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### Cultural Values and the Effectiveness of Trust Repair Strategies in Collaborative Relationships

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Cultural Values and the Effectiveness of Trust Repair Strategies in Collaborative Relationships

by

Kyi Phyu Nyein

A thesis submitted to the College of Psychology and Liberal Arts  
of Florida Institute of Technology  
in partial fulfillment of the requirements  
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We the undersigned committee hereby approve the attached thesis, “Cultural Values and the Effectiveness of Trust Repair Strategies in Collaborative Relationships,” by  
Kyi Phyu Nyein.

---

Jessica L. Wildman, Ph.D.  
Assistant Professor  
College of Psychology and Liberal Arts

---

Erin M. Richard, Ph.D.  
Associate Professor  
College of Psychology and Liberal Arts

---

Theodore G. Petersen, Ph.D.  
Associate Professor  
College of Psychology and Liberal Arts

---

Mary Beth Kenkel, Ph.D.  
Dean and Professor  
College of Psychology and Liberal Arts

## Abstract

### Title:

Cultural Values and the Effectiveness of Trust Repair Strategies in Collaborative Relationships

### Author:

Kyi Phyu Nyein, M. A.

### Advisor:

Jessica L. Wildman, Ph. D.

Interpersonal trust is a positive expectation that an individual has regarding another individual, and such positive expectation leads to behaviors and outcomes desirable for individuals, groups, and organizations. Despite these benefits and positive outcomes of trust, it can be damaged or broken, and to continue the relationship or effectively work together again, individuals must repair the broken trust. Very little research has been conducted on trust violation and repair in the cross-cultural context, and as more organizations and businesses become global, the influence of culture must be considered in developing and maintaining trusting relationships as well as repairing broken trust between individuals from different cultures. Therefore, the current study seeks to help close this gap in understanding the topic as individuals differ in how they perceive and respond to trust violation depending on their cultural backgrounds. Specifically, the current study hypothesized that the effectiveness of trust repair effort would depend on individuals' cultural values and examined four repair strategies (account, apology, penance, and demonstration of concerns) and how they would be most or least effective depending on cultural values.

By using archival data, the current study quantitatively and qualitatively analyzed the interview data where participants shared their experiences of trust development, violation, and repair in the classroom or job setting. Results showed that penance was most frequently used alone or together with other repair strategies, and penance and demonstration of concerns were found to be more effective than account and apology across most cultural values examined in the current study. Other effective repair strategies not specified in the current study included the passage of time and the cross-over between professional and personal lives where the friendship helped buffer against the negative consequences of the violation and rebuild the trust. Theoretical implications of the conceptualization of trust repair and practical suggestions on what individuals can do to repair the broken trust are also discussed.

*Keywords:* trust, development, repair, violation, and culture

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## CHAPTER ONE: INTRODUCTION

### **Statement of the Problem**

In all kinds of relationships, trust plays a critical role not only in developing but also in maintaining a good relationship. Particularly, at the workplace, trust gives individuals, teams, and organizations many benefits and positive outcomes. For example, having high trust leads to positive attitudes (e.g., job satisfaction), perceptions (e.g., perception of positive organizational climate), and behavioral and performance outcomes (Dirks & Ferrin, 2001; Webber, 2008). Moreover, trust is also a necessary condition for other positive outcomes to occur. For instance, whether group motivation leads to effective group performance depends on the trust among group members (Dirks & Ferrin, 2001). Individuals who have high trust in coworkers are more likely to engage in organizational citizenship behavior because they believe their kindness will not be taken advantage of. Thus, trust is the foundation of a successful relationship and is critical for an effective collaboration between individuals, groups, or organizations.

Nonetheless, trust can naturally decline over time (Elangovan, Auer-Rizzi, & Szabo, 2015) or be violated intentionally (e.g., betrayals) or unintentionally (e.g., incompetence). In order to continue the relationship and work together effectively, the broken trust needs to be repaired and maintained. However, trust repair can be more challenging than building trust initially because the repair effort needs not only to overcome negative emotions and consequences associated with the violation, but also to reestablish the positive image of the violator and a positive climate for the

relationship (Elangovan et al., 2015; Kim, Ferrin, Cooper, & Dirks, 2004). The matter is even more complicated when trust violation happens between individuals from different cultures, because they are conditioned by their cultural values to perceive, interpret, and respond differently to the same aspects of a situation (Hofstede, 1980a).

There are many examples where the lack of trust or trust violation occurs between cross-cultural groups, organizations, or countries, and it leads to failures in the relationships and collaborations. For example, as China becomes one of the world's largest economies, and U.S. is entering the Chinese market, there has been talk between leaders regarding the economic relationship between the two countries. But, as reported by Hu (2016) in the National Public Radio news, President Donald Trump said, "China and other countries have committed the greatest theft in the history of the United States," and there are disagreements over Chinese rules and regulations against U.S. organizations. This indicates the lack of trust, and it leads to "the rocky time" in the relationship between two countries (Hu, 2016). In fact, Chinese President Xi Jinping said ongoing communication and more mutual trust were needed. Another example is the current relationship between the U.S. and North Korea and their heightened tensions. In the Diplomat Magazine, Holmes and Wheeler (2017) recalled the last time U.S. handled a similar crisis with North Korea. The former U.S. President Jimmy Carter was able to develop mutual trust with North Korean through face-to-face diplomacy and find solutions beneficial for both countries.

In addition, consider a hypothetical example of a manager and an employee who hold different levels of power distance, and the manager is high in power distance

while the employee is low in power distance. Power distance is one of the major cultural dimensions Hofstede (1980a) introduces and concerns with how power equality is perceived such that those high in power distance believe that the ones in the position of authority hold the power, whereas those low in power distance see others as relatively equal. The manager would make decisions without consulting the employee and expect loyalty and followership from the employee without questioning his decisions. On the other hand, the employee would not like the manager's approach and would prefer that the manager consulted with him or gave an opportunity to participate in the decision making (van Oudenhove, Mechelse, & de Dreu, 1998). The employee would not trust the manager because the former might perceive that the latter does not serve his best interests.

All of these examples illustrate that building trust as well as repairing broken trust are critical in cross-cultural relationships and successful collaborations. But, trust violation can happen very easily in cross-cultural relationships, and trust repair is even more challenging because of language barriers, conflicting cultural norms and values, and the lack of understanding of the culture in general. Most of the understanding on trust violation and repair is based on Western research, and there is little empirical and theoretical research to understand trust violation in the cross-cultural context and how repair effort might be different across cultures despite a few initial studies (e.g., Kuwabara, Vogt, Watabe, & Komiya, 2014; Maddux, Kim, Okumura, & Brett, 2011; Ren & Gray, 2009), and these studies call for more research on the topic.

### **Purpose of the Current Study**

Therefore, the current study seeks to narrow the gap and find effective and ineffective trust repair strategies in collaborative or work relationships depending on individuals' cultural values. In other words, the purpose of the current study is to examine the effectiveness of different trust repair strategies and how they differ across the cultural values by comparing level of trust after the violation and repair (post-repair trust). These repair strategies include account, apology, penance, and demonstration of concerns (Ren & Gray, 2009), and these four strategies were selected because they represent strategies that the literature has supported as effective along with a relatively understudied repair strategy (demonstration of concerns). The cultural values include tolerance for ambiguity, femininity, masculinity, honor, face, dignity, fatalism, individualism, and power distance (Aslani et al., 2016; Budner, 1962; Hofstede, 1980a; Solomon, 2003). These cultural values were selected based on the conceptual match between these cultural values and how they are expected to influence trust development, violation, and repair.

There are underlying assumptions, standards, norms, and beliefs about individuals' behaviors based on the cultural values, and research has suggested that these cultural values influence the development of trust (Doney, Cannon, & Mullen, 1998). In other words, different cultural values have different assumptions, beliefs, and norms, and because of these differences, how trust is developed varies across cultures. Moreover, when the assumptions and beliefs are violated or conflict with others due to different cultural values, trust violation happens. To effectively repair the

broken trust, the repair effort should be targeted towards making individuals' beliefs and intentions more positive (Kim et al., 2004). Furthermore, the repair effort should be consistent with or satisfy the cultural norms, values, and beliefs of the victim of the violation.

The current study used archival data where trust repair strategies and post-repair trust were collected from interview data, and cultural values were collected from self-reported survey data. It expected to find that accounts would be an effective repair strategy for individuals low in tolerance for ambiguity, apologies for those high in honor and face, penance for those high in individualism, and demonstration of concerns for those high in femininity. On the other hand, accounts would be ineffective for those high in femininity, and demonstration of concerns ineffective for those high in masculinity. The current study also explored three additional exploratory research questions regarding (1) the cultural value of fatalism, (2) the cultural value of power distance, and (2) the effectiveness of a combination of repair strategies across cultures. The main theoretical assumption underlying these expected outcomes is that these repair strategies would satisfy or fail to satisfy underlying assumptions and norms of the cultural values and would enhance or fail to enhance positive experiences, emotions, and trusting intentions after the violation for most or least effective repair respectively.

In terms of potential implications, the current study greatly contributes to the systematic understanding of trust violation and repair, not only in the workplace, but also in broader cross-cultural contexts. By examining a wide range of cultural values

in affecting trust repair effort, the current study captures the broader perspective and influence of culture. Finally, it also provides practical implications on what individuals can do, particularly repair strategies they can use and should avoid, to repair the broken trust and ultimately promote successful relationships with others from different cultural backgrounds.

## CHAPTER TWO: LITERATURE REVIEW

### **Interpersonal Trust Development, Violation, and Repair**

#### **Definitions of Interpersonal Trust**

There are three perspectives in defining interpersonal trust that are commonly cited in the literature. Probably the most widely accepted and cited definition is that of Mayer, Davis, and Schoorman (1995): “willingness of a party to be vulnerable to the actions of another party based on the expectation that the other will perform a particular action important to the trustor, irrespective of the ability to monitor or control that party” (p. 712). This first perspective proposes trust as an outcome of the trustor’s risk-taking and willingness to be vulnerable. In the second perspective by Bhattacharya, Devinney, and Pillutla (1998), trust is defined as “an expectancy of positive (or nonnegative) outcome that one can receive based on the expected action of another party in an interaction characterized by uncertainty” (p. 462). This perspective defines trust as a positive belief or expectation that the trustor has towards the trustee. Finally, the third perspective conceptualizes trust by combining the first and second perspectives and defines it as “a psychological state comprising the intention to accept vulnerability based upon positive expectations of the intentions or behavior of another” (Rousseau, Sitkin, Burt, & Cramerer, 1998, p. 395). In this perspective, trust is composed of both vulnerability and positive expectations of the trustor towards the trustee. Because of its integrative nature, the third perspective will be adopted in the current study to define interpersonal trust.



## **Interpersonal Trust Development**

There have been many theories that attempt to define interpersonal trust and explain trust development. One of the most commonly cited models is proposed by Mayer and colleagues (1995), and their model proposes an integrative model of trust considering the roles of the trustor and the trustee in developing trust and eventually leading to an outcome. The role of trustee is considered through the trustee's perceived trustworthiness, which is assessed by three components: ability, benevolence, and integrity. Ability is concerned with the technical ability and skills that the trustee has in order to accomplish the job. Benevolence is concerned with the expectation that the trustee is in the best interest of the trustor and will be unselfish and good to the trustor. Integrity is concerned with the expectation that the trustee will adhere to a set of moral principles. These three factors of the trustee's perceived trustworthiness are related but independent to each other. Whether they all lead to trust depends on a characteristic of the trustor, which is propensity of trust. Propensity of trust refers to the general tendency to trust others, and high propensity to trust leads to trust. Moreover, if the trustor has a high propensity to trust, he or she also perceives high ability, benevolence, and integrity of the trustee, which then leads to trust.

Once trust is developed, the trustor will weigh the benefits of trusting the trustee against its risks, and if there are more benefits, it will lead to risk taking in the relationship (i.e., being vulnerable). Finally, risk taking in the relationship would lead to an outcome, which then reinforced or diminished the perceived trustworthiness of the trustee through a feedback loop. Similar to Meyer et al. (1995), Boon and Holmes

(as cited in Lewicki & Bunker, 1996) proposes three components of trust. They are one's disposition towards trust, a situation for trust to develop and demonstrate, and the history of the relationship of the parties involved. Some characteristics of the situational component include some risks, cues of the environment (e.g., uncertainty) or of another person (e.g., intentions), and resulting behaviors after one gathers and processes the information. In fact, a meta-analysis conducted by Colquitt, Scott, and LePine (2007) supported Mayer et al. (1995)'s model. They found that propensity to trust was related to trustworthiness dimensions, ability, benevolence, and integrity, and each of these three dimensions also uniquely related to trust. In addition, these dimensions directly predicted a number of behavioral outcomes, including risk-taking behaviors, counterproductive behaviors, and citizenship behaviors. All in all, Meyer et al. (1995)'s model is well supported in the literature.

