The Impact of Contingent Self-Esteem Threat on Displays of Interactional Justice

by

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Dedication

This work is dedicated to the most important people in my life.

(My husband James, my parents, Aubrey and Roeann and my brother Gordon)

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Abstract

The consequences of employee perceptions of interactional injustice have received much attention in the research literature; however, few studies have attempted to address the antecedents of unfair interpersonal treatment. The current study utilized an experimental design to investigate one potential cause of managerial displays of interactionally unfair behaviour toward subordinates: self-esteem threat. Although the main hypotheses were not supported, some interesting findings emerged. Self-esteem threat impacted managers' likelihood of providing explanations for unfavourable outcomes and this was particularly true for certain personality types (e.g., those with low self-esteem and/or high negative affectivity).

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The Impact of Contingent Self-esteem Threat on Displays of Interactional Justice

Extensive research has documented the negative consequences associated with organizational injustice. Injustice in the workplace has been linked to physical and psychological health problems for employees such as cardiac dysregulation (Elovainio, Kivimaki, Puttonen, Lindholm, Pohjonen & Sinervo, 2006), depression, emotional exhaustion, and heightened anxiety (Tepper, 2001). It has also been linked to adverse organizational outcomes, such as sabotage, and retaliatory and deviant employee behaviours (Ambrose, Seabright & Schminke, 2002; Greenberg, 1990; Schmitt & Dorfel, 1999; Skarlicki & Folger, 1997; Skarlicki, Folger & Tesluk, 1999).

Employees perceive organizational injustice when they experience inequitable or unfair allocations of rewards or resources (termed distributive injustice), when they experience unfair decision-making procedures (termed procedural injustice), or when they receive rude and disrespectful treatment from managers (termed interactional injustice; Cohen-Charash & Spector, 2001). Regardless of how arduously a manager or an organization strives to be equitable and make decisions based on fair procedures, managers are often tasked with communicating unjust or unfavourable events to employees. The fact that managers may not always be able to influence or prevent procedural and distributive injustice from occurring, makes the study of the interactional aspects of injustice that much more important. Though distributive and procedural injustice are often the result of decisions made at the organizational level, interactional justice occurs at the individual level, and is therefore under the control of individual managers (Masterson, Lewis, Goldman & Taylor, 2000). However, anecdotal evidence suggests that managers may not always treat employees with sensitivity or provide

adequate justification for decisions when employees need it most (Folger & Pugh, 2002; Folger & Skarlicki 1998). But if interactional justice is in fact in the hands of the individual, why do managers sometimes fail to display interactionally just behaviours toward subordinates?

Past research has highlighted the roles of depression (Tepper, Duffy, Henle & Schurer-Lambert, 2006), subordinate assertiveness (Korsgaard, Roberson & Rymph, 1998), anticipation of negative employee reactions (Folger & Skarlicki, 1998), and manager self-esteem (Wiesenfeld, Brockner & Thibault, 2000) as influences on managers' tendencies to display interactionally just behaviours. I add to the current literature by further investigating the role of manager self-esteem. Specifically, using a laboratory-based experimental design, the present research examines how threatened self-esteem in a relevant domain impacts managers' interactional justice behaviour toward subordinates.

*What is Interactional Justice*

Employees perceive interactional justice when managers treat them with respect and provide them with adequate and timely explanations for decisions (e.g., pay raise decisions; Bies, 2001, 2005; Bies & Moag, 1986). The construct of interactional justice is a relatively new addition to the justice literature. Originally, organizational justice research focused on employee perceptions of distributive justice, which reflects the just allocation of rewards or resources (Cohen-Charash & Spector, 2001). As the body of justice research grew, it became clear that investigating only the perceived fairness of outcomes was not enough to capture fully employees' experience of justice and injustice at work. Indeed, people care not only about the fairness of decision outcomes, they are

also concerned with how decisions are made. This consideration of the fairness of the decision making 'process' became known as procedural justice (Thibault & Walker, 1975). A third important aspect of organizational justice emerged from the literature that took into account the social side of procedural justice, that is, the quality of interpersonal treatment an individual receives as procedures are enacted (i.e., interactional justice, Bies & Moag, 1986). Although researchers have long recognized the importance of the social side of procedures for capturing employees' experiences of fairness (Barrett-Howard & Tyler, 1986; Leventhal, 1980; Lind & Tyler, 1988), disagreement existed in the literature as to whether interactional justice should be considered a separate and distinct dimension of justice or whether it is better subsumed as a subcomponent of procedural justice.

More recently, interactional justice has been recognized as a third distinct dimension of organizational justice, separate from both procedural and distributive justice (for reviews see Bies, 2005; Bobocel & Holmvall, 2001). Evidence for this conclusion comes from research that demonstrates, among other things, that interactional justice has both distinct antecedents and consequences from other justice dimensions. Some researchers (e.g., Colquitt, 2001; Greenberg, 1993), further break down the interactional justice construct into two subcomponents: informational justice (reflecting the amount, detail and timeliness of the justification or explanation individuals receive regarding decisions or outcomes) and interpersonal justice (reflecting the degree of sensitivity and respect with which individuals are treated; Greenberg, 1993). Recent meta-analyses and reviews support the idea that informational and interpersonal aspects of interactional justice might best be considered as distinct constructs (Bies, 2005; Colquitt, 2001; Colquitt, Conlon, Wesson, Porter & Ng, 2001; Colquitt & Greenberg, 2003) although

more research is needed to support this claim. In the current work, I examine the role of self-esteem threat on managers' displays of both informational justice and interpersonal justice.

*The Impact of Interactional Injustice*

Relative to procedural and distributive injustice, interactional injustice is likely the most commonly encountered form of injustice employees are likely to experience (Mikula, Petri & Tanzer, 1990; Miller, 2001), making research on its antecedents and consequences particularly important. For example, Mikula (1986) found that when asked about experiences of injustice in daily life, college students cited forms of interactional injustice (e.g., unjustified accusations and lack of recognition) as among the most frequently experienced.

As might be expected, a large body of literature has shown that employees' perceptions of interactional injustice are important determinants of a wide array of attitudes and behaviours (for reviews, see Cohen-Charash & Spector, 2001; Colquitt et al., 2001). For example, Aquino, Lewis and Bradfield (1999) examined the relationship between perceptions of organizational justice and deviant behaviour and found interactional injustice to be a stronger predictor of deviant behaviour than both procedural and distributive injustice. Interactional injustice has been associated with a number of additional personal and organizational consequences including withdrawal behaviours, distrust in management, reduced affective commitment (Barling & Phillips, 1993) as well as stress (Judge & Colquitt, 2004). The negative effects of interactional injustice may be particularly strong when coupled with the communication of a negative outcome. That is, unfair interpersonal treatment displayed during the communication of an unfavourable

outcome (e.g., a poor performance review) may be akin to "kicking" employees when they are already down. In contrast, receiving high quality interpersonal treatment (i.e. respect, thorough explanations) mitigates the negative effects of unfavourable events on employee reactions (Greenberg, 1990). Promoting interactional justice behaviour among managers is important, given the impact of interactional justice perceptions on employee and organizational outcomes. However, one must first understand what factors contribute to managers' interactional justice behaviour.

*What Determines Manager Interactional Justice?*

The treatment of interactional justice as a dependent variable is a perspective that has received relatively little attention in the literature. Although the focus on antecedents of interactional justice is growing (Folger & Pugh, 2002; Folger & Skarlicki, 1998, 2001; Korsgaard et al., 1998; Wiesenfeld et al., 2000), many questions are left unanswered. As reviewed below, past research investigating causes of interactional injustice shows that situational factors, such as the fairness of the decision-making procedures used to determine outcomes (Wiesenfeld et al., 2000); subordinate characteristics, such as subordinate communication styles (Korsgaard et al., 1998); and manager characteristics, such as depression (Tepper et al., 2006), are associated with managers' tendencies to display interactionally unjust behaviour.

Research shows that situational characteristics can make subordinates more likely to be targets of interactional injustice (Folger & Pugh, 2002; Folger & Skarlicki, 2001; Wiesenfeld et al., 2000). Employees who experience negative outcomes (e.g., pay cuts, layoffs) as the result of unfair procedures may be more likely to fall victim to interactionally unjust behaviour from managers (Folger & Pugh, 2002; Folger &

Skarlicki, 2001; Wiesenfeld et al., 2000). Folger and Skarlicki (2001) argue that managers tend to engage in distancing behaviours when dealing with individuals to whom they must communicate a negative outcome that occurs as the result of procedural injustice.

Managerial distancing behaviours, such as minimizing contact with a subordinate, are likely to result in perceptions of interactional injustice in the eyes of the subordinate. A manager who is behaving in ways that appear 'cold' or 'withdrawn' to an employee is likely to be seen as less interactionally just than a manger who is behaving in a way that appears supportive or warm. Additionally, subordinates are unlikely to feel that they have received adequate explanations or that they were treated with dignity and respect if a manager is making efforts to minimize contact and maintain emotional distance.

Wiesenfeld et al. (2000) also considered the impact of situational factors on manager behaviour. In a correlational study, Wiesenfeld et al. examined the role of procedural injustice as a contributing factor to ineffective managerial behaviours in reaction to job layoffs. They hypothesized that manager perceptions of procedural injustice regarding the layoffs would be related to the display of ineffective managerial behaviours toward subordinates. The results of the study showed support for their hypothesis. Specifically, managers tended to display less effective managerial behaviour when the negative outcome (i.e., job layoff) was perceived as being the result of unfair procedures.

Subordinate characteristics also have an important role to play in determining the likelihood of a subordinate experiencing interactional injustice from a manager (Korsgaard et al., 1998; Tepper et al., 2006). Unassertive communication styles and

negative affectivity are subordinate characteristics that have been linked to manager displays of interactional injustice. Specifically, Korsgaard et al. (1998) looked at the role of assertive communication styles in influencing interactional fairness in a performance appraisal situation. Participants in the study acted as a manager giving feedback to a confederate. The feedback on the confederate task was always negative and the confederate was trained to respond to feedback in an assertive manner (asking direct questions, stating position confidently) or in an unassertive manner (asking indirect questions, providing vague non-committal statements). Managers displayed a higher degree of interactional justice during communications with an assertive subordinate as compared with a subordinate who behaved in a more passive manner.

Tepper et al. (2006) argued that subordinates high in negative affectivity may also be more likely to elicit negative behaviours from managers than those low in negative affectivity. Specifically, Tepper et al. examined negative affectivity in relation to managers' displays of abusive supervision. Abusive supervision, as defined by Tepper et al., encompasses behaviours such as public ridicule, taking undue credit, inappropriately assigning blame, and rudeness. These behaviours are analogous to being treated with a lack of dignity and respect, which comprises the definition of interpersonal justice used in the present study. Tepper et al. argued that factors like procedural injustice and supervisor depression lead supervisors to act in unfair ways toward subordinates who are perceived to be vulnerable. Specifically, Tepper et al. tested a model positing that depression symptoms resulting from procedural injustice would translate into abusive supervision toward subordinates higher in negative affectivity, who may be perceived as easy targets. The study's findings suggest that higher subordinate negative affectivity is

related to abusive supervision. Individuals high in negative affectivity may thus be more likely to fall victim to interactionally unfair behaviour from a supervisor because they may be perceived as submissive and vulnerable, making them an easy target (Aquino et al., 1999).

Manager characteristics have also been linked with interactionally unjust behaviour; depression, feelings of responsibility for negative outcomes, personal beliefs, and self-esteem, have all been identified as factors associated with interactionally unjust behaviour. Using field surveys and a scenario study, Folger and Skarlicki (1998) investigated why managers are often abrupt and curt when communicating layoffs to employees. They found that managers who were told that they were partially responsible for a negative outcome, through mismanagement (vs. market conditions), were more likely to act in interactionally unjust ways when communicating the negative outcome to their subordinates. When managers believed they were to blame for layoffs, they reported increased discomfort and spent less time with employees when communicating the decision.

In addition to manager feelings of responsibility or discomfort, Folger and Skarlicki (2001) argued that managers' beliefs can also impact their likelihood of displaying interactional injustice toward a subordinate. Managers who hold the belief that the world is fair and just, may display interactional injustice when communicating an undeserved negative outcome to a subordinate, in an attempt to maintain that belief. For example, if an individual receives notification that an exemplary employee is to be laid off, it may be easier for that manager to rationalize that the employee "deserves" that negative outcome than to readjust their belief about the way the world works. Rather than

accept that people do not always get what they deserve, managers may actually engage in interactionally unjust behaviour, derogating the employee to fit the view that the employee deserved the negative outcome.

