001). The Consequences of Ignoring Multilevel Data Structures in Nonhierarchical Covariance Modeling. *Structural equation modeling: a multidisciplinary journal*, 8(3), 325-352. doi:10.1207/S15328007SEM0803_1

- Kaplan, D., & Elliott, P. R. (1997). A didactic example of multilevel structural equation modeling applicable to the study of organizations. *Structural equation modeling: a multidisciplinary journal*, 4(1), 1-24. doi:10.1080/10705519709540056
- Kline, R. B. (2015). *Principles and practice of structural equation modeling*: Guilford publications.
- Konovsky, M. A., & Pugh, S. D. (1994). Citizenship behavior and social exchange. *Academy of Management Journal*, 37(3), 656-669.
- Korsgaard, M. A., Brodt, S. E., & Whitener, E. M. (2002). Trust in the Face of Conflict: The Role of Managerial Trustworthy Behavior and Organizational Context. *Journal of Applied Psychology*, 87(2), 312-319.
- Korsgaard, M. A., Brower, H. H., & Lester, S. W. (2015). It Isn't Always Mutual: A Critical Review of Dyadic Trust. *Journal of Management*, *41*(1), 47-70. doi:10.1177/0149206314547521
- Kristof-Brown, A. L., Zimmerman, R. D., & Johnson, E. C. (2005). Consequences of Inviduals' Fit at Work: A Meta-Analysis of Person–Job, Person–Organization, Person–Group, and Person–Supervisor Fit. *Personnel Psychology*, 58(2), 281-342.
- Kristof, A. L. (1996). Person-Organization Fit: An Integrative Review of Its Conceptualizations, Measurement, and Implications. *Personnel Psychology*, 49(1), 1-49.
- Kuhnert, K. W., & Palmer, D. R. (1991). Job security, health, and the intrinsic and extrinsic characteristics of work. *Group & Organization Management*, *16*(2), 178-192.

- Lambert, L. S., Edwards, J. R., & Cable, D. M. (2003). Breach and Fulfillment of the Psychological Contract: A Comparison of Traditional and Expanded Views. *Personnel Psychology*, 56(4), 895-934.
- Lambert, L. S., Tepper, B. J., Carr, J. C., Holt, D. T., & Barelka, A. J. (2012). Forgotten but Not Gone: An Examination of Fit Between Leader Consideration and Initiating Structure Needed and Received. *Journal of Applied Psychology*, *97*(5), 913-930. doi:10.1037/a0028970
- Lazarsfeld, P. F., & Merton, R. K. (1954). Friendship as a social process: A substantive and methodological analysis. *Freedom and control in modern society*, *18*(1), 18-66.
- Lazarus, R. S. (1991). Progress on a cognitive-motivational-relational theory of emotion. *American psychologist*, *46*(8), 819-834. doi:10.1037/0003-066X.46.8.819
- Lazarus, R. S., & Folkman, S. (1984). *Stress, appraisal, and coping*: Springer publishing company.
- Lee, T. W. (1988). HOW JOB DISSATISFACTION LEADS TO EMPLOYEE TURNOVER. Journal of Business & Psychology, 2(3), 263-271.
- LePine, J. A., LePine, M. A., & Jackson, C. L. (2004). Challenge and Hindrance Stress: Relationships With Exhaustion, Motivation to Learn, and Learning Performance. *Journal of Applied Psychology*, 89(5), 883-891. doi:10.1037/0021-9010.89.5.883
- LePine, J. A., Podsakoff, N. P., & LePine, M. A. (2005). A meta-analytic test of the challenge stressor–hindrance stressor framework: An explanation for inconsistent relationships among stressors and performance. *Academy of Management Journal*, 48(5), 764-775.