One of the reasons that three trustworthiness dimensions have unique relationships with trust is that they reflect cognitive and affective sources of trust (Colquitt et al., 2007). Cognitive trust is a positive belief about the trustee's ability, competence, and performance, whereas affective trust concerns with interpersonal bond and mutual concern (Webber, 2008). Webber (2008) claims that initial trust developed early in a relationship is one-dimensional, but it later evolves into two dimensions, cognitive and affective trust. The author examined student teams in the classroom project environment at three different time points throughout the semester – Time 1 at the second week, Time 2 at the fifth week, and Time 3 at the tenth week. There was only initial trust at Time 1 and Time 2, and cognitive and affective trust

emerged as two dimensions at Time 3. The author also found that being reliable predicted cognitive trust, whereas citizenship behaviors predicted affective trust. Therefore, cognitive appraisal of the trustee's ability and integrity and affective source of benevolence have incremental effects on trust.

As found in Webber (2008), there can be some trust at the beginning of a new relationship, although earlier literature of trust development suggested that there was no trust at the beginning (Lewicki, Tomlinson, & Gillespie, 2006). Moreover, the literature also described trust as a stable and static construct, but such description was due to using cross-sectional experiments in the laboratory in early days (Rousseau et al., 1998). Therefore, Rousseau et al. (1998) suggests three phases of trust: building, stability, and dissolution. In the building phase, trust is formed or rebuilt from preexisting relationships. In the stability phase, there is already some stable trust, and in the dissolution phase, trust declines. In other words, trust develops from zero or some degree and increases and decreases over time (Lewicki et al., 2006). In fact, it is supported by the study of Cheng, Yin, Azadegan, and Kolfshoten (2016) where two culturally different teams, one from China and one from the Netherlands, worked on class projects over seven or nine weeks, and different patterns of trust development were found. In Chinese teams, there was high initial trust, and then it fluctuated over several weeks and declined towards the end. In the Netherlands teams, trust was slowly built over the first two weeks, fluctuated over following weeks, and decreased near the end. This study shows not only cultural differences in trust development, but also the nonlinear patterns of trust development over time.

Last, but not least, Lewicki and Bunker (1996) also propose three different types of trust: calculus-based trust, knowledge-based trust, and identification-based trust. Calculus-based trust is developed based on the fear of consequences (i.e., punishment) for doing otherwise and weighing benefits and risks of a relationship with the trustee. Knowledge-based trust is based on the predictability of the trustee's behaviors. It requires consistent interactions with the trustee, knowledge of the trustee, and a certain period of time to develop. Identification-based trust is based on the trustor's identification with the trustee through mutual understanding of each other as well as based on the knowledge of how to maintain each other's trust. As these types are developed sequentially starting from the calculus-based trust, and as the trustor spends more time with and get to know the trustee, knowledge-based trust is developed. Eventually the highest form of trust, identification-based trust, is achieved once the trustor and trustee help each other out of benevolence and mutual identification.

### **Interpersonal Trust Violation**

Elangovan, Auer-Rizzi, and Szabo (2007) describe the process of trust violation in two steps. In the first step, there is a trigger event where the trustee acts in a way that does not meet the expectations of the trustor. Subsequently in the second step, the trustor assesses the situation and the damage. In other words, trust violation occurs when the trustee's positive expectations and perceptions of the trustee are challenged or disconfirmed by the trustee. Lewicki and Bunker (1996) argue that when trust violation occurs, the trustor responds to it cognitively and emotionally.

Cognitively, the trustor evaluates the meaning of the violation to the relationship with the trustee, the severity of the consequences, and responsibilities for the violation. Emotionally, the trustor experiences mostly negative emotions and affect, such as anger, frustration, and hurt. Trust violation does not immediately result in the end of the relationship between the trustor and the trustee; trust can decrease to some extent, or the trustor might not trust the trustee in every situation (Elangovan et al., 2007).

The consequence instead depends on how the trustor assesses the violation and attributes the responsibilities. The trustor can attribute the responsibilities to internal characteristics of the trustee (e.g., the trustee being selfish to the trustor) or to external characteristics (e.g., situational pressure; Bies & Tripp, 1996). In addition, Elangovan et al. (2007) explains the attribution of responsibilities based on trustworthiness dimensions (ability, benevolence, and integrity) from the model of Meyer and colleagues (1995), and there are two distinct types of violation: competence violation and integrity violation. Competence violation is when the trustee does not have the ability to perform the tasks but tries to (can't but tries to), whereas integrity violation is when the trustee has the ability to do something but does not want to (i.e., can but doesn't want to), reducing in the perceptions of benevolence and integrity (Elangovan et al., 2007). The trustor views competence violation less severe and hurtful because the trustee at least tries and can be better in the future by improving him- or herself, while the trustor views integrity violation more hurtful and has more negative cognitive and affective reactions (Elangovan et al., 2007). Taken together, trust indeed decreases after a violation and decreases even more after integrity violation than after

competence violation.

### **Interpersonal Trust Repair**

After trust violation, in order to repair the damage and restore trust or reach to a new level of trust, trust repair processes must take place. Trust repair efforts are “activities directed at making a trustor’s trusting beliefs and trusting intentions more positive after a violation is perceived to have occurred” (Kim et al., 2004, p. 105). Trust repair process is quantitatively and qualitatively different from trust development at the beginning of a relationship and has a number of challenges (Kim et al., 2004). The amount of increased trust from the repair efforts needs to be greater than initial trust to compensate for the violation. Moreover, the trustee must not only reestablish positive beliefs and intentions the trustor perceives, but also reduce negative experiences from the violation (e.g., anger and resentment). Despite the repair effort, the violation and negative experiences from it can still remain salient in the relationship.

Tomlinson and Mayer (2009) theorize trust repair as a causal attribution process where the trustor considers the trust repair efforts or behaviors of the trustee in assessing or making sense of the violation. As described earlier in trust violation, the assessment is followed by causal attributions of the violation and perceived trustworthiness of the trustee (ability, benevolence, and integrity). Then, perceived trustworthiness and affective reactions lead to trust repaired or not repaired. Therefore, this model puts the focus and responsibilities of trust repair on the trustee who commits the trust violation. Most of the literature also studies trust repair attempt from

the contribution of the trustee alone.

The following section will review different repair efforts and strategies that previous studies have examined, as well as situational factors and individual differences that influence trust repair. While trust is the foundation of all types of relationships, the current study will only focus on the working or professional relationships in an organizational setting and on the interpersonal relationship between individuals that has developed or will continue for a certain period of time. Therefore, the current study will not include trust in personal relationships, trust in a group or team (e.g., Fraser, 2010), swift trust (i.e., trust that has to be developed relatively quickly in temporary groups; e.g., Wildman et al., 2012), trust in leadership or top management (e.g., Dirks & Ferrin, 2002), and trust in organizations (e.g., Gillespie & Dietz, 2009). Instead, the current study will be focused on interpersonal trust violation and repair between individuals in professional relationships and use the trustor with the victim and the trustee with the violator interchangeably.

### **Types of Repair Strategies and Their Effectiveness in Interpersonal Trust Repair**

Kim et al. (2004) studied different types of trust violation and the interaction between violation types and repair strategies. Two types of violation were competence violation and integrity violation; repair strategies included apology and denial of the wrongdoing. Competence-based trust was the perception and expectation that the trustee had necessary technical and interpersonal skills to accomplish a job. Integrity-based trust was the perception and expectation that the trustee would adhere and fulfill a set of principles and morals. An apology was a statement that the trustee both took

responsibilities and regretted for the violation, whereas a denial was a statement that the trustee declared the violation to be untrue and did not show any responsibilities or regret. Kim and colleagues chose apology and denial based on the suggestion of Lewicki and Bunker (1996) that the trustee must acknowledge and take at least some ownership of the violation event. The authors theorized that apologizing not only acknowledged the event, but also expressed guilt and regret which implied the intention to avoid future violations, and hence, improved the trustor's vulnerability. On the other hand, apology might not be effective because the trustee was now guilty of the wrongdoing, and it could be more damaging than the intention it signaled to avoid future violations. Therefore, denial might be a more effective strategy as the trustor can give the benefit of the doubt.

In Kim and colleagues' (2004) study, participants assumed the role of a manager and watched a video where a recruiter from the same firm who was helping with the recruitment interviewed an applicant. The recruiter was aware of the violation the applicant made at the previous job from the applicant's references, and when the recruiter mentioned it in the interview, the applicant responded by either apologizing or denying. Specifically, in the study, competence violation was operationalized by incorrectly filing taxes due to the lack of knowledge, whereas integrity violation was operationalized by incorrectly filing taxes intentionally. They found that when competence-based trust was violated, the trustee was more likely to be able to repair trust if he or she apologized, because positive information about taking responsibilities and trying to prevent future violations were weighed more than the violation. When



integrity-based trust was violated, the trustee was more likely to be able to repair trust if the violator avoided blame, because negative information about integrity was more troubling and hurtful. Therefore, denial was more effective in reducing such negative connotation of integrity violation.

In a follow-up study, they also provided an evidence of guilt or innocence after the violation to see if the benefits of apology and denial persisted. After watching the job interview video, participants were given a memo from the human resources department confirming the violation the trustee made (guilt) or concluding that the violation was untrue (innocence). They found the same results as in the first study that apology was more effective for competence violation, and denial for integrity violation. Additionally, given the evidence of guilt, the trustee was more likely to repair trust if he or she apologized for the violation than denied, because denial was a lie if there was an evidence of guilt, and it would be more damaging to trust. Likewise, given the evidence of innocence, the trustee was more likely to succeed in repairing if he or she denied than apologized. The three-way interaction between violation type, repair strategies, and evidence of guilt or innocence was inconclusive. Therefore, the effectiveness of repair actions depended on the types of trust violation as well as whether the trustee's innocence or guilt was known.

Kim, Dirks, Cooper, and Ferrin (2006) further explored the use of apology in trust repair where the trustee made an apology with internal or external attribution depending on the two types of trust violation. They found that when competence-based trust was violated, trust repair was more likely to be successful if the trustee

apologized by taking full responsibilities (i.e., internal attribution). When integrity-based trust was violated, trust repair was more likely to be successful if the trustee apologized by partially taking responsibilities and putting the rest of the responsibilities on external situations or someone else (i.e., external attribution). The results were similar to their study in 2004 that it was better to apologize and assume responsibilities for competence violation, whereas the trustee could still apologize for integrity violation but rather not take responsibilities. In a follow-up study, Ferrin, Kim, Cooper, and Dirks (2007) compared a new repair strategy, reticence, to apology and denial. When the trustee is reticent, he or she neither confirms nor disconfirms the violation and therefore does not show a sign of redemption. Reticence can be used for several reasons. The trustee might think that the evidence of guilt will not be known so it is better to make the violation uncertain. Another reason is that if the violation involves personal matters or confidential information, the trustee decides not to say anything to protect such information. However, Ferrin et al. (2007) found that reticence was found to be significantly ineffective compared to apology and denial.

While participants in these studies did not experience the violation directly but were informed of it, Schweitzer, Hershey, and Bradlow (2006) conducted a laboratory study where participants experienced an actual trust violation. Schweitzer and colleagues differentiated deception and untrustworthy actions and studied their different effects on trust repair. They operationalized deception by a written statement to do something but not confirmed by actions later, which is similar to integrity violation, whereas they operationalized untrustworthy actions by incentives in an

economic game participants played. One example of untrustworthy actions was the trustee gave the trustor \$0 while the trustor trusted the trustee to give them more than \$0; however, this did not involve any deceit or lying. After experiencing the violation, some participants received an apology and/or promise to change subsequent behavior, while others did not. A promise was “an assertive impression management approach designed to convey positive intentions about future acts (Schweitzer et al., 2006, p. 4). An apology involved “a statement of apology, an expression of remorse, and self-castigation” (Schweitzer et al., 2006, p. 5) and did not include a promise, explanation, or a request to rebuild trust.

Main results showed that a promise to change untrustworthy behaviors was helpful in trust repair in the initial stage (i.e., early rounds of the game), but trustworthy actions mattered more in trust repair whether accompanied by a promise to change or not. In other words, actions mattered more than a verbal statement or promise to change behavior. Moreover, an apology was found to be ineffective in repairing trust. The authors explained the finding such that an apology did not repair trust if it did not include any explanation for trust violation, a request for forgiveness, and a request for trust restoration. Most importantly, trust was not repaired after experiencing deception and after experiencing both untrustworthy actions and deception, because deception made long-lasting harm to trust.

In addition to the violation type and repair strategies, Elangovan and colleagues (2015) included the role of consequences of the violation in trust violation and repair and argued that for the repair process to be effective, the dynamics between

consequences and repair strategies needed to be considered. They examined different scenarios after the violation: (1) explanation by the trustee was offered; (2) explanation and apology were offered; (3) explanation, apology, and remedy (e.g., offering compensation) were offered; (4) there were no severe consequences suffered by the trustor because of the violation; and (5) there were severe consequences suffered by the trustor (e.g., reputation damaged). They found that regardless of whether the consequences were severe or not, it was the act of violating trust that harmed the trust and the relationship. Moreover, an explanation accompanied by the apology and remedy worked best, because when the trustee made effort to repair trust, the trustor noticed the amount of effort made by the trustee and evaluated the situation differently afterwards. Furthermore, those who were more likely to forgive after the violation were found to be senior employees among the top management in this study, and they were less likely to lose trust after the violation. It was possible that maturity played a role in forgiveness. Taken together, all of these studies imply that repair strategies need to be matched with the types of violation in order to successfully repair the broken trust, and that some repair strategies are more effective than others.