In the current study, I examine manager self-esteem as an antecedent of interactional justice behavior, thus I return to the research conducted by Wiesenfeld et al. (2000) that looked at the relationship between procedural injustice and managerial behaviour. Specifically, Wiesenfeld et al., examined the mediating role of self-esteem in the relationship between procedural injustice and managerial behaviour. Using a correlational design, they found that managers who perceived low procedural justice with regard to the layoffs reported lower self-esteem. Although not directly tested, the reduced self-esteem may be due to the fact that, given their position in the organization, they feel partly to blame for the unfair procedures. In turn, managers who reported lower self-esteem displayed fewer effective managerial behaviours than those with higher self-esteem. Although Wiesenfeld et al. did not directly measure interactional justice, effective managerial behaviours typically include treating employees with interactional fairness (Graetz, 1977; Reave, 2005; Tepper 2000).

Though Wiesenfeld et al.'s (2000) study provides a demonstration that self-esteem is associated with manager behaviour, this research is correlational in nature and thus causal statements about the role of self-esteem in justice behaviour are not possible. In addition, to my knowledge, the specific domains in which individuals base their self-worth have yet to be examined in regard to the impact of self-esteem threat on managers' displays of interactional justice. To address this gap in the literature, the present research

utilized an experimental design to examine how threatening managers in a domain of importance to their self-esteem impacts their behaviour toward subordinates.

*Self-Esteem*

Self-esteem reflects our evaluation of ourselves, or how we feel about who we are (Crocker & Knight, 2005). The concept of self-esteem has been emphasized throughout the psychological literature and in the minds of the public; for a century it has been studied, debated and popularized. Countless self-help books, as well as scientific literature, tout the value and importance of self-esteem in achieving fulfilling relationships and attaining mental health (Street & Isaacs, 1998). The self-esteem literature references both global and domain based self-esteem: Global self-esteem refers to an overall evaluation of self-worth, whereas domain specific self-esteem refers to evaluations of self-worth pertaining to specific aspects or domains of the self (Crocker, 2002).

*Contingencies of Self-Worth*

Overall self-worth is derived from a combination of our evaluations of self-worth in more specific domains. For example, some individuals may derive self worth through academic achievement, whereas others' self-worth is contingent upon approval from others or physical attractiveness (Crocker, Sommers & Luhtanen, 2002; James, 1890). A number of domains of the self have been examined in the literature as bases for self-esteem, such as appearance (Crocker & Wolfe, 2001; Zeigler-Hill, 2006), family support (Crocker & Wolfe, 2001), approval from others (Luhtanen & Crocker, 2005), competition (Sargent, Crocker & Luhtanen, 2006), power or ability to influence others (Coopersmith, 1967), God's love (Zeigler-Hill, 2006), virtue, and academic competence

(Luhtanen & Crocker, 2005). Crocker and Wolfe (2001) suggest that this is far from an exhaustive representation of all the aspects of the self in which self-esteem can be based.

Crocker and Wolfe (2001) suggest that contingencies of self-worth that are more intrinsic (e.g., God's love) may be more stable because they are less vulnerable to self-esteem threat. By contrast, contingencies that are more external may be more reactive to self-esteem threat. For example, if an individual's self-worth is partially based on God's love, they are unlikely to encounter a challenge to the belief that God loves them in their everyday life. If an individual bases their self-worth in competition, however, they can compare themselves to others on a number of continua from money and skills to material possessions and it is likely that they will encounter a challenge to a contention of being better than others. The present study focuses on the competition contingency of self-worth (the degree to which an individual derives their self-worth from competition will be referred to as 'competition contingency' for the remainder of this paper). Competitiveness was chosen because threat to competition based self-esteem is relevant in organizational settings. For example, managers in organizations may compete for promotions, recognition, or to meet goals or targets; the workplace is full of opportunities to compete with others. In many cases competition may be encouraged; yet, in any competition there are some who succeed and some who fail. If fostering competition does set the stage for self-esteem threat that could lead to interactionally unfair behaviour toward others, it is important for organizations to be aware of this potential issue.

*Self-esteem Threat*

Self-esteem can be gained or lost through successes and failures in valued domains; this concept reflects contingent self-worth (Crocker et al., 2002; James, 1890).

In general, individuals seek to maintain a positive view of the self (Crocker, 2002). If an individual experiences a situation or interaction that threatens this positive self-view, they often take action to defend or protect their sense of self (Baumeister, Smart & Boden, 1996). Research suggests that individuals will react negatively to self-esteem threats; however, as reviewed above, whether or not something is perceived as threatening depends on how an individual derives his or her self-worth (Crocker & Luhtanen, 2003). Individuals are most likely to perceive a threat and react negatively when they experience a failure, or negative outcome, in a contingent domain (Crocker, Luhtanen, Cooper & Bouvrette, 2003).

Although it is clear that individuals experience negative reactions in response to threatened self-worth (Aquino & Douglas, 2003; Baumeister et al., 1996; Berkowitz, 1993; Heatherton & Vohs, 2000), the literature is mixed regarding what forms such reactions might take. Individuals may respond with aggression (e.g., harsh criticism, prejudicial slurs or insults; Aquino & Douglas, 2003; Baumeister et al., 1996; Berkowitz, 1993) or they may withdraw from the threatening situation (Baumeister, 1993); both of these types of responses have the potential to be perceived as both informationally and interpersonally unjust. For example, in a study investigating the types of events people view as unjust, Mikula et al. (1990) found that participants noted aggressive behaviour, rude behaviour, disregard for the feelings of others, and putting one's own interests first as events that they considered unjust. These behaviours parallel those cited as aggressive in the self-esteem threat literature. Less aggressive reactions to threatened self-worth such as distancing or withdrawal behaviours may also be perceived by subordinates as interactionally unjust. For example, distancing and withdrawal behaviours may include

curt or abrupt responses during communications, which are likely to result in less information being communicated to the subordinate and thus perceptions of informational injustice. Subordinates may also perceive these behaviours (e.g. curtness, abruptness) as cold and rude. Indeed, a manager who is behaving in ways that appear "cold" or "withdrawn" to an employee is likely to be seen as less interpersonally just than a manger who is behaving in ways that appear supportive or warm. Thus, subordinates are likely to perceive interactional injustice from a manager reacting to self-esteem threat regardless of whether the reaction is aggressive or withdrawn.

Reactions to threatened self-worth are often directed at a convenient target and not necessarily the source of the threat (Hoobler, & Brass, 2006). Threats to managers, in most cases, may be likely to come from employees with equal or higher status within the organization. Managers may not always be in a position, or have the opportunity, however, to vent at superiors who have threatened them and thus they may be at risk of displaying interactional injustice toward subordinates. In the present research, I examine the impact of competition based self-esteem threat on manager displays of interactional injustice when communicating negative feedback to a subordinate. Based on the literatures on contingencies of self-worth and self-esteem threat, I propose the following hypothesis.

*Hypothesis 1.* There will be a 2-way interaction between competition contingency and competition-based self-esteem threat, as follows: The more managers base their self-worth on competitiveness (outperforming others) the less likely they are to display interpersonal and informational justice following a threat to their self-esteem. Or, put differently, the manipulation of self-esteem threat (threat vs. no threat) will be more

strongly related to interactional justice behaviour for those who more strongly derive their self-worth in the competition domain.

*Interactive Effect of Global Self-Esteem and Self-Esteem Threat in a Contingent Domain*

Why do some individuals respond to self-esteem threat with withdrawal behaviours and others with aggression? There are several findings in the existing literature that point to a possible interaction between self-esteem threat, competition contingency, and global self-esteem. For example, research suggests that although individuals tend to have the same initial emotional reactions to threatened self-worth, the subsequent behavioural responses an individual chooses to engage in can be varied (Heatherton & Vohs, 2000).

Two theories that may offer some explanation for these differences in behavioural reactions are self-enhancement theory (reflecting a desire to promote a positive self-image; Sedikides, Herbst & Hardin, 2002) and self-protection theory (reflecting a desire to avoid situations that could negatively impact one's self-image; Tice, 1993). Individuals with high global self-esteem tend to engage in self-enhancement. These individuals anticipate that they will succeed and seek out high risk opportunities to increase a positive self-image (Tice, 1993). When self-enhancing individuals who anticipate success, are faced with failure they may perceive the failure as a threat to their positive self-image. These individuals may respond to this threat to their self-view with defensive and aggressive behaviours (Baumeister et al., 1996; Berkowitz, 1993). In contrast, individuals low in global self-esteem tend toward self-protection. Rather than seeking out opportunities to increase self-esteem, which carry the risk of failure and a potential decrease in self-esteem, these individuals err on the side of caution and attempt to protect

their self-image rather than enhance it. Individuals who engage in self-protection are averse to threat and will actively avoid situations that could result in a decrease in their self-esteem (Tice, 1993). If individuals oriented toward self-protection experience threat they are less likely to aggress than individuals oriented toward self-enhancement. In an attempt to avoid further threat, they may, however, be more likely to display withdrawal behaviours (Baumeister, Bushman & Campbell, 2000).

Self-protection theory and self-enhancement theory suggest differences in behavioural reactions to self-esteem threat based on differences in the motivations of individuals with low and high global self-esteem. Although the reactions of both individuals with low global self-esteem and those with high global self-esteem encompass behaviours that may be perceived as interactionally unjust, individuals with high global self-esteem may react more strongly when exposed to self-threat (Baumeister, et al., 1996). Indeed, although individuals with low global self esteem who engage in self-protection may display interactional injustice in an attempt to avoid further damage, they may not react as strongly to the original threat as individuals with high self-esteem. Individuals low in self-esteem anticipate failure and therefore may not react as defensively when they actually fail as compared with individuals with high self-esteem who anticipate success (Baumeister, 1993). If individuals high in global self-esteem are more likely to act out in negative or anti-social ways because the negative information they receive from a threatening event would be more incongruent with their positive self-image, then individuals high in global self-esteem may react more strongly to self-esteem threat in a contingent domain than individuals low in global self-esteem, leading to

*Hypothesis 2.* Level of global self-esteem will moderate the relationship between competition-based self-esteem threat and competition contingency in predicting manager displays of interpersonal and informational justice. Specifically, I expect the pattern specified in Hypothesis 1 will be stronger for those with high (versus low) global self-esteem.

*Interactive Effect of Negative Affectivity and Self-Esteem Threat in a Contingent Domain*

Negative affectivity is the propensity to experience negative emotions (e.g., distress, guilt, sadness). Previous research indicates a tendency for individuals high in negative affectivity to focus on aspects of the environment with potentially negative consequences (Judge, 1993). Indeed, individuals who are high in negative affectivity tend to be more responsive to events that generate negative emotions than those low in negative affectivity (Larsen & Katelaar, 1991). Individuals who are high in negative affectivity may also be more likely to respond to negative stimuli with negative behaviour. For example, research suggests that individuals high in negative affectivity are more likely than those low in negative affectivity to respond to injustice with retaliation (Skarlicki et al., 1999). Other negative behaviours that have been linked with negative affectivity include delinquency (Aquino et al., 1999; Eysenck & Gudjonsson, 1989), interpersonal violence and vandalism (Heaven, 1996), and counterproductive work behaviours (Spector & Fox, 2002). This research suggests that individuals who are high in negative affectivity may react more strongly to circumstances that result in lowered self-esteem, thus, Hypothesis 3 is as follows:

*Hypothesis 3.* Negative affectivity will moderate the relationship between competition based self-esteem threat and competition contingency in predicting manager

displays of interpersonal and informational justice. Specifically, I expect the pattern specified in Hypothesis 1 will be stronger for those with high (versus low) negative affectivity.

<div align="center">Method</div>

*Participants and Design*

Sixty-four undergraduate university students participated in the study (45 females, 19 males) in exchange for partial credit toward an introductory psychology class. The study was designed as a 2 session study. In session 1, participants completed a number of individual difference measures. Approximately one week later, participants returned to complete session 2, which involved taking part in an organizational simulation. Participant codes were used to match participant data across the two sessions. The mean age of participants was 21.2 years ($SD = 2.76$). Participants were randomly assigned to one of two experimental conditions (self-esteem threat or no self-esteem threat).