- Lepine, M. A., Yiwen, Z., Crawford, E. R., & Rich, B. L. (2016). Turning Their Pain to Gain: Charismatic Leader Influence on Follower Stress Appraisal and Job Performance. *Academy of Management Journal*, 59(3), 1036-1059. doi:10.5465/amj.2013.0778
- Locke, E. A. (1976). The nature and causes of job satisfaction. In M. Dunnette (Ed.), *Handbook* of industrial and organizational psychology (pp. 1297-1350). Chicago, IL: Rand McNally.
- MacKinnon, D. P., Lockwood, C. M., Hoffman, J. M., West, S. G., & Sheets, V. (2002). A comparison of methods to test mediation and other intervening variable effects. *Psychological Methods*, 7(1), 83.
- March, J. G., & Simon, H. A. (1958). Organizations.
- Marsh, H. W., Hau, K.-T., & Wen, Z. (2004). In search of golden rules: Comment on hypothesis-testing approaches to setting cutoff values for fit indexes and dangers in overgeneralizing Hu and Bentler's (1999) findings. *Structural equation modeling*, 11(3), 320-341.

Maslow, A. (1954). Motivation and personality.

- Mason, M. (2010). *Sample size and saturation in PhD studies using qualitative interviews*. Paper presented at the Forum qualitative Sozialforschung/Forum: qualitative social research.
- Mathieu, J. E., Aguinis, H., Culpepper, S. A., & Chen, G. (2012). Understanding and estimating the power to detect cross-level interaction effects in multilevel modeling. *Journal of Applied Psychology*, 97(5), 951.
- Matta, F. K., Scott, B. A., Koopman, J., & Conlon, D. E. (2015). Does seeing "eye to eye" affect work engagement and organizational citizenship behavior? A role theory perspective on LMX agreement. Academy of Management Journal, 58(6), 1686-1708.
- Mattila, J. P. (1974). Job Quitting and Fictional Unemployment. *American Economic Review*, 64(1), 235-239.
- Mayer, D. M., Bardes, M., & Piccolo, R. F. (2008). Do servant-leaders help satisfy follower needs? An organizational justice perspective. *European Journal of Work and Organizational Psychology*, 17(2), 180-197. doi:10.1080/13594320701743558
- Mayer, R. C., & Davis, J. H. (1999). The Effect of the Performance Appraisal System on Trust for Management: A Field Quasi-Experiment. *Journal of Applied Psychology*, 84(1), 123-136.
- Mayer, R. C., Davis, J. H., & Schoorman, F. D. (1995). An Integrative Model of Organizational Trust Academy of Management Review, 20(3), 709-734. doi:10.5465/AMR.1995.9508080335
- Mayer, R. C., & Gavin, M. B. (2005). Trust in Management and Performance: Who Minds The Shop While The Employees Watch The Boss? *Academy of Management Journal*, 48(5), 874-888. doi:10.5465/AMJ.2005.18803928
- Mayer, R. C., & Norman, P. M. (2004). Exploring Attributes of Trustworthiness: A Classroom Exercise. *Journal of Management Education*, 28(2), 224-249.
- McDaniel, M. A., Schmidt, F. L., & Hunter, J. E. (1988). Job experience correlates of job performance. *Journal of Applied Psychology*, *73*(2), 327.
- McPherson, M., Smith-Lovin, L., & Cook, J. M. (2001). Birds of a feather: Homophily in social networks. *Annual review of sociology*, 415-444.
- Meyer, J. P., Allen, N. J., & Smith, C. A. (1993). Commitment to Organizations and Occupations: Extension and Test of a Three-Component Conceptualization. *Journal of Applied Psychology*, 78(4), 538-551.