Last, but not least, another repair strategy, offering a penance or compensation for the wrongdoing, can also be helpful in trust repair. Desmet, Cremer, and van Dijk (2010) examined the nature of financial compensation given by the trustee to the trustor (voluntary or forced) and its effectiveness. They also investigated why this strategy was effective or ineffective and the moderating role of the trustor's trait forgiveness in it. Trait forgiveness was an individual's stable tendency to forgive the

trustee unconditionally. Participants played many rounds of games in the laboratory with a confederate, and the games involved investing actual money (coins). After violating the participants' trust, the confederate offered extra coins for compensation either voluntarily or being pressured by the experimenter. It was found that when the financial compensation was voluntarily given rather than being forced, the trustor was more likely to decide to trust again only among those with low trait forgiveness. This was because voluntary compensation indicated the trustee's repentance, and the trustor with low tendency to forgive based his or her decision to trust again on perceived repentance. When the victim had high trait forgiveness, the nature of the financial compensation did not have much effect on the decision to trust again. Additionally, the amount of penance offered—either small or large—could also lead to cooperation after the violation compared to no penance (Gibson, Bottom, & Murnighan, 1999). Therefore, compensation for the violation and the nature of compensation can be effective in repairing damaged trust. More importantly, this underscores the importance of both characteristics of the parties involved in trust violation and repair and repair strategies in trust repair.

### **The Role of Trustor and Situational Factors in Interpersonal Trust Repair**

Shifting from the focus on the role of the trustee in trust repair alone, especially repair strategies the trustee uses, Tomlinson, Dineen, and Lewicki (2004) considered the role of the trustor in repair process, particularly the trustor's willingness to reconcile, and the interplay between the trustor, trustee, and situations. They posited that characteristics of the relationship the trustor had with the trustee and

repair strategies (i.e., antecedents) would determine the trustor's willingness to reconcile, and the relationship would be moderated by the magnitude of the violation. Repair strategies included three types of apology, timeliness of repairing trust, and sincerity of the violator. The first type of apology was simply pleasing the trustor by the trustee being more kind or doing favors without being asked and without explicitly apologizing. The second type was taking full responsibilities through internal attribution, and the third type was blaming the violation on someone or something else through external attribution. Relationship characteristics included the nature of the relationship between the violator and the victim had before trust violation (good or bad relationship) and probability of future violation. Finally, the magnitude of the violation was determined by the extent to which the violation affected the foundation of the relationship and created serious negative consequences. All in all, Tomlinson and colleagues proposed that successful repair could happen when both the violator and the victim made an effort to repair the damage, but it might not always lead to rebuilding of the relationship to the previous level.

The results showed that the apologies using internal and external attribution were more effective than the apology by pleasing the trustor and that apology using internal attribution was more effective than the apology using external attribution. The sooner the repair action was taken, the more the trustor was willing to forgive. It was also not surprising that sincerity of the trustee had the strongest impact on the trustor's willingness to forgive. Furthermore, the willingness to forgive was higher when the trustor and the trustee had a good relationship before the violation and when the

probability of future violation was low. Interestingly, when the violation was severe, having a good relationship in the past helped repair trust, as the trustor considered the past relationship in deciding his or her willingness to forgive. When the violation was not severe, the past relationship did not have any effect on the willingness to forgive.

Another characteristic of the relationship between the trustor and the trustee is how committed they are to the relationship. Finkel, Rusbult, Kumashiro, and Hannon (2002) investigated commitment as a mediator (i.e., an underlying motivation) for forgiveness after being betrayed, which in this study, was norm violations in the relationship. They studied violation from the perspectives of the trustor in two studies where participants were primed or asked to recall (write a paragraph) about a violation their partners did in their real relationships at the time of participation (e.g., sharing private information to a third party). There were three components in commitment: the intent to stay (i.e., the decision to remain dependent on another person in a relationship), short-term vs. long-term orientation (i.e., engaging in self-interests vs. developing reciprocity and cooperation in a relationship), and psychological attachment (i.e., well-being of both partners in a relationship are dependent on each other). Based on the results, when betrayals happened, if participants felt highly committed to their partners, they were more willing to forgive their partners. On the other hand, when they felt less committed, they were less likely to forgive them. The relationship between commitment and forgiveness did not depend on the severity of betrayals. What is more, the only reason why participants forgave their partners was because of the intent to stay and not because of the long-term orientation or

psychological attachment. In other words, the more the trustor intends to remain in the relationship and be dependent on his or her partner, the more he or she is willing to forgive. The trustor reframes the betrayals by attribution them to external circumstances instead of blaming it on the trustee. Overall, all of these results show that both repair strategies used by the trustee and relationship characteristics between the trustor and the trustee play an important role in repairing the broken trust.

In deciding the intent to stay in the relationship, the trustor can also weigh the costs and benefits of continuing the relationship. Cremer and Desmet (2012) proposed a trust-repair model based on the motivational approach where the avoidance or approach motives of the trustor influenced the trustor's forgiving the trustee. When the trustor had the approach motive, he or she reframed his or her thinking and evaluated the violation in terms of benefits he or she could get out of the relationship and hence focused less on the negative connotation of the violation. In this case, apology would be effective in trust repair. On the other hand, when the trustor had the avoidance approach, he or she reframed his or her thinking and evaluated the violation in terms of threats and negative consequences of the violation and hence focused more on negative emotions following the violation and punishment towards the trustee. In this case, whether the trustor would continue having the avoidance motive or change to the approach motive depended on the sense of power and positive mood. Those with high sense of power were more likely to respond to rewards and opportunities than to threats and challenges. Likewise, positive mood puts people into a positive frame of thinking (i.e., approach motive) and towards positive outcomes (e.g., Chen, Wu, &



Chang, 2013). If the victim had high sense of power and positive mood, apology would be more likely to be effective. If not, the victim would continue having the avoidance motive, and the trust-repair process would eventually be unsuccessful. For a summary of trust repair strategies discussed thus far, please see Table 1.

Table 1

*Summary of Types of Repair Strategies and Their Effectiveness in Trust Repair*

<b>Repair Strategies</b>	<b>Citations</b>	<b>Results/Effective Strategies</b>
Apology and denial	Kim, Ferrin, Cooper, & Dirks (2004)	Apology for competence violation; denial for integrity violation
Apology and denial	Kim, Ferrin, Cooper, & Dirks (2004)	Apology given an evidence of guilt; denial given an evidence of innocence
Apology with internal and external attribution	Kim, Dirks, Cooper, & Ferrin (2006)	Apology with internal attribution for competence violation; apology with external attribution for integrity violation
Reticence	Ferrin, Kim, Cooper, & Dirks (2007)	Not effective
Promise to change and apology	Schweitzer, Hershey, & Bradlow (2006)	Trustworthy actions more effective than promise to change; apology not effective without explanation and request for forgiveness
Explanation, apology, and remedy	Elangovan, Auer-Rizzi, & Szabo (2015)	Explanation most effective if accompanied by apology and remedy
Compensation	Desmet, Cremer, & van Dijk (2010)	Voluntary compensation more effective for those with low trait forgiveness
Apology	Tomlinson, Dineen, & Lewicki (2004)	Apology with internal attribution more effective than external attribution; apology by pleasing the trustor not effective

### **The Role of Individual Differences in Interpersonal Trust Repair**

There are a few individual differences empirically tested that also played a role in trust repair. Bradfield and Aquino (1999) studied the likeability of the trustee and how it was related to forgiveness after the violation. It has been empirically supported in the literature that likeable and attractive people are perceived as good people and are less likely to receive punishment (e.g., Dion, 1972; Efran, 1974). In this study, the authors indeed found that the trustee who were likeable were more likely to be forgiven. The likeable trustee might be perceived as good persons with morals who were not likely to engage in future violations.

Switching to the role of the trustor, Eaton, Struthers, Shomrony, and Santelli (2007) studied the trustor's self-esteem in forgiving the trustee after trust violation and its interaction with apology. Self-esteem is an individual's self-worth or self-value. The authors examined two types of self-esteem: secure self-esteem and defensive self-esteem. Those with secure self-esteem knew their self-worth and self-value well and were confident in themselves, whereas those with defensive self-esteem had high narcissism and tended to engage in self-promotion and self-enhancement when there was a threat to their ego. As expected, they found that those with defensive self-esteem were less likely to forgive and more likely to avoid the trustee or engage in revenge even when the trustee apologized than when there was no apology. Those with defensive self-esteem focused more on the trustee's mistakes and remorse than the apology in order to enhance their self-worth. On the other hand, secure self-esteem acted as a buffer for those with secure self-esteem who did not need to enhance their

self-worth after trust violation; therefore, they were more likely to forgive the trustee.

Additionally, Mok and Cremer (2015) studied how forgiveness was achieved after trust violation and examined the effect of information processing style on forgiveness. They looked at global and local processing styles and their effects on forgiveness or revenge after trust violation. Those with global processing style saw a bigger picture and saw events from a broader perspective, whereas those with local processing style saw events from a narrower perspective. Results showed that those with global processing style were more likely to forgive the trustee after trust violation than those with local processing style. Furthermore, those with global processing style were less likely to avoid the trustee or engage in revenge because they perceived the violation as less severe. When people had a broader perspective on the violation, they tended to see many factors involved in the transgression, some of which might be out of the trustee's control. They were less likely to be fixated on the trustee's act of violation or remorse. Moreover, they also saw the long-term relationship with the trustee that they might have to maintain, hence being more willing to forgive the trustee. Thus, this shows that forgiveness after trust violation can be achieved through the global processing style rather than the local processing style by reframing events and behaviors into a broader perspective. Table 2 provides a brief summary of individual differences and situational factors discussed thus far.

Table 2

*Summary of Individual Differences and Situational Factors in Trust Repair*

<b>Individual Differences &amp; Situational Factors</b>	<b>Citations</b>	<b>Results/Effectiveness in Trust Repair</b>
Age	Elangovan, Auer-Rizzi, & Szabo (2015)	Older people were less likely to lose trust.
Trait forgiveness	Desmet, Cremer, & van Dijk (2010)	More likely to forgive with high trait forgiveness
Likeability	Bradfield & Aquino (1999)	More likely to forgive with high likeability
Secure vs. defensive self-esteem	Eaton, Struthers, Shomrony, & Santelli (2007)	More likely to forgive with secure self-esteem
Global vs. local processing style	Mok & Cremer (2015)	More likely to forgive with global processing style
Sincerity of trustee	Tomlinson, Dineen, & Lewicki (2004)	More likely to repair given the sincerity
Commitment to the relationship	Finkel, Rusbult, Kumashiro, & Hannon (2002)	More likely to repair given the intent to stay
Approach and avoidance motive	Cremer and Desmet (2012)	More likely to repair with approach motive
Positive mood	Chen, Wu, & Chang, 2013	More likely to put into positive frame of thinking
Timeliness	Tomlinson, Dineen, & Lewicki (2004)	The sooner, the better
Nature of relationship; future violation	Tomlinson, Dineen, & Lewicki (2004)	More likely to repair given a good relationship and low future violation

### **Trust Violation and Repair in Teams and Groups**

Although the current study does not examine trust violation and repair in teams and groups, the study of Fraser (2008) will be reviewed because similar to the current study, it used a thematic approach to analyze qualitative interview data. Therefore, it is a good source to reference especially in analyzing themes in the data and reporting examples for the themes found. Fraser (2010) compared groups that successfully repaired broken trust and groups that did not and analyzed different strategies and situational factors to explain these differences. It is to be noted that the study was conducted from the perspectives of the individual participants on the violation and repair that occurred in their own groups, and these participants did not share the same group membership. In other words, the results were individual-level and from separate experiences of trust violation and repair. Moreover, post-trust was also measured, and Fraser identified six themes of influences on successful repair after a violation. These themes are summarized in the Table 3 along with examples shared by the participants.