*Procedure*

*Session 1: Assessment of individual differences.* Session 1 was completed in small groups of no more than 8 participants. Participants were asked to complete a number of individual difference measures including a measure of global self-esteem, negative affectivity, and contingencies of self-worth (competition). A number of filler scales were also included (e.g., general health questionnaire, decision making survey) that were more germane to my cover story (see *Session 2* below). Before leaving, participants were asked to schedule a time to return to complete the second session.[1]

Global self-esteem was measured with a 6-item scale adapted from the Rosenberg (1965) self-esteem scale (see Appendix A). Each item was presented as a continuum with

an anchor at each end (e.g. "Worthless - Worthwhile"). Participants were asked to respond to each of the items using a 7-point scale (only the endpoints were labeled).

The competition subscale of Crocker et al.'s (2003) contingencies of self-worth scale was used to measure competition contingency (see Appendix B). This scale consists of 5 items; participants were asked to respond by indicating to what degree they agree or disagree with each statement based on a 7-point Likert scale (1 = *strongly disagree*, 7 = *strongly agree*). A sample item is "Doing better than others gives me a sense of self-respect."

Negative affectivity was measured with 10-items from Watson, Clark and Tellegen's (1988) Positive and Negative Affect Schedule (see Appendix C). Each item is a single word describing an emotion (e.g., Distressed). Respondents used a 5-point Likert scale (1 = *very slightly or not at all*, 5 = *very much*) to rate the extent to which they generally feel each emotion described.

*Session 2: Main study session.* Approximately 1 week following session 1, participants completed the main study. Participants were given a cover story for the research. Specifically, they were told that the purpose of the research was to examine the effect of stress at different levels of an organization. As such, they would participate in an organizational simulation with one other participant, who was in fact a confederate. To bolster the cover story, participants were given a wrist blood pressure monitor (to serve as an objective measure of stress) from which the researcher took readings at three points during the course of the session.

Participants were told that they would be randomly assigned to play the role of a subordinate or a manger in the organizational simulation and would be asked to complete

a number of tasks relevant to the role they had been assigned. The random assignment was rigged so that the participant was always put into the role of the manager. To help participants put themselves into a managerial role they were given a description of the simulated organization and their position in that organization (see Appendix D). The participants were also given a number of tasks to complete that included scheduling employees (Appendix E), writing a memo (Appendix F), and filling out a budget (Appendix G) as well as the task of grading a report (Appendix H) that participants believed was completed by the 'second participant' (confederate acting as the participant in the subordinate role).[2]

The report that the participant graded was evaluated based on an objective grading key (see Appendix I) that asked participants to identify missing information and was designed so that the participant would have to communicate negative feedback to the "subordinate". All participants received the same report and grading key. After going over the report, participants were asked to use the following scale markers to evaluate their "subordinate's" performance (Very Poor = *missing 9 or more informational checks, Excellent = missing 1 or 2 informational checks)*. The report that participants graded had 7 pieces of information missing, reflecting a poor rating. In addition to providing feedback to the subordinate, participants were also informed that they would be receiving feedback on their own performance from the researcher during the study.

After participants completed the grading task, they were given handwritten feedback from the researcher on one of the tasks they completed earlier (the memo task), which comprised the threat manipulation. Because individuals who gain self-worth by being "better than" others likely perceive neutral information that suggests their

performance is average as threatening, participants in the no-threat condition received positive feedback on their performance. The handwritten feedback was as follows:

> *"I have gone over the memo you wrote in order to give you some feedback on how you are doing as a manager. You did a great job on the memo task compared to other managers who have completed the task. For example, you mentioned all of the key information. What you wrote was clear and well structured, general workers in the company would be able to easily understand what you were trying to say."*

In contrast, in the threat condition, participants received handwritten feedback indicating that their performance was poor compared with others who had completed the task previously:

> *"I have gone over the memo you wrote in order to give you some feedback on how you are doing as a manager. Unfortunately, you did a poor job on the memo task compared to other managers who have completed the task. For example, you didn't mention a lot of the key information. What you did write was confusing and poorly structured, general workers in the company are unlikely to understand what you were trying to say."*

After the participant received feedback (either threatening or non-threatening) from the researcher on their performance, the confederate was brought into the lab in order to receive feedback from the participant on the report the participant had graded earlier. The confederate, who was a 23 year old female undergraduate student, was blind to the purpose of the study and was trained, prior to testing, to be unassertive during the feedback session and to respond only in specified ways to the feedback. For example, if

the participant asked the confederate if she had any questions, the confederate was instructed to respond "not right now". Based on the work by Korsgaard et al. (1998), I chose to have an unassertive confederate because an assertive confederate may have elicited interactionally fair behaviour from all participants, which would limit variability on the justice measures.

After receiving verbal feedback from the participant, the confederate was escorted from the room to complete measures of perceived interpersonal and informational justice (Colquitt, 2001; see *Measures* section below). It should be noted that the feedback sessions were also recorded on audio cassette. Following the feedback session, participants were asked to complete a questionnaire containing an additional stress measure intended to bolster the cover story, and a manipulation check item to assess the effectiveness of the threat manipulation (see *Measures* section below).

Before debriefing participants, they were probed for suspicion. The probe was designed to identify any participants who might have guessed the hypotheses of the study as well as to uncover any problems that participants might have had with the tasks that had been designed for the simulation.

*Measures*

*Interpersonal Justice.* Interpersonal justice was measured using Colquitt's (2001) Interpersonal Justice Scale. The scale measures the extent to which managers display respect and dignity when interacting with employees. The scale consists of 4 items. A sample item is: "Did (he/she) treat you with dignity".[3] The confederate was asked to respond to each item by indicating to what degree she agreed or disagreed with each

statement using a 7 point Likert scale (1 = *strongly disagree*, 7 = *strongly agree*), with high scale scores indicating more interpersonal justice (see Appendix J).

*Informational Justice.* Informational justice was measured using items adapted from Colquitt's (2001) Informational Justice Scale. The scale measures the extent to which managers provide adequate explanations for decision making procedures and outcomes and consists of 5 items. A sample item is: "Did (he/she) thoroughly explain the procedures used to score the report?" For the purposes of this study two scale items were not included because they were not applicable to the role play situation in which the scale was used. The first item deleted from the Informational Justice Scale (Colquitt, 2001) was "Did (he/she) communicate details in a timely manner?" This item was removed because participants were given no choice about when the feedback session occurred. The second deleted item was "Did (he/she) seem to tailor (his/her) communications to individuals specific needs?" This item was deemed inappropriate because the employee was unknown to the participant. The participant and employee did not meet until the feedback session occurred, therefore the participant would have no information available to accurately judge the employee's "needs" beyond the information gleaned from grading the report. The confederate was asked to respond to each of the 3 remaining items by indicating to what degree she agreed or disagreed with each statement using a 7- point Likert scale (1 = *strongly disagree*, 7 = *strongly agree)* with higher scale scores indicating more informational justice (Appendix J).

*Manipulation Check.* The following item, rated on a 5-point Likert scale (1 = *below average*, 5 = *above average*), checked the manipulation of threat to competition based self-esteem: "On the memo writing task I performed...". The goal of the threat

manipulation was to threaten competition based self-esteem by making participants feel that they performed poorly compared to others. A literal manipulation check was used to reduce the possibility of hypothesis guessing and allow for a more accurate check of suspicion. Were participants to respond to an item asking if they felt threatened, they may have been more likely to surmise that the purpose of the research involved investigating reactions to threatening feedback.

<div align="center">Results</div>

*Removal of Cases*

Sixty-four undergraduate students participated in the study (45 female, 19 male). A total of 9 participants were removed from data analyses for various reasons: Four participants were removed due to suspicion of the feedback they received from the researcher (which comprised the threat manipulation). Two participants were removed because they were able to make close hypothesis guesses due to previous involvement in similar studies. One participant was removed because they were confused about where the feedback they received came from (they believed it came from the confederate). One participant was removed from the analysis because the participant indicated that they did not take the study seriously and an additional participant was removed because they erroneously graded the employee task as excellent rather than poor so the feedback they gave the confederate was based on a positive review rather than a negative one.[4] Of the 9 deleted participants, 4 had been randomly assigned to the threat condition and 5 had been randomly assigned to the no-threat condition (the final sample size per condition was: No threat, n = 26; Threat, n = 29). The analyses presented below were conducted on a sample of 55 participants (41 female, 14 male).[5]

*Predictor and Dependent Variable Characteristics*

Data were screened for missing values, data entry errors as well as univariate and multivariate outliers (Tabachnick & Fiddell, 2007). Scales were also checked for skewed distributions and all scales were found to be acceptable. The reliability estimates for all of the scales were satisfactory (alphas $\geq$ .79; Nunally, 1978).[6] Table 1 displays the descriptive statistics and intercorrelations among the individual difference and dependent measures.

To test that the random assignment of participants to experimental condition was effective, independent samples t-tests were performed on the individual difference variables. As expected, there were no significant differences between the threat and no threat experimental conditions for competition contingency $t(53) = -.98, p > .05$ (two tailed); global self-esteem $t(53) = 1.50, p > .05$ (two tailed) and negative affectivity $t(53) = -.44, p > .05$ (two tailed), indicating that random assignment of these individual differences to condition was effective.

*Self-Esteem Threat Manipulation Check*

To test the effectiveness of the threat manipulation, an independent samples t-test was performed on the manipulation check item. As expected, participants in the self-esteem threat condition reported poorer performance on the memo writing task ($M = 2.34, SD = 1.01$) than those in the no threat condition ($M = 4.35, SD = .75; t(53) = 8.28, p < .05$ (two tailed), indicating that the threat manipulation was effective.[7]

*Description of Analyses to Test Hypotheses*

Moderated multiple regression was used to test the main and secondary hypotheses. As recommended by Aiken and West (1991), in all analyses, self esteem

threat was dummy-coded (no threat = 0, threat = 1) and all continuous variables (i.e., competition contingency, global self-esteem, and negative affectivity) were centered before computing relevant interaction terms. Standardized regression coefficients are not easily interpretable in analyses containing interaction terms, therefore, the unstandardized regression coefficients from the analyses are presented (see Aiken & West, 1991, pp. 40-43).

To review, I expected a two-way interaction between competition contingency and self-esteem threat on both the interpersonal and informational components of interactional justice (Hypothesis 1). I also expected a three-way interaction between competition contingency, self-esteem threat, and global self-esteem (Hypothesis 2) and a three-way interaction between competition contingency, self-esteem threat, and negative affectivity (Hypothesis 3). A series of moderated multiple regression analyses were conducted on the two dependent variables (informational justice and interpersonal justice) to test these hypotheses.

*Test of Hypothesis 1*

To test Hypothesis 1, I examined the two-way interaction between competition contingency and self-esteem threat on interpersonal justice and on informational justice. Table 2 displays the unstandardized regression coefficients from the analyses. As seen in the table, when the predictors were regressed on interpersonal justice, no significant main effects emerged, although the trend for the threat manipulation was in the right direction ($B = -.38, p = .13$). Most importantly and contrary to expectations, the two-way interaction between self-esteem threat and competition contingency was not significant ($B = -.05, p > .05$).

When informational justice was regressed on the predictors, a significant main effect of self-esteem threat was found ($B = -.70, p < .05; R^2 = .09$). Participants who received threatening (vs. non-threatening) feedback displayed less informational justice when providing the subordinate with performance feedback. Contrary to expectations, the two-way interaction between self-esteem threat and competition contingency was not significant ($B = -.03, p > .05$). Thus, Hypothesis 1 was not supported.

*Test of Hypothesis 2*

To test Hypothesis 2, I tested for the three-way interaction between competition contingency, self-esteem threat, and global self-esteem on interpersonal justice and on informational justice. The unstandardized regression coefficients from the analysis are presented in Table 3. As seen in the table, when interpersonal justice was regressed on the predictors, no significant main effects or interactions emerged. Most importantly, the expected three-way interaction between global self-esteem, competition contingency, and threat was not significant ($B = -.18, p > .05$).

When informational justice was regressed on the predictors, a significant main effect of self-esteem threat was found ($B = -.82, p < .05; R^2 = .09$); participants who received threatening (vs. non-threatening) feedback were rated lower on informational justice when communicating feedback to the subordinate. A significant two-way interaction between global self-esteem and threat was also found ($B = .72, p < .01; R^2 = .07$). Figure 1 illustrates the pattern of results. Specifically, the manipulation of self-esteem threat had a greater impact on individuals with low (vs. high) global self-esteem such that they displayed less informational justice in the threat (vs. no threat) condition. In contrast, those with high self-esteem appeared unaffected by the threat manipulation.