- Michaels, C. E., & Spector, P. E. (1982). Causes of Employee Turnover: A Test of the Mobley, Griffeth, Hand, and Meglino Model. *Journal of Applied Psychology*, *67*(1), 53-59.
- Mobley, W. H., Griffeth, R. W., Hand, H. H., & Meglino, B. M. (1979). Review and conceptual analysis of the employee turnover process. *Psychological Bulletin*, 86(3), 493-522. doi:10.1037/0033-2909.86.3.493
- Mobley, W. H., Horner, S. O., & Hollingsworth, A. T. (1978). An Evaluation of Precursors of Hospital Employee Turnover. *Journal of Applied Psychology*, *63*(4), 408-414.
- Muthen, B. O., & Satorra, A. (1995). Complex Sample Data in Structural Equation Modeling. *Sociological Methodology*, 25, 267-316. doi:10.2307/271070
- Nunnally, J. C. (1967). Psychometric Theory. New York, N.Y.: McGraw-Hill.
- Pierce, J. R., & Aguinis, H. (2013). The Too-Much-of-a-Good-Thing Effect in Management. Journal of Management, 39(2), 313-338. doi:10.1177/0149206311410060
- Pillai, R., Schriesheim, C. A., & Williams, E. S. (1999). Fairness Perceptions and Trust as Mediators for Transformational and Transactional Leadership: A Two-Sample Study. *Journal of Management*, 25(6), 897-933. doi:10.1177/014920639902500606
- Podsakoff, P. M., MacKenzie, S. B., Paine, J. B., & Bachrach, D. G. (2000). Organizational citizenship behaviors: A critical review of the theoretical and empirical literature and suggestions for future research. *Journal of Management*, 26(3), 513-563.
- Podsakoff, N. P., LePine, J. A., & LePine, M. A. (2007). Differential Challenge StressorHindrance Stressor Relationships With Job Attitudes, Turnover Intentions, Turnover, and
 Withdrawal Behavior: A Meta-Analysis. *Journal of Applied Psychology*, 92(2), 438-454.
- Porter, L. W. (1961). A study of perceived need satisfactions in bottom and middle management jobs. *Journal of Applied Psychology*, *45*(1), 1-10. doi:10.1037/h0043121

- Preacher, K. J., & Selig, J. P. (2010). Monte Carlo method for assessing multilevel Mediation: An interactive tool for creating confidence intervals for indirect effects in 1-1-1 multilevel models
- Rodell, J. B., & Judge, T. A. (2009). Can "Good" Stressors Spark "Bad" Behaviors? The Mediating Role of Emotions in Links of Challenge and Hindrance Stressors With Citizenship and Counterproductive Behaviors. *Journal of Applied Psychology*, 94(6), 1438-1451.
- Roth, S., & Cohen, L. J. (1986). Approach, avoidance, and coping with stress. *American psychologist*, *41*(7), 813.
- Saucier, G. (1994). Mini-Markers: A brief version of Goldberg's unipolar Big-Five markers. Journal of personality assessment, 63(3), 506-516.
- Schaefer, P. S., Williams, C. C., Goodie, A. S., & Campbell, W. K. (2004). Overconfidence and the big five. *Journal of Research in Personality*, 38(5), 473-480.
- Schmitt, N. (1994). Method bias: The importance of theory and measurement. *Journal of Organizational Behavior*, 15(5), 393-398.
- Schoorman, F. D., Mayer, R. C., & Davis, J. H. (2007). An Integrative Model Of Organizational Trust: Past, Present, And Future. *Academy of Management Review*, 32(2), 344-354. doi:10.5465/AMR.2007.24348410
- Schultz, T. W. (1961). Investment in Human Capital. *The American Economic Review*, *51*(1), 1-17.
- Schwartz, S. H. (1994). Are There Universal Aspects in the Structure and Contents of Human Values? *Journal of social issues*, 50(4), 19-45. doi:doi:10.1111/j.1540-4560.1994.tb01196.x

- Snijders, T. B., & Bosker, R. R.(1999). Multilevel analysis: An introduction to basic and advanced multilevel modeling: London: Sage.
- Snyder, M. (1974). Self-monitoring of expressive behavior. *Journal of Personality and Social Psychology*, *30*(4), 526.
- Spector, P. E., Bauer, J. A., & Fox, S. (2010). Measurement artifacts in the assessment of counterproductive work behavior and organizational citizenship behavior: do we know what we think we know? *Journal of Applied Psychology*, 95(4), 781.

Springer, M. D. (1979). The algebra of random variables.