Table 3

*Themes and Examples of Successful Trust Repair in Fraser (2010)*

Theme	Example
Using appropriate repair strategies	"She apologized and I think it was very sincere." (p. 86)
Taking the necessary amount of time	"He met first with the three supervisors off-site. Then he met with each employee in the division – all 31 – individually for a least a half hour to tell him what was on their mind." (p. 90)
Acknowledging the contribution to violation and taking responsibility	"She knew it had an impact on us. She wanted to use this as a learning experience and hoped to be allowed to stay in the group." (p. 98)
Having the right members in the team	"There is a difference around thinkers and feelers. I think people gravitate toward certain positions and certain jobs that allow them to either be a thinker or a feeler." (p. 102)
Sharing common expectations of each other and showing professionalism and maturity	"Keep your promise, stick to your word, show people you care – I think goes a long way to develop trust. Trust is easy to develop if you are 'real' and if you are willing to risk a little of who you are." (p. 103)
Having an effective and supportive leader	"They watch how our leadership is going to handle this and we took the high road. It was an excellent model for staff." (p. 101)

### **Supplemental Literature Review**

Although not referred to using the exact same terms, there are other studied phenomena, such as psychological contract breach, organizational injustice, and remedies for these violations, which overlap considerably with the concept of trust violation and repair. Therefore, they are relevant to the current study, and the current study will selectively review some of the studies conducted on those topics and draw parallelism between them and trust violation and repair.

#### **Psychological Contract Breach**

Psychological contract exists between an employee and an organization or employer and involves mutual expectations and obligations from each other (Rousseau, 1989). There is a psychological contract breach when one party perceives that the other party violates or does not fulfill those expectations and obligations (Rousseau, 1989). Psychological contract breach is similar to trust violation in that both events happen because of unmet or changed expectations. For instance, after mergers and acquisitions, employees perceive a change in their psychological contracts that involve organizational obligations and contributions (e.g., supporting continuous education, employee development, and continuing employment) due to uncertainty and ambiguity of their roles in the new organization (Bellou, 2007).

Atkinson (2007) studied the transactional and relational contracts parallel to cognitive and affective sources of trust (e.g., Colquitt et al., 2007; Webber, 2008). The transactional contract is based on economic or instrumental obligations (e.g., fair pay), whereas the relational contract is less specific and concerns with both emotional and



financial expectations (Atkinson, 2007). According to the trust literature, individuals need to have cognitive trust first before developing affective trust, and once affective trust is developed, cognitive trust becomes less salient (Lewicki & Bunker, 1996). Atkinson (2007) found that cognitive trust was present in the transactional contract, while affective trust was mainly present in the relational contract. Furthermore, transactional contract breach led to lower cognitive trust, whereas relational contract breach led to lower cognitive and affective trust (Atkinson, 2007). Thus, this study provides the support and link between psychological contract and trust literature.

In addition, Bankins (2015) studied the process of repairing psychological contract breach with two types of coping strategies: remedies and buffers. Remedies were defined as direct and active attempts to repair the breach (e.g., seeking support from leaders and colleagues and problem solving), and buffers were indirect attempts (e.g., positive reframing of the event). The process of repair begun with trying to understand the breach (i.e., why and how it happened) followed by a stage of withdrawal where individuals' sense of the transactional contract increased, and the relational contract decreased. For example, individuals might only perform as required and would not engage in organizational citizenship behavior. If remedies were effective in repairing the breach, it led not only to overcoming the breach but also to repairing the contract as reported by renewed motivation to perform and lower turnover intentions. On the other hand, if buffers were effective, it only repaired the contract, in other words, having different expectations. All in all, this supports the trust repair literature in that the psychological contract breach coping strategies examined in

the study of Bankins (2015) are similar to the effective repair strategies studied in the trust repair literature. For instance, cognitive sense making of the breach is similar to explanation offered in repairing trust (Elangovan et al., 2015), seeking support from others is similar to supportive leader in team trust repair (Fraser, 2010), and positive cognitive reframing is similar to global and local processing style in forgiveness (Mok & Cremer, 2015).

### **Organizational Injustice**

Organizational justice is the perception of fairness at the workplace. Among the two types of justice, procedural justice is the perception that processes or procedures used to determine outcomes are fair, whereas interactional justice is the perception that individuals are treated fairly (Reb, Goldman, Kray, & Cropanzano, 2006). Van den Bos, Wilke, and Lind (1998) studied the relationship between trust and procedural justice in reactions to outcomes individuals received from an authority. They found that when there were no cues for trustworthiness of the authority, individuals' perceptions of procedural justice strongly affected their reactions to the outcomes they received such that when there was procedural justice, they positively reacted to and accepted the outcomes as fair. Furthermore, when there were trustworthiness cues, the effect of procedural justice perceptions was much weaker. Therefore, individuals use procedural justice in the place of trust, in other words, when they do not know whether they can trust the authority or not.

When injustice happens, organizations offer remedies to atone for the injustice and reduce conflicts and negative emotions (Reb et al., 2006). Reb et al. (2006)

claimed that the types of injustice should be matched with the correct types of remedies (instrumental and punitive) organizations offered in atoning the injustice, because there is a different need underlying each type of injustice. Instrumental remedy is provided through economic benefits or instrumental compensations, and it should be matched with those suffering from procedural injustice, as it indicates fair processes in the future or control over outcomes. Punitive remedy is provided through punishment or harm towards the person who did injustice (e.g., disciplinary action) and should be matched with interactional injustice, as it promotes social rules and bonds. It was found, as expected, that employees who received procedural injustice preferred an instrumental remedy, whereas those receiving interactional injustice preferred a punitive remedy. Perceptions of procedural injustice were not significantly changed after receiving an instrumental remedy, but perceptions of interactional injustice were improved after receiving a punitive remedy. Therefore, preference and effects of different remedies following organizational injustice differ, and it is important to match the type of injustice and the type of remedy like in the case of trust violation and repair (Kim et al., 2004).

### **Culture and Cultural Values**

Culture is defined as “the collective programming of the mind which distinguishes the members of one group or category of people from another” (Hofstede, 1980b, p. 260). In other words, culture consists of mental programming that is shared by the majority of members in a society and across the generations (Zou, Tam, Morris, Lee, Lau, & Chiu, 2009). Cultural values are defined as “broad

tendencies to prefer certain states of affairs over others” (Hofstede, 1991, p. 263).

People develop implicit perceptions of a society’s dominant culture from interaction and communication with members of the culture and use it as common sense to make judgements and interpret the events in everyday life (Zou et al., 2009). When communicating with others from the same or different cultures, individuals reference their cultural norms and values as a common ground (Zou et al., 2009). These cultural norms and values play a role in trust development, violation, and repair because they define the expectations individuals have regarding others, which is one of the core components of the definition of trust, and hence these cultural norms also define trust violations and choices of repair strategies to reestablish and meet a person’s expectations (Ren & Gray, 2009).

Doney et al. (1998) proposed a model of how trust is developed and influenced by national culture. They define national culture as characteristics of “a large number of individuals conditioned by similar background, education, and life experiences” (p. 607) instead of characteristics of a nation with geographical boundaries. They theorize that the development of trust depends on the national cultural values and norms, as these values and norms influence individuals’ behaviors, perceptions, and thoughts (Hofstede, 1980). In other words, the national culture leads to the cultural norms and values which influence cognitive processes, and through these cognitive processes, trust is built. Their model focuses on the role of national culture in trust development through cognitive processes, although there are other factors affecting trust development, such as organizational factors, individual differences, and non-cognitive

processes (e.g., affect).

In Doney and colleagues' (1998) model, the national culture values examined include relation to self, relation to authority, and relation to risks. For instance, based on Hofstede's (1980) cultural dimensions, individualism-collectivism reflects relation to self; power distance deals with relation to authority, and uncertainty avoidance concerns with relation to risks. In the cognitive processes, Doney and colleagues (1998) present five alternative processes through which trust is built: calculative (weighing cost and benefit), prediction (predicting the trustee's behaviors in the future), intentionality (the trustee's motivation), capability (the trustee's competence and expertise to meet expectations), and transference (through a third party). Overall, they propose that different cultural values influence the development of trust via different cognitive paths. For instance, regarding relation to self, individuals with high individualism or masculinity values develop trust via a calculative process as they weigh costs and benefits of trusting others to promote their self-interests. On the other hand, those with high collectivism or femininity values develop trust via a prediction process as they want behaviors consistent with the cultural values and promote harmony among in-group members.

Although Doney and colleagues (1998) do not include trust violation and repair in their model, the current study uses their proposed model to speculate that there are underlying assumptions and expectations about individuals' behaviors based on the cultural norms and values. When these assumptions and expectations are violated or unmet, trust violation is said to occur. Likewise, to successfully repair the

broken trust, the repair strategies should be consistent with the violated party's underlying cultural assumptions and meet expectations based on their norms and values. Furthermore, like Doney and colleagues' (1998) theorization of national culture, the current study also examines cultural values as personally-held individual values instead of the aggregated culture of a nation. This also reflects the current global economy where cultural boundaries become less clear (Doney et al., 1998) and better captures variations of individuals and subgroups under a nation's dominant culture.

Moreover, Zou et al. (2009) also studied the role of individuals in cultural values affecting social perceptions and judgement. Specifically, they examined the role of individuals' perception of consensus (i.e., what is perceived to be consensually shared by the members of a particular culture) in the influence of culture on social judgment. Perception of consensus is different from prototypical representations of a culture as it is the individuals' subjective perception and does not reflect objectively shared beliefs. They found that individuals' perception of consensus significantly predicted social judgement; in other words, individuals might not always show the nation's dominant culture stereotypes and biases because they have their own subjective view of the national culture. Additionally, they also found that the country did not moderate the relationship between perception of consensus and social judgment such that there was an influence of individuals' perception of consensus on cognition regardless of the country they were from. Taken together, this not only supports that cultural values matter in trust development, violation, and repair, but also

justifies the use of cultural values as individual differences in the current study.

## CHAPTER THREE: DEVELOPMENT OF HYPOTHESES

### **Cross-Cultural Interpersonal Trust Violation and Repair**

There is little research on the dynamics of trust violation, strategies of repairing trust, and their effectiveness across different cultures. Among a few studies that examined the topic, Kuwabara and colleagues (2014) examined the relationships between generalized trust and the timing of violations across participants from the United States and Japan. Generalized trust is the general tendency to trust people, including strangers. The U.S. has a high-trust culture because the long-term relationships are mobile. Japan, on the other hand, has a low-trust culture because it is a collectivistic culture with stable social connections. They found that trust violation in the early establishment of relationship was more damaging to the relationship only among Americans but not among Japanese. Trust violation was more damaging to the relationship if it happened at a later time only for Japanese because the violation threatened the stability of the relationship. In addition, generalized trust not only was higher among Americans, but also mattered more for them. In early trust violation, the higher the generalized trust, the more likely that Americans could fully cooperate. In contrast, generalized trust was lower among Japanese and did not matter much.

In addition to differences in trust development and violation, trust repair can mean different things in the U.S. and Japan, and particularly, the effectiveness of trust repair strategies differs. In the study of Maddux and colleagues (2011), for Americans, apology meant the trustee taking personal blame for the violation, whereas for Japanese, apology meant the trustee showing remorse. Additionally, because Japanese



were less likely to equate the violation with personal blame, they were less likely to attribute negative information about integrity violation to the trustee, and thus, apology was more effective after integrity violation for Japanese. However, there was no difference between the two cultural groups in the effectiveness of apology after a competence-based violation. These findings showed the cultural differences across the U.S. and Japan such that the amount of time people in different cultures took to develop trust was different and that individual differences could also play a role. To sum up, Japanese tend to take longer to develop trust, build the relationship through some forms of exchanges between parties involved, and are less tolerant of trust violations in a later time after the relationship is established. Apology will also be more effective in repairing trust with Japanese after integrity violation.

Ren and Gray (2009) considered the role of culture in trust violation and proposed a theoretical framework of the effectiveness of trust repair depending on violation types and culture. Two types of violation were identity violation and violation of control. Identity violation happened when the victim's identity was challenged or threatened and when the victim lost face, because the violator broke the expectations of being respectful and considerate of the victim. Violation of control occurred when the victim's ability to influence over something or someone was challenged. Violation of control broke the expectancy and equity norms and challenged the expectations that resources would be fairly allocated and distributed. In addition to the types of violation, individualistic and collectivistic cultures were also examined for their effects on trust repair. Individualistic culture emphasizes having a

unique, independent self from the group, one's own achievements, and needs.

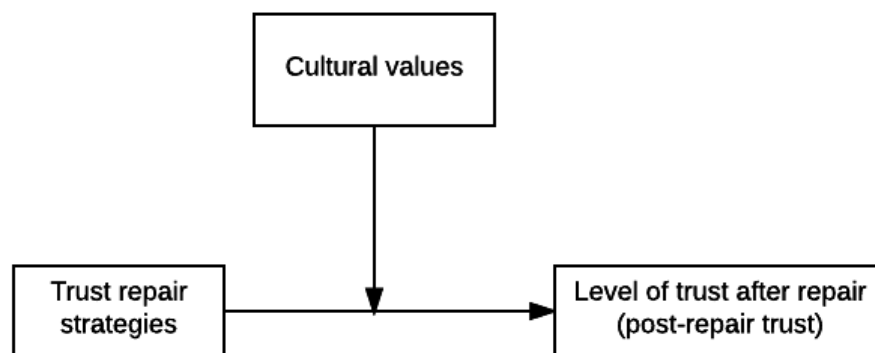
Collectivistic culture emphasizes relatedness to the group, conformity, and meeting others' needs (Hofstede, 1980a).