As expected, a significant three-way interaction also emerged ($B = -.65, p < .05$; $R^2 = .08$). Figure 2 illustrates this pattern of results. Simple main effect analyses, as outlined by Aiken and West (1991), were conducted to test for the effect of the threat manipulation at various combinations of global self-esteem and competition contingency. Values for high and low levels of the individual difference variables were chosen at one standard deviation above and below their centered scale means, respectively. The only significant effect of the threat manipulation occurred for individuals low in global self-esteem and low in competition contingency ($B = -2.60, p < .05$). Under conditions of threat (versus no threat), individuals whose self-esteem is less contingent on competition and who are low in global self-esteem displayed lower levels of informational justice. This pattern of results was unexpected and does not support Hypothesis 2. I expected that individuals high in both global self-esteem and competition contingency would be most responsive to the threat manipulation. Contrary to expectations, the results show that the self-esteem threat had the strongest effect on individuals low in global self-esteem who did not base their self-worth in competition.

*Test of Hypothesis 3*

To test Hypothesis 3, I examined the three-way interaction between competition contingency, self-esteem threat, and negative affectivity on interpersonal justice and on informational justice. The unstandardized regression weights from the analysis are presented in Table 4. When interpersonal justice was regressed on the predictors, no significant main effects or interactions emerged. Most importantly, the expected three-way interaction between competition contingency, self-esteem threat, and negative affectivity did not emerge. ($B = -.07, p > .05$)

When informational justice was regressed on the predictors, a significant main effect of self-esteem threat was found ($B = -.88$, $p < .05$; $R^2 = .11$) and was similar to the pattern described earlier. A significant two-way interaction between negative affectivity and threat was also found ($B = -1.17$, $p < .05$; $R^2 = .07$). Specifically, the manipulation of self-esteem threat had a greater impact on individuals with high (vs. low) negative affectivity such that they displayed less informational justice in the threat (vs. no threat) condition. In contrast, those with low negative affectivity appeared unaffected by the threat manipulation. Figure 3 illustrates this pattern of results. No additional significant effects emerged. Most importantly, the expected three-way interaction between competition contingency, self-esteem threat and negative affectivity did not emerge (B = .75, $p > .05$).

## Discussion

The current study sought to add insight into the causes of manager displays of interactionally unfair behaviour toward subordinates. Although a great deal of attention has been paid to the consequences of interactional injustice, few studies have attempted to address experimentally the antecedents of unfair interpersonal treatment. The present study adds to the literature on interactional justice and self-esteem by considering the role of manager self-esteem in displays of interactional justice. Specifically, I hypothesized that managers who experience threats to their self-esteem in a valued domain (competition) will react by displaying interactionally unjust behaviour toward an available target and that this pattern would be stronger for those with high global self-esteem and those with high negative affectivity. The findings of the study did not provide support for these hypotheses; however, some interesting findings did emerge.

As noted above, Hypothesis 1 was not supported. There was no interaction between competition contingency and self-esteem threat for predicting either interpersonal or informational injustice. However, the self-esteem threat manipulation did impact managers' informational justice behaviour toward a subordinate. Specifically, participants who received threatening (vs. non-threatening) performance feedback displayed less informational justice when providing a subordinate with negative feedback. This effect, however, did not emerge on the measure of interpersonal justice.

There are a number of potential reasons the effect of self-esteem threat was found for informational justice and not interpersonal justice. For example, indicators of informational justice, which deal with justification and degree of detail provided about procedures, may be more objective and easier to discern than indicators of interpersonal justice, which deal with more subjective concepts such as dignity and respect. It is possible that the confederate found it difficult to rate interpersonal justice, resulting in less variability for the interpersonal justice measure. Although an effect was not found, the pattern of ratings on the interpersonal justice measure was in the right direction, with individuals in the threat condition displaying marginally lower levels of interpersonal justice.

Additionally, the fact that the feedback session between the participant and the "subordinate" was tape recorded may have made participants less likely to engage in disrespectful, rude, or other interpersonally unjust behaviours. Interpersonally unjust behaviour may be less socially acceptable than informationally unjust behaviour. Thus, participants, being aware that they were being audio recorded, may have been more likely to opt for withholding information rather than treating someone in a more overtly rude

manner. Although Hypothesis 1 was not supported, the effect of self-esteem threat on manager displays of informational justice in this context is a novel finding. Interestingly, displays of informational injustice following self-esteem threat were directed at targets that were not the source of the original threat. This finding is consistent with past research showing that reactions to threat are often directed at a convenient target and not necessarily the cause of the threat (Hoobler, & Brass, 2006).

Hypothesis 2 was also not supported. Although global self-esteem moderated the relationship between self-esteem threat and competition contingency, the pattern revealed by the data was not as expected. I anticipated that global self-esteem would moderate the relationship between self-esteem threat and competition contingency in predicting manager displays of interactional justice such that the more managers base their self-worth in competition, the more likely they are to display interactional injustice following a threat to their self-esteem and that this pattern would be stronger for individuals with high global self-esteem (vs. low global self-esteem). Contrary to expectations, individuals high in global self-esteem who based their self-esteem in competition did not react to self-esteem threat by displaying less interactional justice. Although Hypothesis 2 was not supported, some interesting effects did emerge from the analysis testing the three-way interaction including global self-esteem, self-esteem threat, and competition contingency on informational justice.

The analysis revealed that it was in fact individuals low in self-esteem who seemed to react most strongly to the self-esteem threat manipulation. In particular, individuals with low global self-esteem who did not base their self-esteem in competition were most affected by the self-esteem threat manipulation, such that those in the threat

condition displayed lower levels of informational justice compared to those in the no threat condition. Although I predicted that individuals high in global self-esteem would be impacted most strongly (Baumeister, et al., 1996), the self-esteem literature does present mixed findings regarding the behaviour of individuals with low versus high global self-esteem. Some research has noted a tendency for individuals with low self-esteem to attempt to exit situations in which they have experienced threat, in an effort to avoid further threat (Baumeister, 1993). If individuals low in self-esteem and low in competition contingency were in fact threatened by the manipulation in this study, they may have been focused on exiting the situation during the communication of feedback to the subordinate. An individual attempting to exit a situation is far more likely to be focused on brevity than on displaying informationally just behaviours such as providing a subordinate with thorough and reasonable explanations.

Although the above logic does not explain why individuals low in global self-esteem and high in competition contingency did not respond similarly to the threat manipulation, it is possible that the manipulation utilized in this study was not as clean a threat to competition-based self-esteem as intended. The threat manipulation may have contained an aspect of approval (vs. disapproval), which may explain why it was the individuals with low competition contingency who did not base a great deal of their self-worth in competition who reacted to the threat. Individuals who do not gain self-worth through competition may gain self-worth from other domains, for example others' approval or academic achievement (Crocker et al., 2002). It may be that individuals who do not base their self-esteem in competition, base their self-esteem in another domain that the threat manipulation used in this study tapped into.

The lack of reaction to the threat manipulation by individuals who base their self-esteem in competition could also be due to the fact that these individuals did not perceive the manipulation as particularly threatening. The memo writing task on which participants received the threat manipulation feedback may not have been important or involving enough for those high in competition to care about; this could have contributed to these individuals not perceiving the manipulation as overly threatening. In a related vein, it is also possible that the manipulation was not perceived as threatening by individuals high in competition contingency because they may not have viewed the task as an opportunity to compete, which may have lessened the impact of the threatening feedback. Indeed, participants were told that they would be receiving feedback on a task but they were not informed that their performance would be compared with the performance of others. Participants' performance was only overtly compared to the performance of others at one point during the study, which occurred when they actually received feedback. This competition induction was likely too weak to induce a reaction from highly competition-contingent individuals. Additionally, participants had very little information regarding the individuals they were being compared to. Being compared to an unknown group may be less threatening because it leaves the participant open to make inferences about the reference group that may allow the participant to justify the feedback they received. For example, the participant was free to assume that the individuals that they were being compared to had a great deal more experience writing memos than they did, therefore justifying their poor performance in relation to the others who, being more practiced, would be expected to perform better at the task. A situation that provided participants a clear opportunity to compete against a visible target may have provided a

more effective paradigm in which to test my hypotheses. Future research is needed to address these issues before any firm conclusions can be drawn concerning the role of competition contingency.

Finally, the results of the study did not show support for Hypothesis 3. Contrary to expectations, participants' level of negative affectivity did not moderate the relationship between self-esteem threat and competition contingency in predicting manager displays of interactional justice. I anticipated that negative affectivity would moderate the relationship between self-esteem threat and competition contingency in predicting manager displays of interactional justice in the same way I proposed that global self-esteem would moderate the competition contingency by self-esteem threat relationship. Specifically, I predicted that the more managers base their self-worth in competition, the less likely they are to display interactional justice following a threat to their self-esteem and that this pattern would be stronger for individuals high (vs. low) in negative affectivity.

Although Hypothesis 3 was not supported, some interesting findings did emerge. A two-way interaction between negative affectivity and self-esteem threat was found such that managers who experienced a self-esteem threat (versus no threat) displayed lower levels of informational justice toward the subordinate if they were high in negative affectivity. This finding is consistent with past literature suggesting that individuals high in negative affectivity tend to be more responsive to events that generate negative emotions (Larsen & Katelaar, 1991) and that they are more likely to engage in inimical behaviour (Aquino, et al., 1999; Watson & Clark, 1984). It is therefore not surprising that individuals high in negative affectivity were more responsive to the self-esteem threat

manipulation, displaying less informational justice when threatened (as compared to individuals who did not experience threat). Taken together, the results of this research suggest that threats to self-esteem do impact managers' fairness behaviours and that this may be particularly true for certain personality types (e.g., those with low global self-esteem and/or high negative affectivity).

*Limitations of Current Research*

Some limitations of the present research should be noted. Firstly, as already noted, some potential weaknesses regarding the manipulation of competition-based self-esteem threat utilized in the current study should be considered. The current manipulation may have included contingencies other than competition, such as others' approval. Future research should attempt to devise a more pure contingent self-esteem threat that threatens only one area of self-esteem.

Secondly, the study utilized a laboratory-based experimental design; thus, the generalizability of the present findings is unclear. Indeed, the careful control afforded in laboratory-based experimental research is typically offset by the loss of generalizability to external settings. Generalizability in this study was aided by the use of an elaborate cover story and engaging tasks that allowed participants to become involved in their role as a manager. The development of a convincing cover story also reduced the chance of demand characteristics impacting results and aided in preventing participants from hypothesis guessing. It is unlikely that participants were able to anticipate the hypotheses considering the complex interactions that were predicted and the fact that individual difference measures were recorded a week prior to the main study session. Additionally,

participants were probed for suspicion after completing the study as a final check against demand characteristics.

Although efforts were made to increase the realism of the current study, the sample of participants also contributes to concerns regarding the generalizability of the current findings. The study was conducted with a small and relatively homogeneous sample of undergraduate students. This sample is not an accurate representation of the general population of managers; participants in this study are likely considerably younger and have far less experience managing people than the average manager. Thus, it is unclear whether the present findings would emerge using a sample of managers in organizations.

There are, however, a number of reasons to expect a similar or even stronger pattern of findings to emerge with managers in organizational settings. For example, one might expect the impact of self-esteem threat to be even stronger for working managers than it was for participants in the current study. Indeed, opportunities for self-esteem threat are likely plentiful within organizations and such threats may have greater personal relevance for working managers. Having a suggestion or idea ignored or shot down, missing a deadline, or losing a sale are instances that are likely perceived as threatening to managers' self-worth and may result in much more serious consequences (e.g., lack of promotion or merit pay, reprimand) for the manager than the consequences of self-esteem threat felt by participants in the current study.

Another aspect of the study that limits generalizability is the fact that the participant did not personally know the confederate. Of course, in organizations, managers are likely more familiar, and have a relationship, with their subordinates. It is

possible that the fact that the subordinate in the current study was unknown to the participant made the participant more likely to display interactionally just behaviour. Individuals may be more cautious in interactions with strangers because they have no knowledge of how strangers might react in a given situation. It is also possible that the individuals might be more concerned with making a good impression on someone they were encountering for the first time (Tice, Butler, Muraven, & Stillwell, 1995). Of course, as noted earlier, participants in the current study may also have been on their best behaviour because their interaction with the subordinate was audio-taped. In an organizational setting, one might expect a manager to treat a subordinate with less interactional justice as the manager may be less concerned with making a favourable impression and be more able to anticipate possible employee reactions. Moreover, interactions between managers and subordinates may also be more private, possibly facilitating greater injustice.

Although the logic presented above increases my confidence that the current findings would extend to managers in organizational settings, future research should replicate the findings of the current study using a sample of managers in organizations to ensure this conclusion.