- Steel, R. P., & Griffeth, R. W. (1989). The Elusive Relationship Between Perceived Employment Opportunity and Turnover Behavior: A. *Journal of Applied Psychology*, 74(6), 846.
- Steiger, J. H. (1990). Structural model evaluation and modification: An interval estimation approach. *Multivariate behavioral research*, *25*(2), 173-180.
- Watson, D., & Clark, L. A. (1999). The PANAS-X: Manual for the positive and negative affect schedule-expanded form.
- Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scales. *Journal of Personality and Social Psychology*, 54(6), 1063-1070. doi:10.1037/0022-3514.54.6.1063
- Webster, J. R., Beehr, T. A., & Love, K. (2011). Extending the challenge-hindrance model of occupational stress: The role of appraisal. *Journal of Vocational Behavior*, 79(2), 505-516.
- Weiss, H. M., & Cropanzano, R. (1996). Affective events theory: A theoretical discussion of the structure, causes and consequences of affective experiences at work.

- Wheeler, L., & Reis, H. T. (1991). Self-recording of everyday life events: Origins, types, and uses. *Journal of personality*, *59*(3), 339-354.
- White, R. W. (1959). Motivation reconsidered: the concept of competence. *Psychological review*, 66(5), 297.
- Williams, L. J., & Anderson, S. E. (1991). Job satisfaction and organizational commitment as predictors of organizational citizenship and in-role behaviors. *Journal of Management*, *17*(3), 601-617.
- Zand, D. E. (1972). Trust and managerial problem solving. *Administrative Science Quarterly*, 229-239.
- Zapata, C. P., Olsen, J. E., & Martins, L. L. (2013). Social exchange from the supervisor's perspective: Employee trustworthiness as a predictor of interpersonal and informational justice. *Organizational Behavior and Human Decision Processes*, 121(1), 1-12. doi:<u>http://dx.doi.org/10.1016/j.obhdp.2012.11.001</u>
- Zhang, Z., Zyphur, M. J., & Preacher, K. J. (2009). Testing multilevel mediation using hierarchical linear models problems and solutions. *Organizational Research Methods*, 12(4), 695-719.

Appendix 1a

Additional Measures for Constructs in First Essay

Education.

1. Starting with kindergarten, how many years of school have you completed?

Job Experience.

1. How many months have you worked in your current occupation?

Self-Perceived Individual Employability.

1. Even if there was downsizing in this organization I am confident that I would be retained.

2. My personal networks in this organization help me in my career.

3. I am aware of the opportunities arising in this organization even if they are different to what I do now.

4. The skills I have gained in my present job are transferable to other occupations outside this organization.

5. I could easily retrain to make myself more employable elsewhere.

6. I have a good knowledge of opportunities for me outside of this organization even if they are quite different to what I do now.

7. Among the people who do the same job as me, I am well respected in this organization.

8. If I needed to, I could easily get another job like mine in a similar organization.

9. I could easily get a similar job to mine in almost any organization.

10. Anyone with my level of skills and knowledge, and similar job and organizational experience, will be highly sought after by employers.

11. I could get any job, anywhere, so long as my skills and experience were reasonably relevant.

- 1. Talkative.
- 2. Extroverted.
- 3. Unenvious. (R)
- 4. Relaxed. (R)
- 5. Bold.
- 6. Energetic.
- 7. Moody.
- 8. Jealous.
- 9. Shy. (R)
- 10. Quiet. (R)
- 11. Temperamental.
- 12. Envious.
- 13. Bashful. (R)
- 14. Withdrawn. (R)
- 15. Touchy.
- 16. Fretful.

Positive Affect and Negative Affect.

- 1. Interested.
- 2. Distressed.
- 3. Excited.
- 4. Upset.
- 5. Strong.
- 6. Guilty.
- 7. Scared.
- 8. Hostile.
- 9. Enthusiastic.

10. Proud.

11. Irritable.

12. Alert.

13. Ashamed.

14. Inspired.

15. Nervous.

16. Determined.

17. Attentive.

18. Jittery.

19. Active.

20. Afraid.

Continuance Commitment

1. I am not afraid of what might happen if I quit my job without

having another one lined up. (R)

2. It would be very hard for me to leave my organization right

now, even if I wanted to.

3. Too much in my life would be disrupted if I decided I

wanted to leave my organization now.