Ren and Gray (2009) proposed that the collectivistic violators were more likely to suppress negative emotions after trust violation and to use indirect means of communication because direct confrontations would challenge the stability of the relationship. Moreover, after identity violation, an explanation and apology through a third party as well as a demonstration of concern and consideration towards the victim would be more effective for the collectivistic violators to repair trust than for the individualistic violators. Similarly, after violation of control, not only reframing the situation and giving a genuine explanation through a third party but also showing guilt and offering redemption privately would be more effective for the collectivistic violators than for the individualistic violators. Although this study was not an empirical study, it explored possible cultural differences in the effectiveness of strategies to repair trust.

### **The Current Study**

In addition to the limited cross-cultural research on trust violation and repair, there is also little research on psychological contract breach and organizational injustice in the cross-cultural context. Given this lack of foundational knowledge regarding the effectiveness of trust repair strategies across cultures, the current study examined the impact of several cultural values on the effectiveness of repair strategies on trust repair. Individuals are conditioned by their cultural values and influences to

perceive the same thing differently (Hofstede, 1980a). In the context of trust violation and repair, what the trustee does to repair broken trust will be perceived differently by trustors with different cultural values. Therefore, the current study hypothesized that the effectiveness of different repair strategies would depend on individuals' personally held cultural values (Figure 1).



*Figure 1.* Overarching model tested in the current study.

The current study examined cultural values as individual differences instead of comparing across countries or national cultures because it used archival data, and there were many subgroups within a country or region. The nature of the data and participants was further described in the methods section. Moreover, the country's culture is based on "meaningful clusters of behaviors based on a particular cultural logic" (p. 15), and there are individual as well as subgroup differences within a particular culture (Leung & Cohen, 2011). In other words, there are variations in to what extent individuals and subgroups identify with or reject the country's culture. Thus, in order to better capture such variations, the current study used individuals' personally held cultural values instead of categorizing individuals based on their

country of origin.

The current study focused on the four types of repair strategies that Ren and Grey (2009) proposed: account, apology, penance, and demonstration of concerns. Account is an explanation offered to reduce, deny, or explain the violation event and the trustee's culpability. Apology is a statement that acknowledges the harm done and signals guilt and regret. Penance is compensation offered for the negative consequences from the event. Finally, demonstration of concerns is showing care, concern, and benevolent intentions that the trustee has the trustor's best interests in mind (Ren & Gray 2009). These four repair strategies both integrated effective repair strategies the literature has previously studied, but also expanded what the literature has found by including a relatively understudied strategy, demonstration of concerns. For example, Kim and colleagues (2004; 2006) studied apology and denial, which Ren and Gray (2009) categorized as apology and account respectively. Schweitzer et al. (2006) examined promise to change and trustworthy actions which fall under apology and penance in Ren and Gray (2009). Elangovan et al. (2005) studied explanation which is account as proposed by Ren and Gray (2009). Desmet et al. (2010) and Gibson et al. (1999) examined compensation, which Ren and Gray (2009) called penance. Taken together, the current study incorporates and advances the literature on trust violation and repair by combining different operationalized definitions of trust repair strategies used in the literature (see Table 4) and by also testing a new repair strategy (demonstration of concern) proposed by Ren and Gray (2009).

Table 4

*Trust Repair Strategies and Their Operationalized Definitions*

<b>Trust Repair Strategies</b>	<b>Operationalized Definitions</b>
Account	Deny, reduce, and/or explain culpability External attribution Give reason or explanation Compare the trustor to someone less well off
Apology	Willingness to take responsibility Showing regret, guilt, or repentance Acknowledging of misconduct or harm done Promising not to repeat Asking for forgiveness
Penance	Any type of compensation while taking responsibility (internal attribution) Suffering a punishment Putting in a lot of effort or more effort given the second chance Showing a change in behavior
Demonstration of Concerns	Benevolence towards the victim Being considerate or nice to the victim Taking care of the victim's needs, wants, or interests

Moreover, among many cultural values, the current study selectively reviewed some cultural values that were hypothesized to significantly impact the effectiveness of the chosen trust repair strategies. These cultural values included tolerance of ambiguity, masculinity, femininity, honor, face, and dignity, fatalism, individualism, and power distance (Aslani et al., 2016; Budner, 1962; Hofstede, 1980a; Solomon, 2003). As reviewed in the Culture and Cultural Values section, individuals' cultural values play a critical role not only in the development of trust but also in the perception of trust violation and repair, as these values define the assumptions, norms, beliefs, and expectations of the trustor (Doney et al., 1998). When they are unmet or conflict with others, trust violation happens, and similarly, the effective trust repair effort should be directed towards meeting these expectations and assumptions and promoting the trustor's cultural values and beliefs.

Because the current study used archival data, it selected the cultural values from a battery of individual differences in the archival data that logically and/or theoretically supported the conceptualization of how trust repair effort should satisfy or promote the violated party's cultural norms, beliefs, and assumptions. Moreover, as trust repair is defined by "making a trustor's trusting beliefs and trusting intentions more positive" (Kim et al., 2004, p. 105), the cultural values were selected as they were expected to reduce negative experiences and emotions associated with the violation and reestablish positive beliefs and intentions of the trustor. Furthermore, because there is very little research that directly studies the proposed cultural values in the trust violation and repair context, the current study developed hypotheses based on

other related research where there was a problem between individuals, and they needed to resolve it (e.g., cross-cultural research on conflict resolution or negotiation).

Additionally, the current study examined the effectiveness of trust repair strategies by studying the most and least effective strategies depending on the trustor's cultural values. In the archival data, the interview questions were designed to capture whether trust was regained after the violation. When participants shared their trust repair experiences, they were examples of successful repair to some degree. Therefore, instead of measuring the effectiveness of trust repair strategies as effective or ineffective, the current study examined which repair strategy was most or least effective compared to other repair strategies.

### **Account**

**Tolerance for Ambiguity.** Despite many definitions and measurements (Furham & Marks, 2013), the core idea of tolerance for ambiguity is individuals' tendency to "perceive ambiguous situations as desirable" (Budner, 1962, p. 29). Tolerance for ambiguity is important and desirable in the cross-cultural context, because there can be a lot of ambiguity and unknown especially at the beginning when individuals might not be familiar with a particular culture. For instance, tolerance for ambiguity is theoretically predicted to be related to different cross-cultural phenomena, such as cross-cultural communication and competence, cross-cultural changes and adjustments, and global leadership effectiveness (Herman, Stevens, Bird, Mendenhall, & Oddou, 2010). Moreover, individuals with high tolerance for ambiguity can adapt well to failures and changes, whereas those with low tolerance for

ambiguity might feel threatened and uncomfortable with ambiguity (Budner, 1962; Endres, Chowdhury, & Milner, 2009). The former also perceive high control over the environment, and therefore, are more confident in their decision making (Budner, 1962; Endres et al., 2009). Furthermore, in performing highly complex tasks, those high in tolerance for ambiguity report higher self-efficacy which results in higher performance than those low in tolerance for ambiguity, because the latter underestimate their ability to perform high complex tasks (Endres et al., 2009). However, in some situations, tolerance for ambiguity might lead to negative outcomes, as individuals high in tolerance for ambiguity tend to make riskier choices (Furham & Marks, 2013).

To apply tolerance for ambiguity in the trust violation and repair context, there is some ambiguity inherent in terms of why the trustee is no longer consistent with the positive expectations the trustor used to have or how the violation happens. The trustor who is low in tolerance for ambiguity wants or has the need to seek information to reduce this ambiguity. Based on the operationalized definitions of an account, it includes some information to reduce, deny, or explain the violation event and the trustee's culpability by making an external attribution (i.e., external factors causing the violation). A reason, explanation, or even denial can be considered information regarding the violation, and therefore these repair strategies give more insights into the event and about the trustee, reducing ambiguity. Account influences the trustor's perceptions or expectations on the trustee such that by making an external attribution, the trustee shows that there was no malicious intention in the violation, and it was



beyond the trustee's control (Ren & Gray, 2009). The trustor also now explicitly knows through the account that the trustee does not have bad intentions towards the trustor, and it is likely to increase trust. Moreover, the account gives the trustor a frame of reference and puts the event into perspective so that if the trustor has any misunderstanding or negative cognition, the account can reduce it and reestablish the trusting beliefs and positive expectations of the trustor.

Comparing to other repair strategies, the operationalized definitions of apology include showing guilt and acknowledgement of the harm done while those of demonstration of concerns center around the trustee being nice and benevolent towards the trustor. Although apology includes acknowledge of the harm done, these particular repair strategies do not directly address the violation event nor provide information about why it occurred. Those low in tolerance for ambiguity are likely to feel uncomfortable with not having the information and feel threatened in ambiguous situations (Budner, 1962; Endres et al., 2009). Moreover, the trustor might not know how to make sense of the event and the trustee, in other words, what to expect from the trustee, failing to reestablish positive expectations and intentions. Therefore, apology and demonstration of concerns are not expected to reduce negative emotions or cognition associated with the violation for those low in tolerance for ambiguity. In addition, penance (offering compensation and taking responsibility) might be more effective than apology and demonstration of concerns in that penance can reduce the negative consequences associated the violation. However, it still does not provide information regarding the motivation behind the event itself, and the trustor might not

know what to expect from the trustor in the future, failing to reestablish trusting intention and vulnerability. Taken together, an account best fits the cultural expectations and values of those low in tolerance for ambiguity, and therefore, it is expected that an account would be most effective in processing the violation and the repair process for them.

*Hypothesis 1a: When the trustor is low in tolerance for ambiguity, an account from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).*

**Masculinity-Femininity.** One of the major cultural dimensions that Hofstede (1980b) introduces regarding social gender roles is masculinity and femininity. Masculine culture is characterized by values such as “assertiveness, the acquisition of money and things” (Hofstede, 1980b, p. 46), whereas feminine culture is characterized by values, such as “caring for others, the quality of life, or people” (Hofstede, 1980b, p. 46). In other words, individuals with high masculinity values emphasize stereotypical male orientation, such as assertiveness, accomplishment, and challenges, whereas those with high femininity values emphasize stereotypical female orientation, such as care and warmth, relationship, cooperation, and concern for environment (Leung, Bond, Carment, Krishnan, & Liebrand, 1990). In conflict resolution, individuals can respond or engage in different behaviors based on their masculinity and femininity. For example, individuals with masculinity values perceive aggression to be an acceptable norm in response to a humiliating conflict, and therefore, ruminate

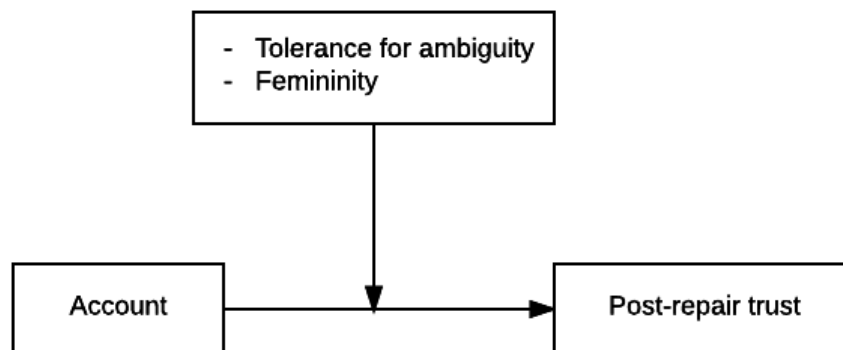
and maintain anger and aggression compared to individuals with femininity values (Coleman, Goldman, & Kuglar, 2009). In addition, those with femininity values prefer strategies that enhance harmony and cooperation, whereas those with masculinity values prefer competitive and confrontation methods in resolving conflicts (Leung et al., 1990). Similarly, the former will engage in more constructive behaviors in conflict resolution than the latter (van Oudenhove, Mechelse, & de Dreu, 1998).

Applying masculinity-femininity to the trust violation and repair context, individuals who are high in femininity respond best to modesty, cooperation, caring for each other, and expressing kindness. By the operationalized definitions of an account, it does not include expressing these feminine behaviors or addressing them. In other words, account focuses on the trustee and does not signal cooperation or holding the trustor's best interests by simply giving reasons for the violation or denying the trustee's culpability. It also does not enhance the relationship between the trustor and the trustee, which is the core aspect of femininity (Hofstede, 1998). In that case, the trustor is unlikely to restore the positive beliefs and intentions, and the amount of trust might even decrease due to the impersonal nature of the account. Therefore, by using an account, the trustee neither satisfies the cultural values nor fits with the cultural norms and expectations of the trustor who is high in femininity.