*Possible Practical Implications of Current Research and Future Research Directions*

These findings, taken together, have potential practical implications for organizations. Identifying potential causes of injustice is the first step toward developing interventions aimed at reducing its incidence in the workplace. Specifically, with respect to the present study, awareness that self-esteem threat may lead to lower interactional justice, and that particular personality types may be more susceptible to the effects of

threat, may be valuable in the development of preventative interventions. Increasing

managers' awareness of potential threats and antecedents of interactional injustice may

help managers to avoid treating employees in interactionally unfair ways. For example,

by making managers aware of threats that may impact their behaviour, managers may be

able to exert more control over their reactions to use more positive ways of dealing with

threatened self-worth, for example, through self-affirmation by focusing on positive

characteristics of the self (Harris, Mayle, Mabbott & Napper, 2007).

A more general intervention to increase justice in the workplace could involve

managerial training in interactional justice. Indeed, research suggests that it may be

possible to train managers to display interactionally just behaviours such as

demonstrating emotional support, treating others with dignity and respect, and spending

the time needed to explain decisions (Greenberg, 2006; Skarlicki & Latham, 2005).

Training may also facilitate a greater appreciation for the negative effects associated with

employee perceptions of injustice and may ultimately provide managers with a broader

repertoire of behaviours to draw on when interacting with subordinates. In general,

determining ways to promote fairness behaviour in managers is of paramount importance

because of the host of negative consequences for both individuals and organizations

associated with managerial unfairness.

To move toward possible interventions based on the focus of the current research,

some improvements could be made to the current study to test more accurately the threat

of specific domains so that the relationship between self-esteem contingencies, relevant

self-esteem threat and interactional injustice can be more fully explored. Future research

should also consider the addition of a third neutral experimental condition in which

participants receive no or neutral feedback. Indeed, for reasons already noted, the no threat condition used in the current study involved providing positive feedback to participants. It is possible that for some individuals (i.e., those low in global self-esteem and those high in negative affectivity), this condition boosted their self-esteem leading to more informational justice than would be seen in a more neutral feedback condition. This alternative interpretation of the effect of the threat manipulation does merit consideration; including a no feedback condition in future research would allow researchers to better understand how various levels of self-esteem threat affect displays of interactional justice.

Future research should also attempt to identify the mechanisms underlying the behaviours observed in the current research. Although the findings of this study suggest that self-esteem threat does impact justice behaviour, there are many mediating mechanisms that may have been at play. For example, withholding information and being curt in communications may have been an attempt to derogate the status of the confederate to bolster participants' own self-image (Pelham, 1991; Schutz, 1998). It is also possible that the threatening feedback simply induced a negative mood state which resulted in participants becoming more inwardly focused and less concerned about the feelings of the confederate (e.g., Green, Sedikides, Saltzberg, Wood, & Forzano, 2003).

*Conclusion*

Although the main hypotheses did not receive full support, the results of the current study are promising. The findings suggest that self-esteem threat impacts managers' fairness behaviours and this may be particularly true for certain personality types (e.g., those with low self-esteem and/or high negative affectivity). These findings

add to the literatures on interactional justice and self-esteem, and contribute to our understanding of causes of manager fairness behaviour. Ultimately, research on antecedents of interactional injustice in the workplace should become the foundation for the creation of interventions designed to reduce the incidence of injustice in work settings.

# References

Aiken, L. S., & West, S. G. (1991). *Multiple regression: Testing and interpreting interactions*. Newbury Park. CA: Sage Publications.

Ambrose, M. L., Seabright, M. A., & Schminke, M. (2002). Sabotage in the workplace: The role of organizational injustice. *Organizational Behaviour and Human Decision Making Processes, 89,* 947-965.

Aquino, K., & Douglas, S. (2003). Identity threat and antisocial behavior in organizations: The moderating effects of individual differences, aggressive modeling, and hierarchical status. *Organizational Behaviour and Human Decision Processes, 90,* 195-208.

Aquino, K., Lewis, M. U., & Bradfield, M. (1999). Justice constructs, negative affectivity and employee deviance: A proposed model and empirical test. *Journal of Organizational Behaviour, 20,* 1073-1091.

Barling, J., & Phillips, M. (1993). Interactional, formal and distributive justice in the workplace: An exploratory study. *Journal of Psychology: Interdisciplinary and Applied, 127,* 649-656.

Barrett-Howard, E., & Tyler, T. R. (1986). Procedural justice as a criterion in allocation decisions. *Journal of Personality and Social Psychology. 50,* 296-304.

Baumeister, R. F. (1993). *Self-esteem: The puzzle of low self-regard.* New York, NY: Plenum.

Baumeister, R. F. (2001). Ego depletion, the executive function, and self-control: An energy model of the self in personality. In B. W. Roberts & R. Hogan (Eds.),

*Personality psychology in the workplace* (pp. 299-316). Washington, DC: American Psychological Association.

Baumeister, R. F., Bushman, B. J., & Campbell, W. K. (2000). Self-esteem, narcissism, and aggression: Does violence result from low self-esteem or from threatened egotism? *Current Directions in Psychological Science, 9,* 26-29.

Baumeister, R. F., Smart, L., & Boden, J. M. (1996). The relationship of threatened egotism to violence and aggression: The dark side of high-self-esteem. *Psychological Review, 103,* 5-3.

Bushman B. J., & Baumeister, R. F. (1998). Threatened egotism, narcissism, self-esteem, and direct and displaced aggression: Does self-love or self-hate lead to violence? *Journal of Personality and Social Psychology, 75,* 219-229.

Berkowitz, L. (1993). *Aggression: It's causes, consequences and control.* Philadelphia, PA: Temple University Press.

Bies, R. J. (2001). International (in)justice: The sacred and the profane. In J. Greenberg, & R. Cropanzano (Eds.), *Advances in organizational justice* (pp. 89-118). Stanford, CA: Stanford University Press.

Bies, R. J. (2005). Are procedural justice and interactional justice conceptually distinct? In J. Greenberg, & J.A. Colquitt (Eds.), *Handbook of organization justice* (pp. 85-112). Mahwah, NJ: Lawrence Erlbaum Associates Publishers.

Bies, R. J., & Moag, (1986). Interactional justice: Communication criteria of fairness. In R. J. Lewicki, B. H. Sheppard, & M. H. Bazerman (Eds.). *Research on Negotiation in Organizations* (pp. 43-55). Greenwich, CT:JAI Press.

Bobocel, D. R., & Holmvall, C. M. (2001). Are interactional and procedural justice

    different? Framing the debate. In S. Gilliland, D. Steiner, & D. Skarlicki (Eds.),

    *Research on social issues in management, Vol. 1* (pp. 85-105). Greenwich, CT:

    Information Age Publishing.

Cohen-Charash, Y., & Spector. P. E. (2001). The role of justice in organizations: A meta-

    analysis. *Organizational Behavior and Human Decision Processes, 86*, 278-321.

Colquitt, J. A. (2001). On the dimensionality of organizational justice: A construct

    validation of a measure. *Journal of Applied Psychology, 86*, 386-400.

Colquitt, J. A., Conlon, D. E., Wesson, M. J., Porter, C. O., & Ng, K. Y. (2001). Justice at

    the millennium: A meta-analysis of 25 years of organizational justice research.

    *Journal of Applied Psychology, 86*, 425-445.

Colquitt, J.A., & Greenberg, J. (2003). Organizational justice: A fair assessment of the

    state of the literature. In J. Greenberg (Ed.), *Organizational behavior: The state of

    science 2nd Ed.* (pp. 165-210). Mahwah, NJ: Lawrence Erlbaum Associates

    Publishers.

Coopersmith, S. (1967). *The antecedents of self-esteem.* San Fransico CA: W. H.

    Freeman.

Crocker, J. (2002). Contingencies of self-worth: Implications for self-regulation and

    psychological vulnerability. *Self and Identity. 1*, 143-149.

Crocker, J., & Knight, K. (2005). Contingencies of self-worth. *Current Directions in

    Psychological Science, 14*, 200-203.

Crocker, J., & Luhtanen, R. K. (2003). Level of self-esteem and contingencies of self-

worth: Unique on academic, social and financial problems in college students.

*Personality and Social Psychology Bulletin, 29*, 701-712.

Crocker, J., & Luhtanen, R. K., Cooper, L. M., & Bouvrette, A. (2003). Contingencies of

self-worth in college students: Theory and measurement. *Journal of Personality*

*and Social Psychology, 85*, 894-908.

Crocker, J., Sommers, S. R., & Luhtanen, R. K. (2002). Hopes dashed and dreams

fulfilled: Contingencies of self-worth and admissions to graduate school.

*Personality and Social Psychology Bulletin. 28*, 1275-1286.

Crocker, J., & Wolfe, C. (2001). Contingencies of self-worth. *Psychological Review, 108*

593-623.

Elovainio, M., Kivimaki, M., Puttonen, S., Lindholm, H., Pohjonen, T., & Sinervo, T.

(2006). Organizational injustice and impaired cardiovascular regulation among

female employees. *Occupational Environmental Medicine, 63*, 252-144.

Eysenck, H., & Gudjonsson, G. (1989). *The causes and cures of criminality*. New York,

NY: Plenum Press.

Folger, R., & Pugh, D. S. (2002). The just world and Winston Churchill: An approach/

avoidance conflict about psychological distance when harming victims. In M.

Ross, & D. T. Miller (Eds.), *The justice motive in everyday life* (pp. 168-185).

New York, NY: Cambridge University Press.

Folger, R., & Skarlicki, D. (1998). When tough times make tough bosses: Managerial

distancing as a function of layoff blame. *Academy of Management Journal. 41*,

70-87.

Folger, R. & Skarlicki, D (2001). Fairness as a dependent variable: Why tough times can

lead to bad management. In R. Cropanzano (Ed.), *Justice in the Workplace: From*

*theory to practice volume 2* (pp. 97-118). Mahwah, NJ: Lawrence Erlbaum

Associates.

Graetz, H. G. (1977). Verbal behavior and managerial effectiveness of supermarket store

managers. *The Journal of Psychology, 97,* 257-268.

Green, J. D., Sedikides, C., Saltzberg, J. A., Wood, J. V., & Forzano, L. B. (2003). Happy

mood decreases self-focused attention. *British Journal of Social Psychology, 42,*

147-157.

Greenberg, J. (1990). Employee theft as a reaction to underpayment inequity: The

hidden cost of pay cuts. *Journal of Applied Psychology, 75,* 561-568.

Greenberg, J. (1993). The social side of fairness: Interpersonal and informational classes

of organizational justice. In R.Cropanzano (Ed.), *Justice in the workplace:*

*Approaching fairness in human resource management* (pp. 79–103). Hillsdale,

NJ: Erlbaum.

Greenberg, J. (2006). Losing sleep over organizational injustice: Attenuating insomniac

reactions to underpayment inequity with supervisory training in interactional

justice. *Journal of Applied Psychology, 91,* 59-69.

Harris, P. R., Mayle, K., Mabbott, L., & Napper, L. (2007). Self-affirmation reduces

smokers' defensiveness to graphic on-pack cigarette warning labels. *Health*

*Psychology, 26,* 437-446.

Heatherton T. F., & Vohs, K. D. (2000). Interpersonal evaluations following threats to self: Role of self-esteem. *Journal of Personality and Social Psychology, 78*, 725-736.

Heaven, P. C. L. (1996). Personality and self-reported delinquency: Analysis of the "Big Five" personality dimensions. *Personality and Individual Differences, 20*, 47-54.

Hoobler, J. M., & Brass, D. J. (2006). Abusive supervision and family undermining as displaced aggression. *Journal of Applied Psychology, 91*, 1125-1133.

James, W. (1890). *The principles of psychology* Vol. 1. Cambridge, MA: Harvard University Press.

Judge, T. (1993). Does affective disposition moderate the relationship between job satisfaction and turnover? *Journal of Applied Psychology, 78*, 395-401.

Judge, T., & Colquitt, J.A. (2004). Organizational justice and stress: The mediating role of work-family conflict. *Journal of Applied Psychology, 89*, 395-404.

Korsgaard, M. A., Roberson, L., & Rymph, R. D. (1998). What motivates fairness? The role of subordinate assertive behaviour on manager's interactional fairness. *Journal of Applied Psychology, 83*, 731-744.

Larsen, R. J., & Katelaar, T. (1991). Personality and susceptibility to positive and negative emotional states. *Journal of Personality and Social Psychology, 61*, 132-140.