4. It wouldn't be too costly for me to leave my

organization now. (R)

5. Right now, staying with my organization is a matter of

necessity as much as desire.

6. I feel that I have too few options to consider

leaving this organization.

7. One of the few serious consequences of leaving this

organization would be the scarcity of available alternatives.

8. One of the major reasons I continue to work for this

organization is that leaving would require considerable personal sacrifice — another organization may not match the overall benefits I have here.

Networking.

1. I have a far-reaching "network" of contacts which could help me find out about other job opportunities.

2. I have contacts in other companies who might help me line up a new job.

3. My work and/or social activities tend to bring me in contact with a number of people who might help me line up a new job.

Appendix 1b

Interview Protocol for Cognitive Interviews in First Essay

Instructions

Good morning (afternoon). My name is ______. Thank you for agreeing to participate in this study. I am studying employee work experiences and employees thoughts about jobs with other organizations. During this interview, I will ask you about your current job and your prior work experiences. I will then ask you about your last job search and your thoughts about other jobs with other organizations. There are no right or wrong, or desirable or undesirable answers. Please feel comfortable saying what you really think and feel.

If it is okay with you, I will record our conversation. I want to get all the details but at the same time be able to carry on an attentive conversation with you. I assure you that all of your comments will remain completely confidential – no one will know your name or the name of the company that you work for. I will be compiling a report which will contain all interviewees' comments without any reference to individuals.

Before we get started, please take a few minutes to read this Informed Consent Form (read, discuss, and provide a copy of the consent form).

General Information:

- 1. Date of Interview (to be completed by interviewer):
- 2. Place of Interview (to be completed by interviewer):

Information about Interviewee's organization and work experience:

- 3. What is your first name or what pseudonym would you like me to use?
- 4. What is your job title?
- 5. What primary functions does your job involve (What kind of work do you do)?
- 6. How long have you held this job?
- 7. What kind of organization do you work for (industry, type of business)?
- 8. How long have you worked with your current organization?
- 9. How long have you worked in your current industry?

10. Have you worked full time (more than 30 hours per week) in any other industries besides the one that you currently work in? If yes, could you identify those other industries and how long you worked in those industries? (Probe for why subject switched industries)

Ease of Movement Measures.

I am now going to ask you some questions regarding your current thoughts about other jobs. For each question, I want you to provide a numerical response on a scale of 1 to 7 with 1 being Strongly Disagree to 7 being Strongly Agree.

11. It would be easy for me to get another job.

12. In answering the previous question, can you tell me what immediately came to mind when you heard that question?

13. In responding to the question about another job, you answered _____. Can you explain the thought process that led you to reach that number?

14. We are now moving on to the next question about other jobs. As with the previous statement about other jobs, I want you to answer the question by providing a numerical response from 1 to 7 with 1 being Strongly Disagree and 7 being Strongly Agree. Finding another job would be simple.

15. In answering the previous question, can you tell me what immediately came to mind when you heard that question?

16. In responding to the question about another job, you answered _____. Can you explain the thought process that led you to reach that number?

17. We are now moving on to the last question about other jobs. As with the previous questions about other jobs, I want you to answer the question by providing a numerical response from 1 to 7 with 1 being Strongly Disagree and 7 being Strongly Agree. I could find another job without difficulty.

18. In answering the previous question, can you tell me what immediately came to mind when you heard the question?

19. In responding to the question about another job, you answered _____. Can you explain the thought process that led you to reach that number?

Prior Job Search

20. I want you to think about the last time that you actively looked for another job. Can you tell me when that was?

21. Regarding your last job search, what steps did you take to look for another job? (Probe for details regarding type of job looked for compared with current job, thoughts when looking for job)

22. Did you ultimately change jobs? (Probe for reasoning why did or did not change jobs)

Most Recent Thoughts about Other Jobs

23. I now want you to think about the last time you thought about other jobs in the work force. Can you tell me when that was?

24. What led you to think about other jobs? (Probe for reasoning that led subject to think about other jobs.)

25. What types of other jobs did you think about? (Probe for comparison between current job versus jobs that subject thought about).