In comparing with other repair strategies, demonstration of concerns will be effective in repairing the broken trust. Through demonstrations of concerns, the trustee shows that he or she cares about the trustor and their relationship, and the trustor would feel valued and experience positive emotions. It also indicates that the trustee is

not motivated by self-interests; rather, it indicates that the trustee holds the trustor's best interests in mind and wants to keep harmony in the relationship. Therefore, the trustor would have a positive experience, and the relationship is expected to improve because of the trustee's demonstration of concerns. In addition, apology involves asking for forgiveness and acknowledgment of guilt and the violation event, so it indicates that the trustee attempts to show modesty and promote harmony in the relationship, making it more effective than account. Finally, by offering penance or some form of compensation, the trustee at least considers the consequences the trustor suffers and tries to make up for it, hence enhancing the relationship. Taken together, an account does not address any of the feminine values or the trustor-trustee relationship, but other repair strategies each to some extent address the feminine values and/or improve the trustor-trustee relationship in some ways. Therefore, an account is expected to be least effective trust repair strategy for those high in femininity.

*Hypothesis 1b: When the trustor is high in femininity, an account from the trustee will be least effective in repairing the broken trust (i.e., lowest post-repair trust).*



*Figure 2.* Hypotheses regarding the use of accounts.

## Apology

**Honor, Face, and Dignity.** Many cultural theories (e.g., individualism-collectivism) study social identity in terms of how the development of social identity is influenced by individuals' social roles in the culture in which individuals grew up or in which individuals are currently embedded (Aslani et al., 2016). Self-worth is the basis of social identity and is defined as an individuals' perception of their value or worth in the society. There are three types of self-worth: honor, face, and dignity. Honor is "based on an individual's reputation and also his/her own assessment of what others think" (Aslani et al., 2016, p. 1180). Face is "based on others' assessment of whether the individual is fulfilling stable social role obligations" (Aslani et al., 2016, p. 1179). Dignity is "based on the individual's achievements in pursuit of the individual's goals and values (Aslani et al., 2016, p. 1179), and unlike honor and face, dignity does not depend on others' opinions of the individuals. Those with dignity values define the self independently of others, or sometimes against how others think

of them or what others know about them, whereas those with face and honor values define themselves incorporating others' opinions and what others know about them (Kim, Cohen, & Au, 2010).

In dealing with conflicts, if insulted, individuals with high honor value experience negative emotions and have higher intentions to engage in competitive behaviors to win the conflict situation compared to those with low honor value (Peersma, Harinck, & Gerts, 2003). This might be because those with honor value promote confrontation especially when facing a false accusation to defend their honor (Cross, Uskul, Gerçek-Swing, Alokkan, & Ataca, 2012). However, if not insulted, those with honor values resolve conflicts constructively even more so than those with dignity values (Harinck, Shafa, Ellemers, & Beersma, 2013). Additionally, in negotiations, those with honor and face values tend to be competitive in interactions and negotiations, and their motive is to promote their social status and interests especially in a new business relationship, while those with dignity values tend to be cooperative and share information to benefit both parties involved (Aslani et al., 2016). In an extreme situation, those with high honor values even prioritize their honor above their basic needs, such as health and safety (Pely, 2011).

After a trust violation occurs, the trustor has to deal with negative consequences or emotions associated with the event, and the trustor's honor or face might be threatened. Because honor and face are one's self-worth extrinsically derived, an apology from the trustee is expected to help the trustor save his or her face or honor from the violation. It can also increase the trustor's self-worth because

apologizing and asking for forgiveness put the trustee in a humble position compared to the trustor. Thus, it increases the feeling of being valued and positive emotions associated with the trustee. Moreover, one of the operationalized definitions of apology is promising not to repeat the event in the future, so there is a reduced possibility for the trustor to lose face or honor in the future, making the trustee's intentions more positive. Finally, as suggested by Ren and Gray (2009), apology indicates that the violation event should not be the most accurate or complete reflection on the trustee, and therefore, it restores the positive expectations of the trustor. Thus, by apologizing, the trustee behaves in a way that best meets the expectations and values of the trustor high in honor and face to repair the damaged trust.

In comparing apology to other repair strategies for those high in honor and face, account focuses on the trustee who explains or denies his or her culpability in the violation event and focuses more on the trustee's self-interests than the trustor's honor and face. In other words, it does not directly address whether or how the trustor can save his or her face and restore the honor. Likewise, it might be hard to compensate for the negative consequences of losing face or honor, as honor and face depend on others' assessment of the trustor. The trustee cannot always change everyone's opinions of the trustor as it is outside of the trustee's control. In addition, demonstration of concerns might increase the trustor's self-worth in general because the trustor is treated nicely and feels valued, but it does not directly address how to deal with restoring face and honor. None of these repair strategies enhances the values

of those high in honor and face nor restores trusting beliefs and intentions of the trustor that the trustee can be trusted not to make the trustor lose face or honor in the future. Taken together, compared to apology, other repair strategies do not fully fulfill the cultural values and expectations, and therefore, apology is expected to be the most effective repair strategy for those high in honor and face.

*Hypothesis 2: When the trustor is high in honor and face, an apology from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).*

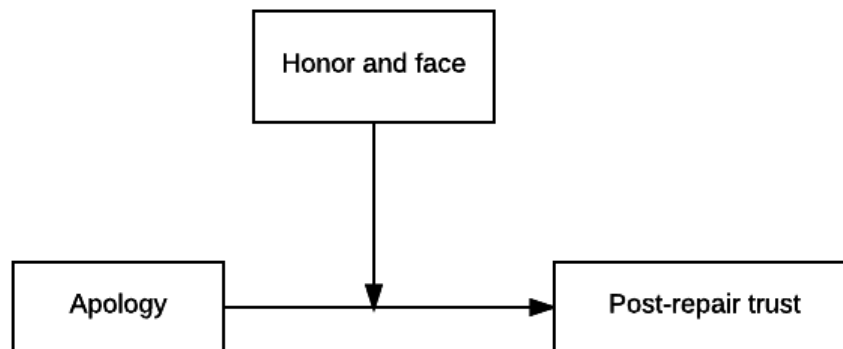


Figure 3. Hypotheses regarding the use of apologies.

## Penance

**Individualism.** Another major cultural dimension that Hofstede (1980a) introduces regarding individuals and their relations with other individuals or groups is individualism and collectivism. In individualistic cultures, individuals prioritize their own interests, goals, and accomplishments over the groups they are a part of and are



expected to be independent and self-reliant. In collectivistic cultures, individuals value the groups' interests and goals and sacrifice their personal ones for the groups' goals. In individualistic cultures, in-group versus out-group distinction is not emphasized, whereas in collectivistic cultures, individuals are expected to be loyal to, be caring, and protect the in-group members (Hofstede & Bond, 1984). Masculinity and femininity are different from individualism and collectivism in a number of ways. Masculinity is concerned with ego enhancement, and femininity is concerned with relationship enhancement, whereas individualism is concerned with oneself and one's independence from others especially in-group members, and collectivism is concerned with one's dependence on others (I vs. we; Hofstede, 1998).

In handling disagreements, individualists tend to rely on their own experiences and training, as it is expected of them to be self-reliant and self-sufficient; on the other hand, collectivists rely on rules and procedures (e.g., consultation and mediation), as they try to avoid negative emotions associated with disagreements and to promote harmony within the group (Smith, Dugan, Peterson, & Leung, 1998). Similarly, individualists prefer to use a dominating style that promotes their interests in resolving conflicts than obliging or avoiding style (Konaraju, Dollinger, & Lovell, 2008). When being held accountable in negotiations, individualists and collectivists engage in behaviors consistent with their social cultural norms such that individualists are more competitive while collectivists are more cooperative (Gelfand & Realo, 1999).

Based on the literature, individualism focuses on independence and taking care of or taking responsibilities of oneself. By the definition of penance, penance indicates

that the trustee is taking responsibility of the violation and offering some type of compensation. Therefore, it is most consistent with the expectations of the trustor who is high in individualism, reducing negative perceptions of the trustee. Similarly, putting in effort also reflects positively on the trustee and signals less chance of another violation in the future. For example, the trustee violated the trustor's trust by not performing what the trustee was supposed to in one project, but in the following project, the trustee put in more effort to compensate for what he or she did in the first project. In such case, the trustee shows that he or she can be independent and can do the job well on his or her own, and it can make the experience more positive. In addition, compensation itself can also reduce the negative consequences from the violation event, such as the trustee paying for the financial loss, and it can also make the trustor feel better about the event, such as the trustee getting disciplinary action for the wrongdoing.

Comparing to other repair strategies for those high in individualism, an account does not necessarily mean that the trustee takes responsibility of the event or its consequences. It simply provides explanation or reduces the trustee's culpability by making an external attribution. The same goes for demonstration of concerns such that it does not directly indicate that the trustee takes responsibility of what happened. In fact, these strategies might reflect negatively on the trustee, because they are not consistent nor promote the values of those high in individualism. In other words, they might create negative expectations of the trustor and decrease trust even more. Furthermore, apology might be more effective than account and demonstration of

concerns as it includes acknowledge of the violation and willingness to take responsibility, but compared to apology, penance “carries the strongest admission of guilt” (p. 110) and full responsibility by the trustee (Ren & Gray, 2009), hence making it more effective than apology. Taken together, by using penance, the trustee demonstrates what best fits with the cultural values of those high in individualism, and therefore, penance is expected to be most effective compared to other repair strategies.

*Hypothesis 3: When the trustor is high in individualism, penance offered from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).*

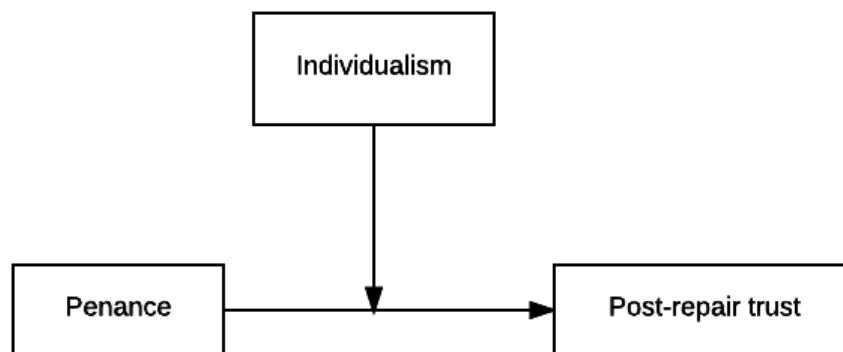


Figure 4. Hypotheses regarding the use of penance.

### **Demonstration of Concerns**

As reviewed above, individuals with high femininity value characteristics such as care, warm, cooperation, and harmony, while those with high masculinity value traditional male characteristics, such as achievement, accomplishment, and challenges. The operationalized definitions of the demonstration of concerns include showing

concerns, consideration, or benevolence towards the trustor following the violation event. Demonstration of concerns indicates good intentions that the trustee has towards the trustor as well as the trustee's motivation which is not driven by self-interests. Being cared for and treated nicely makes the trustor feel good about themselves, as well as being benevolent without expecting anything in return makes the trustee vulnerable. It shows that the trustee is trustworthy and makes the experience and trusting intentions more positive. Therefore, it reduces the negative emotions and cognitions associated with the violation event for those high in femininity values. It also attempts to keep harmony and cooperation with the trustor and is consistent with and promotes the beliefs and values of those high in femininity. When consistent with the trustor's expectations, the amount of trust should also increase.

On the other hand, demonstration of concerns is not consistent the norms and values of those high in masculinity such that it does not provide positive outcomes (e.g., success) or reduce negative consequences from the violation event and that it does not enhance the trustor's ego, which is the core aspect of masculinity (Hofstede, 1998). It also does not reduce negative perceptions of the event or might even reflect negatively on the trustee, because the trustee's demonstration of concerns indicate that the trustee is guilty of the harm done, which can sometimes be more detrimental to trust (Kim et al., 2004). Therefore, by using the demonstration of concerns, the trustee best expresses the cultural beliefs and values of individuals high in femininity but least expresses those of individuals high in masculinity.

In comparing with other repair strategies for those high in femininity, account focuses on the role of the trustee in the violation event by explaining or denying the event, and it indicates the trustee's motivation driven by self-interests, failing to reestablish positive intentions of the trustee. It also does not fulfill the femininity value of showing care, warmth, and cooperation with the trustor, thus failing to reestablish the consistent expectations of the trustor and the positive relationship between the trustor and trustee. Additionally, although apology shows humbleness, and penance shows consideration in some form of compensation for the trustor, they do not address a wide range of femininity values like demonstration of concerns. On the other hand, for those high in masculinity, account can reduce negative perceptions of the event as well as improve the trustor's perception of their role in the event, as it provides a frame of reference (Ren & Gray, 2009). So, the trustor might be able to maintain their ego and not associate with the negative consequences from the event. What is more, apology and penance enhance the trustor's ego, as they both indicate some humbleness from the trustee, making them more effective than demonstration of concerns. Taken together, compared to other repair strategies, demonstration of concerns addresses all feminine values, improves the relationship, and therefore, is expected to most effectively repair the broken trust for those high in femininity. But, other repair strategies address more masculine values than demonstration of concerns, hence expecting it to be least effective for those high in masculinity.

*Hypothesis 4a: When the trustor is high in femininity, demonstration of concerns from the trustee will be most effective in repairing the broken trust*

(i.e., highest post-repair trust).