Leventhal, G. S. (1980). What should be done with equity theory? New approaches to the study of fairness in social relationships. In: K. J., Gergen, M. S., Greenberg, &

R.H., Willis (Eds.), *Social exchange: Advances in theory and research* (pp. 27-53). New York, NY: Plenum Press.

Lind E. A., & Tyler, T. R. (1988). *The Social Psychology of Procedural Justice*. New York, NY: Plenum Press.

Luhtanen, R. K., & Crocker, J. (2005). Alcohol use in college students: Effects of level of self-esteem, narcissism and contingencies of self-worth. *Psychology of Addictive Behaviours, 19,* 99-103.

Masterson, S. S., Lewis, K., Goldman, B. M., & Taylor, S. (2000). Integrating justice and social exchange: The differing effects of fair treatment on work relationships. *The Academy of Management Journal,43,* 739-748.

Mikula, G. (1986). The experience of injustice: Toward a better understanding of its phenomenology. In H. W. Bierhoff, R. L., Cohen, & J. Greenberg (Eds.), *Justice in Social Relations.* (pp. 103-124) New York: Plenum.

Mikula, G., Petri, B., & Tanzer, N. (1990). What people regard as unjust: Types and structures of everyday experiences of injustice. *European Journal of Social Psychology, 20,* 133-149.

Miller, D. (2001). Disrespect and the experience of injustice. *Annual Psychological Review (2001), 52,* 527-553.

Nunally, J.C. (1970) *Introduction to Psychological Measurement*. New York, NY: McGraw-Hill.

Pelham, B. W. (1991). On the benefits of misery: self-serving biases in the depressive self-concept. *Journal of Personality and Social Psychology, 61,* 670-681.

Reave, L. (2005). Spiritual values and practices related to leadership effectiveness. *Leadership Quarterly, 16,* 655-687.

Rosenberg, M. (1965). *Society and the adolescent self-image.* Princeton, NJ: Princeton University Press.

Ruben, M. & Hewstone, M. (1998). Social identity theory's self-esteem hypothesis: A review and some suggestions for clarification. *Journal of Personality and Social Psychology Review, 2,* 40-62.

Sargent, J. T., Crocker, J., & Luhtanen, R. K. (2006). Contingencies of self-worth and depressive symptoms in college students. *Journal of Social and Clinical Psychology, 25,* 628-646.

Sedikides, C., Herbst, K. C., & Hardin, D. P. (2002). Accountability as a deterrent to self-enhancement: The search for mechanisms. *Journal of Personality and Social Psychology. 83,* 592-605.

Schmitt, M., & Dorfel, M. (1999). Procedural injustice at work, justice sensitivity, job satisfaction and psychosomatic, well being. *European Journal of Social Psychology. 29,* 443-453.

Schutz, A. (1998). Coping with threats to self-esteem: The differing patterns of subjects with high versus low trait self-esteem in first-person accounts. *European Journal of Personality, 12,* 169-186.

Skarlicki, D. P., & Folger, R. (1997). Retaliation in the workplace: Roles of distributive, procedural and interactional justice. *Journal of Applied Psychology, 82,* 434-443.

Skarlicki, D. P., Folger, R., & Tesluk, P. (1999). Personality as a moderator in the relationships between fairness and retaliation. *Academy of Management Journal, 42*, 100-108.

Skarlicki, D. P., & Latham, G. P. (2005). How can training be used to foster organizational justice? In J. Greenberg, & J.A. Colquitt (Eds.), *Handbook of organization justice* (pp. 499-522). Mahwah, NJ: Lawrence Erlbaum Associates Publishers.

Spector P. E., & Fox, S. (2002). An emotion-centered model of voluntary work behavior: Some parallels between counterproductive work behavior and organizational citizenship behavior. *Human Resource Management Review, 12,* 269-292.

Street, S., & Isaacs, M. (1998). Self-esteem: Justifying its existence. *Professional School Counseling. 1,* 46-50.

Tice, D. M. (1993). The social motivations of people with low self-esteem. In R. F. Baumeister (Ed.), *Self-esteem: The puzzle of low self-regard.* (pp. 37-53) New York, NY: Plenum Press.

Tice, D. M., Butler, J. L., Muraven, M. B., & Stillwell, A. M. (1995). When modesty prevails: Differential favorability of self-presentation to friends and strangers. *Journal of Personality and Social Psychology. 69,* 1120-1138.

Tepper B. J., (2000). Consequences of Abusive Supervision. *Academy of Management Journal, 43,* 178-190.

Tepper, B. (2001). Health consequences of organizational injustice: Tests of main and interactive effects. *Organizational Behaviour and Human Decision Processes, 86,* 197-215.

Tepper, B. J., Duffy, M. K., Henle, C. A., & Lambert, L. S., (2006). Procedural injustice, victim precipitation and abusive supervision. *Personnel Psychology, 59*, 101-123.

Thibault, J. & Walker, L. (1975). *Procedural justice: A psychological analysis*. Hillsdale, NJ: Erlbaum.

Tabachnick, B. G., & Fidell, L. S. (2007). *Using Multivariate Statistics, 5th ed.* Boston, MA: Allyn & Bacon Pearson Education.

Watson, D., Clark, A. L., (1984) Negative affectivity: The disposition to experience aversive emotional states. *Psychological Bulletin, 96*, 465-490.

Watson, D., Clark, A. L., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scales. *Journal of Personality and Social Psychology, 54*, 1063-1070.

Wiesenfeld, B. M., Brockner, J., & Thibault, V. (2000). Procedural fairness, managers' self-esteem and managerial behaviours following a layoff. *Organizational Behaviour and Human Decisions Processes, 83*, 1-32.

Wood, J. V., Giordano-Beech, M., Taylor, K. L. (1994) Strategies of social comparison among people with low self-esteem: Self-protection and self-enhancement. *Journal of Personality and Social Psychology, 67*, 713-731.

Zeigler-Hill, V. (2006). Contingent self-esteem and the interpersonal circumplex: The interpersonal pursuit of self-esteem. *Personality and Individual Differences, 40*, 713-723.

## Footnotes

1. Because participants believed that two participants would be scheduled for each session 2 time slot, but only one was actually needed (one participant and one confederate), participants were told that volunteers who were in the same session 1 testing group were not allowed to be scheduled together for the second session. The researcher explained that this rule was in place to try to avoid the possibility of participants in session 2 knowing each other.

2. After the first 9 participants had been run, additional verbal instructions were added before participants completed the grading task to remind them of their role in the simulation. The additional instructions were as follows, "As a manager you are responsible for quality control in your department. Part of this responsibility includes evaluating work produced by the employees you supervise. This is a Group Insurance Report prepared by one of your employees."

3. A typo existed in the dependent measure items such that the four items comprising the interpersonal justice measure were presented with the incorrect tense. For example, the word treated was erroneously used in place of the word treat for the item "Did (he/she) treat you in a polite manner?" Given the nature of the error and the thoroughness of the training that the confederate completed, I am confident that the typo did not affect the validity of the dependent measure.

4. Two other participants graded the report task as good. Because these two participants did not emerge as outliers in any of the analyses and because they still indicated three or four pieces of missing information to give feedback on, these participants were not removed from the analyses. If these two participants

are removed from the analyses, the direction of effects remain the same, however all significant effects become marginally significant. Twelve participants graded the report task as average. The average rating was one rating higher than the correct grade category (i.e. Poor). These twelve individuals were retained because these individuals still indicated five or six pieces of missing information to give feedback on and their deletion would result in a significant reduction in sample size.

5. Gender was not a confound in the current study; it was distributed fairly evenly across the two experimental conditions (Threat: males = 8, females = 21, No Threat: males = 6, females = 21). Including gender as a control variable in the analyses does not significantly alter any of the results.

6. The taped feedback sessions were used by an independent rater to test the reliability of the confederate justice ratings. The reliability of the informational justice and interpersonal justice scales for the second rater scores were acceptable at $\alpha = .86$ and $= \alpha = .87$, respectively. Significant, though moderate, correlations were found between the two raters on both the interpersonal justice scale ($r = .37$, $p < .01$) and the informational justice scale ($r = .47$, $p < .01$). Although these correlations are significant they are not as high as might be expected. It is likely that the discrepancy is mainly due to the fact that by rating the participants based on only verbal information, the second rater had only partial information on which to judge the items. The original confederate had additional non-verbal cues that would have been incorporated into her scoring of the scales. The availability of non-verbal cues is particularly relevant for the interpersonal justice scale,

which includes less objective indicators that may be heavily influenced by body language. For example, feeling that you were treated with dignity or respect may be heavily influenced by the amount of eye contact maintained during an interaction.

7. In order to ensure that the threat manipulation did not differ across any of the individual difference variables, all major regression analyses were run with the manipulation check item as the dependent variable. For the analysis testing the two-way interaction of competition contingency and threat, only a significant main effect of threat was found on the manipulation check item ($B = -2.06$, $p < .001$). In addition, and as expected, a significant main effect of self-esteem threat was the only effect found in the analyses to test the three way interactions between competition contingency, threat and global self-esteem ($B = -1.98$, $p < .001$) and competition contingency, threat, and negative affectivity ($B = -2.03$, $p < .001$).

Table 1

*Means, Standard Deviations, and Intercorrelations among the Individual Difference and Dependent Variables*

| Variable | M | SD | Correlations | | | | |
| | | | 1 | 2 | 3 | 4 | 5 |
| --- | --- | --- | --- | --- | --- | --- | --- |
| 1. Informational Justice | 3.21 | 1.19 | (.79) | | | | |
| 2. Interpersonal Justice | 5.79 | .92 | .48** | (.87) | | | |
| 3. Competition Contingency | 4.69 | 1.15 | -.12 | -.22 | (.88) | | |
| 4. Global Self-Esteem | 5.18 | 1.09 | .30* | .16 | -.31* | (.93) | |
| 5. Negative Affectivity | 2.04 | .67 | -.24 | -.13 | .45** | -.63** | (.84) |

*Note.* N = 55. Internal consistency reliabilities are given in parentheses on the diagonal. Items in all measures, with the exception of the scale measuring negative affectivity, were assessed on 7-point scale. Negative affectivity was assessed on a 5-point scale. All scales are re-coded such that higher numbers reflect more of the construct.

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

Table 2

*Unstandardized Regression Coefficients (Bs) for the Simultaneous Regression of the*

*Dependent Variables on Competition Contingency and Self-Esteem Threat*

| | Dependent Variable | | | |
| --- | --- | --- | --- | --- |
| | Interpersonal Justice | | Informational Justice | |
| Variable | B | SE B | B | SE B |
| Competition Contingency | -.14 | .13 | -.07 | .17 |
| Self-Esteem Threat | -.38 | .25 | -.70* | .32 |
| Competition Contingency x SE Threat | -.05 | .23 | -.03 | .30 |

*Note.* $N = 55$. $R^2$ for the main effect of self-esteem threat = .09. $R^2$ for the full model with interpersonal justice as the dependent variable = .09. $R^2$ for the full model with informational justice as the dependent variable = .10.

* $p < .05$.

Table 3

*Unstandardized Regression Coefficients (Bs) for the Simultaneous Regressions of the Dependent Variables on Self-Esteem Threat, Competition Contingency, and Global Self-esteem*

| | Dependent Variable | | | |
|---|---|---|---|---|
| | Interpersonal Justice | | Informational Justice | |
| Variable | B | SE B | B | SE B |
| Global Self-Esteem | -.01 | .22 | -.16 | .27 |
| Competition Contingency | -.21 | .19 | -.25 | .22 |
| Self-esteem Threat | -.47 | .28 | -.82* | .33 |
| Global SE x SE Threat | .04 | .29 | .72* | .34 |
| Competition Contingency x SE Threat | .02 | .28 | .16 | .33 |
| Competition Contingency x Global SE | .14 | .16 | .26 | .18 |
| Competition Contingency x SE Threat x Global SE | -.18 | .24 | -.65* | .29 |

*Note.* $N$ =55. $R^2$ for the main effect of self-esteem threat = .09. $R^2$ for the global self-esteem x self-esteem threat interaction = .07. $R^2$ for the competition contingency x global self-esteem x self-esteem threat interaction = .08. $R^2$ for the full model with interpersonal justice as the dependent variable = .12. $R^2$ for the full model with informational justice as the dependent variable = .26.

* $p < .05$.