Demographics

26. How old are you?

27. What is your gender?

28. What is your race?

29. How many years of education have you had beyond high school?

30. Approximately how many full time jobs (working more than 30 hours per week) have you held since graduating from high school?

THANK YOU FOR YOUR TIME.

Appendix 2

Construct Measures for Second Essay

Hindrance Stressors.

- 1. Today, I have had to go through a lot of red tape to get my job done.
- 2. Today, I have had to deal with administrative hassles.
- 3. Today, I have not fully understood what is expected of me.
- 4. Today, I have received conflicting requests from two or more people.
- 5. Today, I have had many hassles to go through to get projects/assignments done.

PANAS-X.

The employees will be given a list of all 10 adjectives and be asked to indicate to what extent you have experienced the following states at work today. Five point scales with anchors of 1 = very slightly or not at all to 5 = very much.

- 1. Nervous.
- 2. Jittery.
- 3. Shaky.
- 4. Angry.
- 5. Hostile.
- 6. Irritable.
- 7. Alert.
- 8. Attentive.
- 9. Concentrating.
- 10. Determined.

Ease of Movement.

- 1. It would be easy for me to get another job.
- 2. Finding another job would be simple.

3. I could find another job without difficulty.

Counterproductive Work Behaviors

For each of the following behaviors, indicate how often you have engaged in that behavior today.

1 = never to 5 = often.

- 1. Made fun of someone at work.
- 2. Said something hurtful to someone at work.
- 3. Cursed at someone at work.
- 4. Acted rudely toward someone at work.
- 5. Taken property from work without permission.
- 6. Spent too much time fantasizing or daydreaming instead of working.
- 7. Taken an additional or longer break than is acceptable at your workplace.
- 8. Come in late to work without permission.
- 9. Neglected to follow your boss's instructions.
- 10. Intentionally worked slower than you could have worked.
- 11. Put little effort into your work.

Appendix 3

Construct Measures for Third Essay

Items for Trustworthiness Needed

Prompt: For each supervisor behavior listed below, please indicate how much of that specific

behavior from your supervisor would be right for you. 7 point response scale with anchors of 1 =

none and 7 = a great amount.

- 1. Performs his or her job as a supervisor very capably.
- 2. Knows a great deal about the work that a supervisor must do.
- 3. Demonstrates specialized supervisor capabilities that can increase our performance.
- 4. Achieves great success in his or her job as a supervisor.
- 5. Shows excessive concern for my welfare.
- 6. Strongly considers my needs and desires.
- 7. Really looks out for what is important to me.
- 8. Makes extra effort to help me out.
- 9. Always sticks to his or her word.
- 10. Always deals fairly with others.
- 11. Guided by sound principles.
- 12. Very consistent in his or her actions.

Items for Trustworthiness Supplied

Prompt: For each supervisor behavior listed below, please indicate how much of that specific

behavior your supervisor has demonstrated towards you. 7 point response scale with anchors of 1

= none and 7 = a great amount.

- 1. Performs his or her job as a supervisor very capably.
- 2. Knows a great deal about the work that a supervisor must do.
- 3. Demonstrates specialized supervisor capabilities that can increase our performance.
- 4. Achieves great success in his or her job as a supervisor.
- 5. Shows excessive concern for my welfare.
- 6. Strongly considers my needs and desires.
- 7. Really looks out for what is important to me.
- 8. Makes extra effort to help me out.
- 9. Always sticks to his or her word.
- 10. Always deals fairly with others.
- 11. Guided by sound principles.
- 12. Very consistent in his or her actions.

Items for Trust.

- 1. My direct supervisor is trustworthy.
- 2. My direct supervisor has demonstrated that he or she is worthy of my trust.
- 3. My direct supervisor deserves my trust.

Items for Organizational Citizenship Behaviors Individual

- 1. Helps others who have been absent.
- 2. Helps others who have heavy workloads.
- 3. Assists supervisor with his/her work (when not asked).
- 4. Takes time to listen to co-workers' problems and worries
- 5. Goes out of way to help new employees.
- 6. Takes a personal interest in other employees.
- 7. Passes along information to co-workers.