*Hypothesis 4b: When the trustor is high in masculinity, demonstration of concerns from the trustee will be least effective in repairing the broken trust (i.e., lowest post-repair trust).*

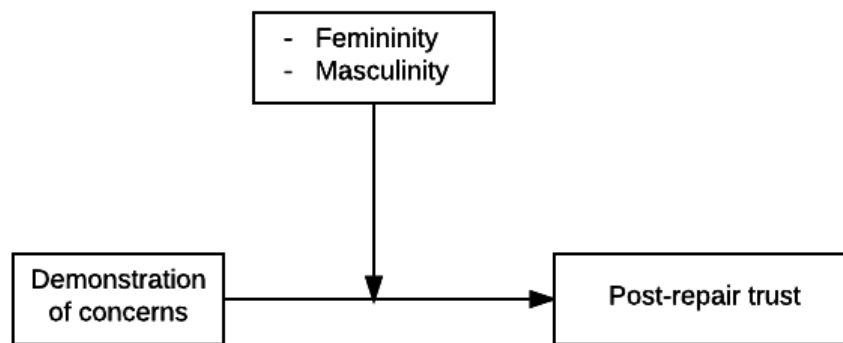


Figure 5. Hypotheses regarding the demonstration of concerns.

### Supplemental Analysis

**Fatalism.** Fatalism is the belief that something happens because it has to, and there is a sense of necessity in the belief (Solomon, 2003). Fatalism does not explain the causes of what happens but focuses on its significance to make sense of what happens in life (e.g., death; Solomon, 2003). Fatalism is mostly studied regarding religion, death, and safety behaviors. For instance, those high in fatalism use their cultural beliefs in fatalism and karma (i.e., the belief that something happens to individuals because of what they did in their previous lives) to explain their awareness of death and reduce the anxiety associated with inevitable death (Yen, 2013).

Heiniger, Sherman, Shaw, and Costa (2015) also examined fatalism and healthy

behaviors, such as exercise, nutrition, and medical screening among Asian immigrants and Caucasians. They found that fatalism belief did not always result in unhealthy behaviors, and Chinese immigrants, although high in fatalism, showed better healthy behaviors, especially exercise. This might be because they did exercise to reduce any negative effects associated with fatalism, or they believe in both fatalism and living a healthy life style. Caucasians high in fatalism, however, showed less healthy behaviors. What is more, employees high in fatalism are less likely to engage in safety practices and have negative safety-related attitudes. For instance, those employees would see safety as a roadblock to production and would engage in risky behaviors for higher production in expense of safety (Henning, Stufft, Payne, Bergman, Mannan, & Keren, 2009).

When trust violation occurs, individuals who are high in fatalism may think of trust violation as if it is something that is supposed to happen. It is no one's fault, so the trustee does not need to feel guilty or apologize for it. The trustor might have negative experiences and emotions from the violation event, but might overcome them on his or her own because the trustor believes that it is supposed to happen and beyond the control of the trustor and trustee. The trustor might also still have relatively positive belief and intentions on the trustee. In comparing to other repair strategies, through an account, the trustee gives information or explanation about the violation event, so the trustor can make sense of the event. Those high in fatalism uses their cultural belief to make sense of inevitable events (e.g., death) and reduce their anxiety (Yen, 2013). Similarly, account will be helpful in understanding what happened and

reducing negative emotions associated with it. In addition, as the trustor believes that the violation is supposed to happen, he or she would believe that like apology, penance and demonstration of concerns would not be necessary. In fact, post-repair trust of those high in fatalism will still be high whether they receive apology, penance, or demonstration of concerns. Therefore, instead of forming a hypothesis for the most ineffective repair strategy out of apology, penance, and demonstration of concerns for individuals high in fatalism, a research question was asked to explore which repair strategy would be comparatively ineffective.

*Research Question 1: Which trust repair strategy will be ineffective for the trustor who is high in fatalism?*

**Power Distance.** Power distance refers to how power equality is perceived and is defined as “the extent to which the less powerful member of institutions and organizations within a country expect and accept that power is distributed unequally” (Hofstede, 1991, p. 28). Those high in power distance accept that individuals in positions of authority or high status hold the power, whereas those low in power distance treat each other as relatively equal. In conflict resolution with their managers, those low in power distance prefer to use consultative, cooperative conflict resolution strategies, whereas those high in power distance prefer authoritarian or autocratic styles (van Oudenhoven et al., 1998) as they are more influenced and persuaded by the expertise of the source (Pornpitakpan & Francis, 2000). Likewise, in managing employees at the workplace, those low in power distance use soft influence tactics



more frequently, whereas those high in power distance use harsh tactics more (Koslowsky, Baharav, & Schwarzwald, 2011). Some of the soft tactics include “expertise, reference, information, and legitimacy of dependence” (Koslowsky et al., 2011, p. 266), while harsh tactics include “personal and impersonal coercion, personal and impersonal reward, legitimacy of position, equity, and reciprocity” (Koslowsky et al., 2011, p. 266). Furthermore, in evaluating authority figures who serve as a third party in resolving conflicts or disputes, the evaluators who are low in power distance pay more attention to the relational aspect of their relationship and care more about how they are treated, as they see the authority figures as equal. On the other hand, those high in power distance weigh more on the favorability of instrumental outcomes and care less about the relational factors (Tyler, Lind, & Huo, 2000).

In the trust violation and repair context, a three-way interaction needs to be considered between power distance of the trustor, the power level or positional status of the trustee, and the trust repair strategy. Based on the operationalized definitions of penance, it includes offering some forms of compensation and taking responsibilities, such as changing the behavior or suffering a punishment, to make up for the violation and the consequences. If the trustor is high in power distance, and the trustee is lower in status (i.e., lower power level), penance from the trustee may be expected and appropriate, because it supports power inequality and shows respect to the trustor who is in the position of authority. Similarly, if the trustor is high in power distance, and the trustee is higher in status (e.g., the trustor’s supervisor), the trustee may not be expected to provide penance in the first place, because the trustor is not in the position

to question the trustee's decisions and behaviors but to follow them. Therefore, in the case of the trustor being high in power distance, the effectiveness of penance likely depends on the power status of the trustee.

On the other hand, if the trustor is low in power distance, the status of the trustee might not matter much, as the trustor likely sees the trustee as relatively equal regardless of their status or authority. To compare the repair strategies, the operationalized definitions of apology include acknowledge of the guilt and the harm done and asking for forgiveness, while demonstration of concerns includes benevolence towards the trustee. By offering both apology and demonstration of concerns, the trustee shows that he or she cares about the trustee and acknowledges the violation event, and both repair strategies focus on the relationship between the trustor and the trustee. As those low in power distance weigh relational factors more than instrumental outcomes in resolving conflicts (Tyler et al., 2000), apology and demonstration of concerns satisfy the trustor's cultural value and are expected to be effective in repairing the broken trust.

Compared to apology and demonstration of concerns, account and penance are more impersonal in their nature and do not focus on the relational aspect. In other words, account and penance do not fit with the cultural value of power distance, and therefore, are expected to be less effective in repairing the broken trust than apology and demonstration of concerns. However, the status of the trustee is not considered in these propositions. The status of the trustee, which inherently has differential power, adds more complications to the power dynamics between the trustor and trustee and

the interaction with the repair strategies. Due to the complexity of the three-way interaction, and the uncertainty in whether or not the archival data collected would include enough variability in trustor-trustee power dynamics to appropriately test for these relationships, an exploratory research question was asked:

*Research Question 2: What trust repair strategy will be ineffective for the trustor who is low in power distance and depending on the status of the trustee?*

**Combination of Repair Strategies.** Last, but not least, it is possible that the trustee may use more than one repair strategy simultaneously or sequentially to repair the broken trust, therefore the current study also explored a combination of repair strategies that individuals with different cultural values might use in the repair process. Instead of developing a specific hypothesis for it, the current study asked an exploratory question as follows. For a summary of all proposed hypotheses and research questions, please see Table 5.

*Research Question 3: What combination of trust repair strategies is most effective in repairing trust depending on the trustor's cultural values?*

Table 5

*Summary of Hypotheses and Research Questions*

Hypotheses	Descriptions
H1a	When the trustor is low in tolerance for ambiguity, an account from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).
H1b	When the trustor is high in femininity, an account from the trustee will be least effective in repairing the broken trust (i.e., lowest post-repair trust).
H2	When the trustor is high in honor and face, an apology from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).
H3	When the trustor is high in individualism, penance offered from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).
H4a	When the trustor is high in femininity, demonstration of concerns from the trustee will be most effective in repairing the broken trust (i.e., highest post-repair trust).
H4b	When the trustor is high in masculinity, demonstration of concerns from the trustee will be least effective in repairing the broken trust (i.e., lowest post-repair trust).
R1	Which trust repair strategy will be ineffective for the trustor who is high in fatalism?
R2	What trust repair strategy will be ineffective for the trustor who is low in power distance and depending on the status of the trustee?
R3	What combination of trust repair strategies is most effective in repairing trust depending on the trustor's cultural values?

## CHAPTER FOUR: METHOD

### **Design & Measures**

The current study used archival data to test its hypotheses and research questions, and these archival data were drawn from the Florida Institute of Technology's Relationship and Interaction Optimization in Teams (RIOT) lab's database. The current study is a mixed method correlational study where the independent variables are the trust repair strategies used by a trustee (account, apology, penance, and demonstration of concerns) and the trustor's self-reported cultural values (tolerance for ambiguity, femininity, masculinity, honor and face, fatalism, individualism, and power distance). Trust repair strategies are a categorical variable, and cultural values are continuous variables. The dependent variable is level of trust after repair (post-repair trust) and is reported by the trustor on a 5-point Likert scale ranging from 1 (*no trust*) to 5 (*full trust*). Cultural values as well as demographic information were collected from the self-reported data through the Qualtrics online survey system, and trust repair strategies and post-repair trust were coded from qualitative interview data. Cultural values were measured on a 5-point Likert scale from 1 (*Strongly Disagree*) to 5 (*Strongly Agree*), and the higher the value, the higher individuals' tendencies in their cultural values.

Most of the measures showed acceptable Cronbach's alphas, which measures internal consistency or how closely related items are in a measure (.72 for individualism, .73 for power distance, .79 for tolerance for ambiguity, .80 for fatalism, and .71 for masculinity). Because the reliabilities for measures of face, honor, and

femininity were less than .70, some items were excluded in their respective final measures to improve their reliabilities, resulting in Cronbach's alpha of .74 for honor, .36 for face, and .59 for femininity. As the reliabilities for face and femininity were still less than .70, the results regarding face and femininity were interpreted cautiously. For complete measures of cultural values, please see Appendices A to G.

### **Participants**

Participants in the archival sample included students and employees from a Southeastern university and its surrounding region. The main recruitment criterion was the countries participants were from or highly identified with, as the emphasis of the current study is cross-cultural similarities and differences. The sample included participants from the U.S., China, India, Saudi Arabia, Iraq, Iran, Libya, Oman, Pakistan, and United Arab Emirates. The sample size was 30 participants from the U.S., 30 from China, 32 from India, and 32 from Middle East with a total of 129 participants. Each participant was given a \$40 gift card for their participation, and each session took 2 hours to complete. Not all participants experienced trust repair, and some participants had more than one examples of trust repair.

A total of 58 cases of trust repair experiences were collected and included in the qualitative analysis. Four outliers who missed all four attention check items in the survey and who had a standardized mean ( $z$  score) greater than 3 or less than -3 for their cultural values were excluded from the quantitative analysis. If participants missed one or two attention check items, they were still included in the quantitative analysis. Moreover, there were five cases where trust was repaired due to individual

differences (e.g., forgiveness) or a different repair strategy not specified in the current study (e.g., time). These five cases were also excluded, resulting in a total of 49 cases in the quantitative analysis. There were 33 men and 16 women, and the average age was 23 years old ( $SD = 4.00$ ). Twenty-two participants were from the U.S., 18 from India, three from China, two from Saudi Arabia, three from Iran, and one from Oman.

At the beginning, there were seven cases of trust repair shared by Chinese participants out of 129 interviews. One of the cases did not include enough details, including what the trustee did to regain the trust, and so, trust repair strategies could not be coded, resulting in six cases. Out of these six cases, three cases were outliers that missed the attention check items and had a z-score greater than 3 or less than -3 for some cultural values and were excluded from the quantitative analysis. However, all six cases were included in the qualitative analysis as the trustees in these cases used trust repair strategies specified in the current study. The final sample included 30 students, 15 participants with part-time employment, and four participants with full-time employment. The following ethnicities were also collected: 35% Caucasians, 4% African American, 2% Hispanic or Latino, 6% Asian, 4% Middle Eastern, and the rest reporting as other ethnicities.