Table 4

*Unstandardized Regression Coefficients (Bs) for the Simultaneous Regression of the Dependent Variables on Self-esteem Threat, Competition Contingency, and Negative Affectivity*

| | Dependent Variable | | | |
| --- | --- | --- | --- | --- |
| | Interpersonal Justice | | Informational Justice | |
| Variable | B | SE B | B | SE B |
| Negative Affectivity (NA) | .23 | .34 | .04 | .41 |
| Competition Contingency | -.20 | .16 | -.08 | .19 |
| Self-esteem Threat | -.38 | .28 | -.88* | .34 |
| Negative Affectivity x SE Threat | -.39 | .47 | -1.17* | .56 |
| Competition Contingency x SE Threat | .08 | .27 | .20 | .32 |
| Competition Contingency x NA | -.05 | .25 | .02 | .29 |
| Competition Contingency x SE Threat x NA | -.07 | .39 | .75 | .47 |

*Note.* $N = 55$. $R^2$ for the main effect of self-esteem threat $= .11$. $R^2$ for the negative affectivity x self-esteem threat interaction $= .07$. $R^2$ for the full model with interpersonal justice as the dependent variable $= .12$. $R^2$ for the full model with informational justice as the dependent variable $= .25$.

* $p < .05$.

Figure Captions

*Figure 1.* Graph depicts the two-way interaction between global self-esteem and self-esteem threat. Values for high and low global self-esteem were chosen at one standard deviation above and below the centered mean, respectively.

*Figure 2.* Graph depicts the three-way interaction between global self-esteem, competition contingency, and self-esteem threat. The top panel depicts the two-way interaction between competition contingency and self-esteem threat for individuals low in global self-esteem. The bottom panel depicts the two-way interaction between competition contingency and self-esteem threat for individuals high in global self-esteem. Values for high and low global self-esteem and competition contingency were chosen at one standard deviation above and below their centered means, respectively.

*Figure 3.* Graph depicts the two-way interaction between negative affectivity and self-esteem threat. Values for high and low negative affectivity were chosen at one standard deviation above and below the centered mean, respectively.
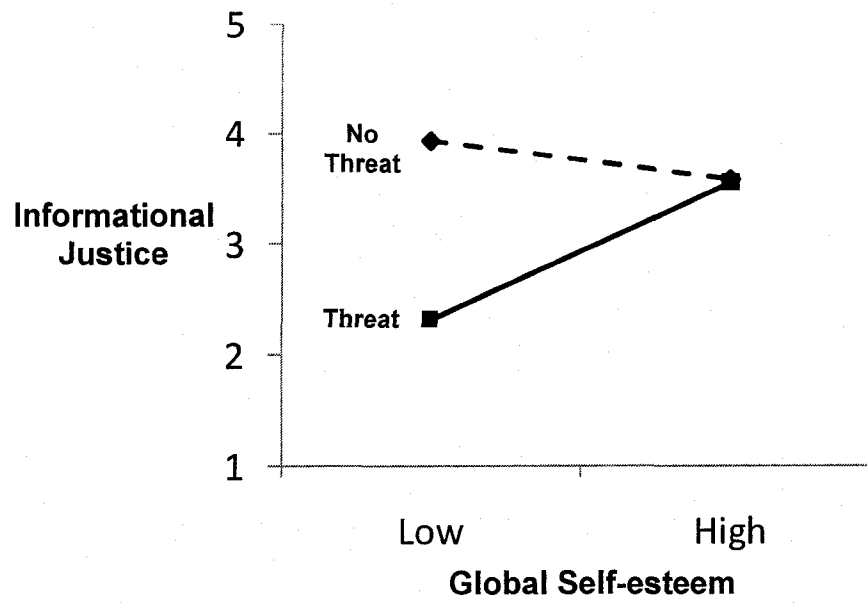
Figure 1

Figure 2



**Low Global Self-esteem**

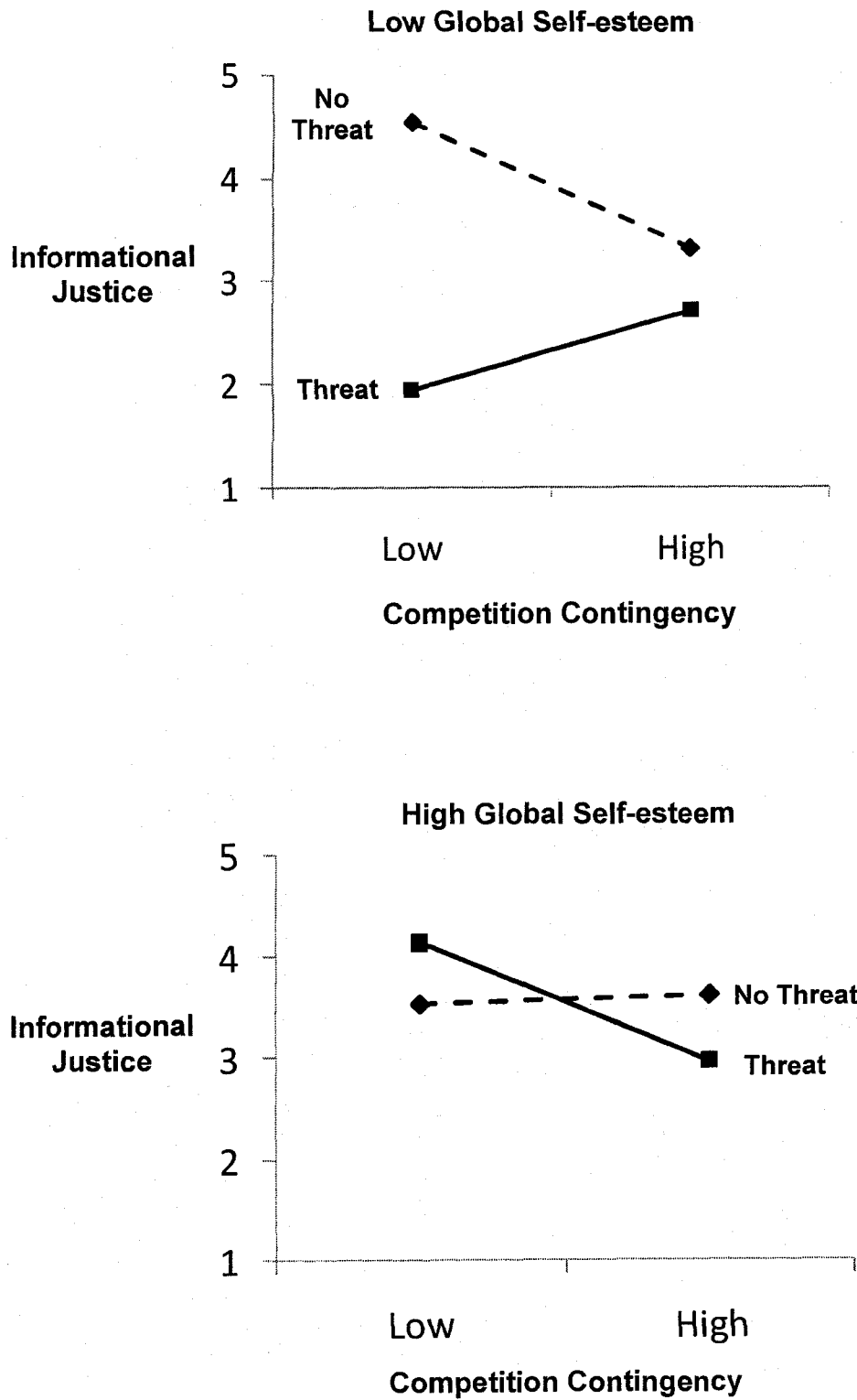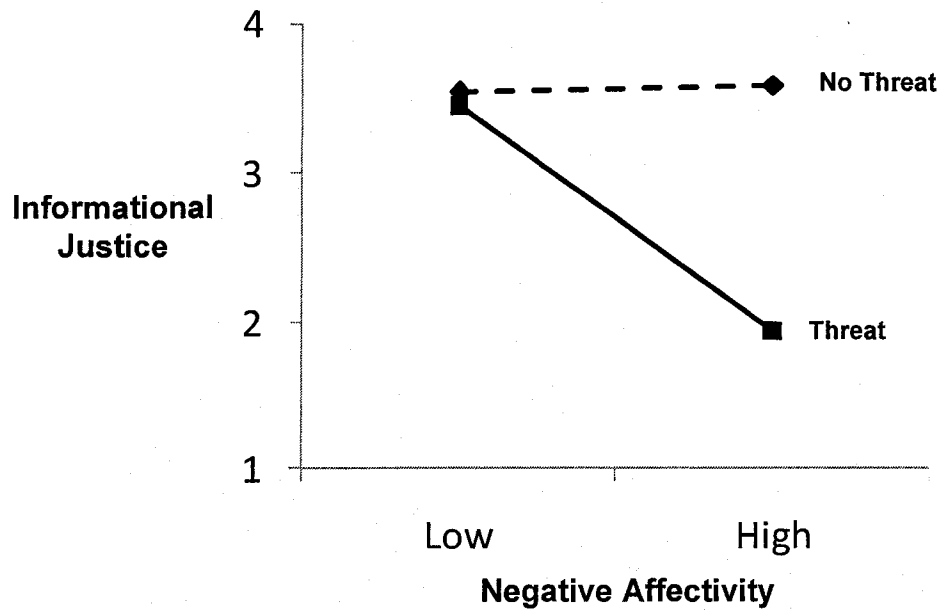**High Global Self-esteem**

Figure 3

Appendix A

Measure of Global Self-esteem

In the following section, please indicate how you <u>generally</u> feel about yourself using the scale provided.  Please circle the number that best represents how you feel.

I generally feel:

| | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| Disappointed with myself | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Pleased with myself |
| Dissatisfied with myself | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Satisfied with myself |
| Bad about myself | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Good about myself |
| Unsure of myself | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Sure of myself |
| Negative about myself | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Positive about myself |
| Worthless | 1 | 2 | 3 | 4 | 5 | 6 | 7 | Worthwhile |

Appendix B

Measure of Competition Contingency (Crocker, Luhtanen, Cooper, & Bouvrette, 2003)

Below is a list of statements dealing with things that may or may not contribute to your feelings of self-worth. Please indicate the extent to which you agree or disagree with the following statements. Please be honest and candid in your responses.

| 1 | 2 | 3 | 4 | 5 | 6 | 7 |
|---|---|---|---|---|---|---|
| Strongly Disagree | Moderately Disagree | Slightly Disagree | Neither Agree Nor Disagree | Slightly Agree | Moderately Agree | Strongly Agree |

In general...

1. Doing better than others gives me a sense of self-respect. _____

2. Knowing that I am better than others on a task raises my self-esteem. _____

3. My self-worth is affected by how well I do when I am competing with others. _____

4. My self-worth is influenced by how well I do on competitive tasks. _____

5. I feel worthwhile when I perform better than others on a task or skill. _____

Appendix C

Measure of Negative Affectivity (Watson, Clark & Tellegen, 1988)

Below is a list of words describing different emotions. Please indicate the extent to which you generally feel the following emotions. Please be honest and candid in your responses.

| 1 | 2 | 3 | 4 | 5 |
|---|---|---|---|---|
| **Very slightly or not at all** | **A little** | **Moderately** | **Quite a bit** | **Extremely** |

In general to what extent do you <u>generally</u> feel:

1. Distressed    _____

2. Upset    _____

3. Guilty    _____

4. Scared    _____

5. Hostile    _____

6. Irritable    _____

7. Ashamed    _____

8. Nervous    _____

9. Jittery    _____

10. Afraid    _____

Appendix D

# HEALTHWAY INSURANCE

HealthWay is a large insurance company that provides individual as well as group health and dental coverage to Canadians. The organization has been in operation since 1958 and today operates nationally with 17 offices across the country.

You are the Group plan division manager at one of HealthWay's smaller offices. Although the group plan mangers from all the offices have regional and head office supervision, you act independently for the most part, and are responsible for a staff of 15. You currently have 6 senior salespeople, 3 junior salespeople and 6 administrative staff in your group sales division. You are responsible for budgeting for the department, scheduling, as well as overseeing group quotes for all major current or prospective clients.

Enclosed in this envelope are the tasks on your "to do" list of things to accomplish for today.

## Appendix E

**1. SENIOR STAFF SCHEDULING TASK**

Complete the schedule below ensuring that there are <u>at least 2 people working the office at all times</u> and that each staff member works at least <u>3 hours a day</u>. Keep the staff requests in mind as best you can while completing the schedule. Monday and Tuesday's schedule has been completed for you; the shaded blocks indicate the times that the sales staff are scheduled to work.

\* STAFF REQUESTS - Tom will be out of the office on Thursday from 11:00 until 3:00.
  - Susan requested all her shifts be before 2:00 this week.
  - Do not schedule Lisa and Bob at the same time on any given day.

### HealthWay Insurance - Senior Shift Schedule

**Monday**

| | 9:00 AM | 10:00 AM | 11:00 AM | 12:00 AM | 1:00 PM | 2:00 PM | 3:00 PM | 4:00 PM |
|---|---|---|---|---|---|---|---|---|
| Tom S | ▓ | ▓ | ▓ | ▓ | | | | |
| Lisa L | | | ▓ | ▓ | ▓ | | | |
| Bob H | ▓ | ▓ | | | | ▓ | ▓ | ▓ |
| John B | | | ▓ | ▓ | ▓ | | | |
| Eve K | | | | | | ▓ | ▓ | ▓ |
| Susan M | ▓ | ▓ | ▓ | | | | | |

**Tuesday**

| | 9:00 AM | 10:00 AM | 11:00 AM | 12:00 AM | 1:00 PM | 2:00 PM | 3:00 PM | 4:00 PM |
|---|---|---|---|---|---|---|---|---|
| Tom S | | | ▓ | ▓ | ▓ | ▓ | | |
| Lisa L | ▓ | ▓ | ▓ | ▓ | | | | |
| Bob H | | | | | ▓ | ▓ | ▓ | ▓ |
| John B | ▓ | ▓ | ▓ | | | | | |
| Eve K | | | | ▓ | ▓ | ▓ | ▓ | ▓ |
| Susan M | ▓ | ▓ | ▓ | ▓ | | | | |

**Wednesday**

| | 9:00 AM | 10:00 AM | 11:00 AM | 12:00 AM | 1:00 PM | 2:00 PM | 3:00 PM | 4:00 PM |
|---|---|---|---|---|---|---|---|---|
| Tom S | | | | | | | | |
| Lisa L | | | | | | | | |
| Bob H | | | | | | | | |
| John B | | | | | | | | |
| Eve K | | | | | | | | |
| Susan M | | | | | | | | |

**Thursday**

| | 9:00 AM | 10:00 AM | 11:00 AM | 12:00 AM | 1:00 PM | 2:00 PM | 3:00 PM | 4:00 PM |
|---|---|---|---|---|---|---|---|---|
| Tom S | | | | | | | | |
| Lisa L | | | | | | | | |
| Bob H | | | | | | | | |
| John B | | | | | | | | |
| Eve K | | | | | | | | |
| Susan M | | | | | | | | |

**Friday**

| | 9:00 AM | 10:00 AM | 11:00 AM | 12:00 AM | 1:00 PM | 2:00 PM | 3:00 PM | 4:00 PM |
|---|---|---|---|---|---|---|---|---|
| Tom S | | | | | | | | |
| Lisa L | | | | | | | | |
| Bob H | | | | | | | | |
| John B | | | | | | | | |
| Eve K | | | | | | | | |
| Susan M | | | | | | | | |

## Appendix F

**A new system is being implemented across all the HealthWay sites. As a brief introduction, before officially introducing the new system and starting employee training, please draft an initial memo to be sent to your staff outlining the key points about the system. The memo should be no more than 2 paragraphs, and should be handwritten on the following page.**

**The Information required to brief your staff is below.**

### What is the Info Share System (ISS)?

The ISS is a common information system allowing cooperation between all HealthWay sites and departments. ISS will allow the sharing and exchange of information for prospective and current clients, as well as allowing us to be informed of various policies across HealthWay sites. ISS will allow HealthWay to establish a stronger relationship between sites and a company without borders or barriers to information exchange. Employees will be able to flag certain topics or company names and ISS will automatically update and alert users of any relevant information being added to the system. Some flags such as company memos etc. will be automatic. ISS will ensure that all employees at all sites have access to the same information, protected with the same degree of assurance and security measures that have been previously available at individual sites.

Test sites have been using the ISS since March 2006. It has been tested and prepared for integration into the regular HealthWay operating systems. Information is now being transferred from the old system and ISS should be ready to fully replace the old operating systems as of June 2007.

### How Does ISS work?

The ISS will operate similarly to the old system but with significant upgrades. The ISS will use a window explorer format for navigating through the program. Unlike HealthWays previous system, client files will be available to all sites at all levels of security, this will allow sales assistants access to basic client information, contact info etc. which will help sales people on the road. Certain areas containing information within these files will remain locked and password protected. These security measures will be constantly updated to maintain HealthWays assurance of privacy and confidentiality to all clients and prospective clients in regards to their personal information.

The new additions to the ISS will be areas like the Information Systems online help desk which will allow employees to search for answers to technical problems before filing a request for service. The employee network area is also a new addition that has been added for the benefit of the employees for use during lunch hours and break. The area includes boards for posting items for sale, boards for posting news and announcements, an event calendar which will be run by the employee association and a confidential suggestion box where employees can electronically pass on comments or suggestions.

### Management and Use of ISS

Management of ISS will be the responsibility of a new team, the ISStech team, that has been implemented on contract to get ISS up and running and deal with glitches during integration while HealthWay phases out the old system. ISStech will be responsible for employee training on the new system. Training will take place early in the summer of 2007. All employees will be required to attend a 2 day training session on the new system. Manuals will be provided to help learn the new system. To avoid slowing down service, the old system will be kept along side the ISS for two months before removing the old system. This is to help maintain the turnaround time of customer requests. Employees are expected to spend any extra time they have during those months practicing on the new system. ISS should be a valuable addition to HealthWay sites.

HEALTHWAY MEMO

ATTENTION: **Group Sales Department**

RE: **New Info Share System**
DATE: **November 23, 2006**

## Appendix G

### 1. QUARTERLY BUDGETING TASK

Below is the HealthWay Insurance quarterly budget. Your department has been allotted $1,500,000 for this quarter. Salaries have been set for the year but you are in charge of dividing up the rest of the funds. The executive has been encouraging a focus on market research and communications. The final budget has to be approved by HealthWay executives so you should try and keep their suggestions in mind and dedicate a significant portion of the budget to the areas they favour.

Please complete the following budget to be submitted for approval at the next executive meeting. You have been provided with a calculator to help you with this task.

> **HINT:** You may want to decide how much of the $1,060,000 you would like to give to each department overall (i.e. – Market Research) before dividing the funds up into smaller sections within the department (i.e. - under Market Research, primary research and library management).

### HealthWay Insurance – Group Plan Department Budget

| 1. PERSONNEL | | RUNNING TOTAL |
|---|---|---|
| Senior Staff (6) | 82,500 | 82,500 |
| Junior Staff (3) | 27,750 | 110,250 |
| Admin Staff (6) | 45,000 | 155,250 |
| Commissions and bonuses | 284,750 | 440,000 |
| Personnel Total | 440,000 | 440,000 |
| 2. MARKET RESEARCH | | |
| Primary research | | |
| Library management | | |
| Market Research Total | | |
| 3. COMMUNICATIONS | | |
| Advertising | | |
| Direct marketing | | |
| Public relations | | |
| Events | | |
| Communications Total | | |
| 4. TRAINING AND CONFERENCE ATTENDANCE | | |
| Training and Conference Attendance Total | | |
| 5. CUSTOMER ACQUISITION & RETENTION | | |
| Customer loyalty | | |
| CAR Total | | |
| 6. OTHER | | |
| Postage | | |
| Telephone | | |
| Computers and office equipment | | |
| Other Total | | |
| Total | $1,500,000 | $1,500,000 |

Appendix H

| Group Insurance Report | | | |
|---|---|---|---|
| **Section 1 – File Information** | | | |
| *CSR No.* | | *Date:* | |
| Group Name: | | | |
| Address: : | | | |
| City: | | Province: | Postal Code: |

Status: ☐ Current Client
        ☐ Prospective Client **(Not on file)**
        ☐ Prospective Client **(On file)**

Request for Quote From:
Date of Request:

**Section 2 – Details Of Business**

Description of Organization:

| Number of Full Time Employees: | Number of Part Time Employees: |
|---|---|

JOB DESCRIPTIONS

| Job Title: | OCC Code: |
|---|---|

Description:

| Job Title: | OCC Code: |
|---|---|

Description:

| Job Title: | OCC Code: |
|---|---|

Description:

| Job Title: | OCC Code: |
|---|---|

Description:

| Job Title: | OCC Code: |
|---|---|

Description:

| Job Title: | OCC Code: |
|---|---|

Description:

SECTION 3 - EMPLOYEE INFORMATION

| Number of Employees Requesting Family Coverage: | Number of Employees Requesting Single Coverage: |
|---|---|

## Group Insurance Report

| | | | |
|---|---|---|---|
| 1. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| 2. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| 3. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| 4. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| 5. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| 5. Employee Name:<br>Birth date: | | ☐ Male ☐ Female | Waive Family Coverage: ☐ Yes ☐ No |
| Family Members | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |
| | Name:<br>Birth date: | | ☐ Male ☐ Female |

*SECTION 4 - Requested Coverage*

**Please Check Services To Be Quoted:**
- ☐ Health   . ☐ Life
- ☐ Dental .   ☐ Disability
- ☐ Extended Health. ☐ Executive Plus Program

## Appendix I

## REPORT REVIEW TASK

Group Insurance Report Training Key

Please review the completed Group Insurance Report. As you review the report, read through the check list below and place a check in the box for each piece of information that has been properly completed on the report.

SECTION 1 – FILE INFORMATION
Key information in this section includes

☐ The CSR number: A single letter 8 digit code

☐ Name and full address of the company requesting the quote

☐ The Status of the quote: One of the following options should be checked 'current client', 'prospective client on file' or 'prospective client not on file'.

☐ Name of the person requesting the quote for future contact

☐ The date the quote was requested: Month day and year

SECTION 2 – DETAILS OF BUSINESS
Key information in this section includes

☐ Description of Organization: Detailed description of business. Location. Length of time in business. What type of work the company does. Estimated amount of weekly hours spent at desk, working with heavy machinery etc.

☐ Number of full time and part time employees

☐ Job descriptions for each position held by employees within the company: This includes: - Title of each position.
        - OCC code or occupation code for each position for risk rating.
        - Detailed description of position, including what type of work employee
          does daily, where they complete most of their work (desk etc.)

SECTION 3 – EMPLOYEE INFORMATION
Key information in this section includes

☐ Number of Employees requesting family coverage

☐ Number of Employees requesting single coverage
Employee Information
    ☐ First and last Name
    ☐ Date of birth (Month day and year)
    ☐ Sex (Male or Female Checked)
    ☐ If they opt to waive family coverage or not.
    ☐ First and last name of each family member of the employee, their birth dates and sex.

SECTION 4 – REQUESTED COVERAGE
Key information in this section includes

☐ The coverage plans that the company would like quoted should be checked

| Missing 9 or more information checks | Missing 7 to 8 information checks | Missing 5 to 6 information checks | Missing 3 to 4 information checks | Missing 1 or 2 information checks |
|---|---|---|---|---|
| Very Poor | Poor | Average | Good | Excellent |

Appendix J

Dependent Measures Completed by Confederate

Scale completed by confederate following negative feedback session.

| 1 | 2 | 3 | 4 | 5 | 6 | 7 |
|---|---|---|---|---|---|---|
| Strongly Disagree | Moderately Disagree | Slightly Disagree | Neither Agree Nor Disagree | Slightly Agree | Moderately Agree | Strongly Agree |

The following items refer to the 'manager' you just interacted with. Please indicate to what degree you agree with each statement using the scale provided.
*(Interpersonal Justice Items; Colquitt, 2001)*
_____ 1. Did (he/she) treated you in a polite manner?
_____ 2. Did (he/she) treated you with dignity?
_____ 3. Did (he/she) treated you with respect?
_____ 4. Did (he/she) refrained from improper remarks or comments?
*(Informational Justice Items; Colquitt, 2001)*
_____ 5. Was (he/she) candid in (his/her) communications with you?
_____ 6. Did (he/she) thoroughly explain the procedures used to score the report?
_____ 7. Were (his/her) explanations regarding the procedures reasonable?

# Research Ethics Board Certificate Notice

The Saint Mary's University Research Ethics Board has issued an REB certificate related to this thesis. The certificate number is: **06-199**

A copy of the certificate is on file at:

Saint Mary's University, Archives
Patrick Power Library
Halifax, NS
B3H 3C3

Email: archives@smu.ca
Phone: 902-420-5508
Fax: 902-420-5561

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