### **Procedures**

The data were collected through semi-structured, critical-incident interviews in the fall and spring semesters of 2016-2017 academic year. All of the interviews were conducted in English. Participants were first asked to describe one or more past interpersonal relationships where they built trust with another individual, then

experienced their trust being violated or damaged by the other party, how they repaired or did not repair trust, and the outcomes from trust violation and/or repair. They were specifically asked about collaborative or work relationships in the classroom or workplace setting. The relationships in both settings are similar in that they are in the project context where individuals work together or have collaborative interactions to achieve a shared goal. There is also a timeline to complete the tasks and consequences associated with the outcomes of the project. Throughout the interviews, they were also prompted to describe their affective and cognitive reactions to the trust violation and repair process. For a complete list of interview protocol and questions, please see Appendix H. After the interviews, they were asked to take a battery of surveys measuring their individual differences (e.g., personality and demographic information) as well as their cultural values (e.g., individualism-collectivism). The surveys were taken after the interviews to avoid priming. These interviews were recorded and transcribed in verbatim.



## CHAPTER FIVE: RESULTS

MAXQDA, qualitative data analysis software, was used to code the qualitative interview data for the categorical independent variable (i.e., trust repair strategies), and then this data was quantified and combined with the individual difference data (i.e., cultural values) and dependent variable data (i.e., post-repair trust) in order to conduct quantitative analysis in SPSS. In coding the trust repair strategies, several procedures were followed. One of them was that if participants used two repair strategies, both strategies were coded, as well as only one of them that played a bigger role in repairing the broken trust was also coded. The current study made educated judgment calls in coding the interview data. For example, in one of the interviews, although the trustee used both apology and penance, the trustor emphasized the extra effort the trustee put in to make up for what she did not do in the first part of the project (penance) that helped repair the broken trust. The trustor weighed penance more than apology in the repair process based on his reactions (being surprised and impressed from receiving the penance). In such case, not only were penance and apology coded as a combination of repair strategies, but also penance was coded as an individual strategy. Additionally, both apology and penance were considered in the qualitative analysis. For a partial transcript for this example, please see Appendix I. For a complete list of procedures used in the coding, please look at Appendix J.

In quantitative analysis, three types of analysis were used: analysis of covariance, independent-samples t-test, and multiple regression. Analysis of covariance was conducted to examine the interaction between trust repair strategies

and cultural values on the post-repair trust and to compare the post-repair trust across four repair strategies after controlling for the cultural values. Independent-samples t-test was also conducted to compare the post-repair trust across four repair strategies within one level of a particular cultural value (e.g., which trust repair strategy results in the highest post-repair trust for high masculinity). Furthermore, multiple regression was also conducted specifically for Research Question 3 to explore a combination of repair strategies. Finally, due to the small sample size, there were power issues interfering with achieving statistical significance when conducting the quantitative analysis, and therefore, a qualitative thematic approach was used, where emerging themes and other repair strategies not specified in the current study were analyzed.

In creating low and high cultural values, their means were used to split the sample, and two methods of splitting the data were used. In the first method, the sample was split into half, and the bottom 50% was compared to the top 50%. Although this method used the entire sample and did not decrease the sample size, the difference between two groups was less interpretable especially for the scores around the mean. For instance, anyone scoring less than the mean of individualism (3.68) was in the low individualism group, and anyone scoring higher than 3.68 was in the high individualism group. In such case, a score of 3.67 would be in the low group, and a score of 3.69 would be in the high group, although both scores were not meaningfully different.

In the second method, the bottom 25% was compared to the top 25%, and the middle portion of the sample was excluded in the comparison. This method provided

more distinguishable low and high groups, but given the small sample to begin with, it created an even smaller sample. Therefore, both methods of splitting the data were used to complement each other. In the current study, the first method divided the sample by including those scoring less than the mean into the low group and those scoring equal to or greater than the mean into the high group. The second method divided the sample by including those in the distribution of less than or equal to 25% into the low group, and those in the distribution of equal to or greater than 75% into the high group.

### **Descriptive Statistics**

Table 6 summarizes means, standard deviations, Pearson correlations, and Cronbach's alphas of cultural values and post-repair trust. Please also see Tables 7, 8, 9, and 10 for the frequencies of the use of trust repair strategies together or individually as well as the frequencies of the status of the trustee. Penance was most frequently used ( $N = 18$ ) followed by demonstration of concerns ( $N = 8$ ), and a range of combination of repair strategies was also used. More than half of the cases occurred in the school setting, such as in the class or student organizations, and in the half of the cases ( $N = 29$ ), the trustor and trustee shared some degree of friendship or personal interactions compared to strictly professional relationships.

Table 6

*Summary of Means, Standard Deviations, and Correlations for Post-Repair Trust and Cultural Values*

Variable	<i>M</i>	<i>SD</i>	1	2	3	4	5	6	7	8	9
1. Post-repair trust	3.82	.87	--								
2. Individualism	3.68	.38	-.09	(.72)							
3. Power distance	2.88	.52	.06	.41**	(.73)						
4. TolAmbig	3.21	.40	.03	.27	.11	(.79)					
5. Face	2.31	.63	.21	.20	.37**	-.11	(.36)				
6. Honor	2.25	.85	-.18	.13	.18	0.09	.32*	(.74)			
7. Fatalism	3.32	.99	.02	-.18	.09	-.03	-.15	-.12	(.80)		
8. Femininity	3.95	.35	-.23	-.008	.009	-.11	-.41**	-.33*	.21	(.59)	
9. Masculinity	3.93	.37	-.17	.48**	.47**	.11	.33*	.23	.31*	.19	(.71)

*Note.* TolAmbig = Tolerance for ambiguity. *N* = 46 for post-repair trust and 49 for cultural values. Cronbach's alphas were in the parentheses in the diagonal.

\**p* < .05 (two-tailed), \*\**p* < .01 (two-tailed)

Table 7

*Frequency of Trust Repair Strategies Used Individually*

<b>Repair Strategy Used Individually</b>	<b>N</b>
Account	2
Apology	2
Penance	18
Demonstration of Concerns	8

Table 8

*Frequency of Combination of Trust Repair Strategies*

<b>Account</b>	<b>Apology</b>	<b>Penance</b>	<b>Concerns</b>	<b>N</b>
X	X			4
X		X		3
	X	X		3
X	X	X		3
	X		X	2
X			X	1
		X	X	1
	X	X	X	1

Table 9

*Frequency of Individual Differences and Trust Repair Strategies Not Specified in the Current Study*

<b>Summary of the Situation</b>	<b>Type of Repair</b>	<b>N</b>
Trustor simply got over the violation.	Individual differences	1
Trustor forgave trustee.	Individual differences	2
Trustee was new to the project and did not want to work as a group (violation). Trustor initiated the repair by talking to trustee about the violation and explaining the project they worked together (account from trustor), and trustee regained the trust when he helped trustor with the project (demonstration of concerns from trustee)	Trust repair strategies	1
Account and passage of time	Trust repair strategies	1
Penance and passage of time	Trust repair strategies	1
Penance and friendship	Trust repair strategy and nature of relationship	1

Table 10

*Frequency of the Status of the Trustee*

<b>Status of the trustee</b>	<b>N</b>
Peers (in school setting)	16
Peers/friends (in school setting)	29
Colleagues (at the workplace)	6
Subordinate (both school & workplace)	1
Supervisor (both school & workplace)	5

*Note.* Peers/friends means trustor and trustee shared some degree of friendship or personal relationship.

## Hypothesis 1 Results

Hypothesis 1a suggested that account would be most effective for those with low tolerance for ambiguity, whereas Hypothesis 1b suggested that account would be least effective for those with high femininity.

### Hypothesis 1a Results

ANCOVA results showed that the interaction between repair strategies and tolerance for ambiguity was not significant,  $F(3, 38) = .24, p = .87$ , partial  $\eta^2 = .02$ . After controlling for tolerance for ambiguity, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SE = .28$ ) followed by penance ( $M = 3.85, SE = .18$ ), account ( $M = 3.83, SE = .35$ ), and apology ( $M = 3.00, SE = .53$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data (i.e., comparing bottom 50% to top 50%), the post-repair trust for demonstration of concerns was highest ( $M = 4.30, SD = .45, N = 5$ ) followed by penance ( $M = 3.88, SD = .50, N = 12$ ), account ( $M = 3.50, SD = .50, N = 3$ ), and apology ( $M = 3.00, SD = 1.41, N = 2$ ) for low tolerance for ambiguity. The pattern of the results was contrary to what was expected, as Hypothesis 1a suggested that the post-repair trust for account would be highest for low tolerance for ambiguity. In the second method of splitting the data (i.e., comparing bottom 25% to top 25%), the same pattern was found such that the post-repair trust for demonstration of concerns was highest ( $M = 4.33, SD = .58, N = 3$ ) followed by penance ( $M = 3.79, SD = .81, N = 7$ ), account ( $M = 3.50, SD = .50, N = 3$ ), and apology ( $M = 3.50, SD = 1.41, N = 2$ ) for low tolerance for ambiguity. Thus,

Hypothesis 1a was not supported.

### **Hypothesis 1b Results**

ANCOVA results showed that the interaction between repair strategies and femininity was not significant,  $F(3, 38) = .18, p = .91$ , partial  $\eta^2 = .04$ . After controlling for femininity, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SE = .31$ ) followed by penance ( $M = 3.86, SE = .18$ ), account ( $M = 3.78, SE = .34$ ), and apology ( $M = 3.00, SE = .58$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SD = .41, N = 4$ ) followed by account ( $M = 3.75, SD = .96, N = 4$ ), penance ( $M = 3.69, SD = 1.07, N = 13$ ), and apology ( $M = 3.00, SD = 1.41, N = 2$ ) for high femininity. The pattern of results was contrary to what was expected, as Hypothesis 1b suggested that the post-repair trust for account would be lowest for high femininity. In the second method of splitting the data, the comparison could not be made because there was no case in using demonstration of concerns for high femininity. Therefore, Hypothesis 1b was not supported.

### **Qualitative Results to Hypothesis 1 & Research Question 3**

Research Question 3 explored a combination of repair strategies used alone or sequentially, and there was no significant predictor of post-repair trust among trust repair strategies based on the multiple regression results. Results for Research Question 3 were reported together with results related to the use of account to provide a complete picture of the use of account alone or together with other repair strategies



and to make the interpretations easier to follow. There was no meaningful theme emerging in comparing low and high group of tolerance for ambiguity and femininity in using account. However, across the cases where the trustee used account, the main factor that led to trust violation was miscommunication or unclear expectations. When the trustee used account to give an explanation or reason for the violation event, the trustor realized that there were miscommunication and unclear or unaligned expectations (e.g., two different ways of completing tasks), and the trust was regained (please see Trustor 1). This is consistent with what the literature has found in matching the type of violation and repair strategies to achieve effective repair (Kim et al., 2004). Moreover, when used together with other repair strategies, account was, in most cases, the first step in the trust repair process to clarify the situation and get the right frame of reference (please see Trustor 2). It also indicated a sense of vulnerability which started to rebuild the trust (please see Trustor 3), as vulnerability is one of the components in the definition of trust (Rousseau et al., 1998).

**Trustor 1 who had conflicts with the trustee on how tasks were accomplished:**

“We sat down. We were like we are adults. We need to agree on stuff. I told him like, “What do you actually want?” Then I had to change some of my techniques to cater for his opinion. It worked out at the end. Now we're normal.”

**Trustor 2 whose supervisor (trustee) did not give him time off and showed**

**favoritism:** “We talked about it. I approached him and talked to him about it. It took a while to get to that point, to have that conversation. I approached him and said, “Listen, this is affecting our friendship and not only at work friendship but even outside of it. Let's figure it out.””

“I also saw that he's actually a very reasonable person, that he does go to length to make things work. To the point where when I had to start my graduate school, he allowed me to go from full time to part time and get me work from home situated which nobody had ever done before.”

**Trustor 3 who experienced the trustee lying to their manager about the trustor:**

“When I confronted them, they were really apologetic and embarrassed and we had a long conversation about how women are forced to be in competition with each other when they should be supporting each other. There was a lot of give and take in the conversation.”

“Just painful honesty about examining why we didn't like each other or why we felt we were in competition with each other. That super honest conversation that we were both pretty vulnerable, and then her sincere apology, and then changed behavior.”

## **Hypothesis 2 Results**

Hypothesis 2 suggested that apology would be most effective for those with high honor and face. In other words, the post-repair trust for apology would be highest for high honor and face.

### **Honor**

ANCOVA results showed that the interaction between repair strategies and honor was not significant,  $F(3, 38) = .71, p = .56$ , partial  $\eta^2 = .05$ . After controlling for honor, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SE = .26$ ) followed by penance ( $M = 3.89, SE = .18$ ), account ( $M = 3.46, SE = .39$ ), and apology ( $M = 3.00, SE = .55$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 3.93, SD = .61, N = 7$ ) followed by penance ( $M = 3.75, SD = .80, N = 14$ ), account ( $M = 3.25, SD = .35, N = 2$ ), and apology ( $M = 3.00, N = 1$ ) for high honor. In the second method of splitting the data, a similar pattern was found such that the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SD = .82, N = 4$ ) followed by penance ( $M = 3.80, SD = .92, N = 10$ ), and then equally by account ( $M = 3.00, N = 1$ ),

and apology ( $M = 3.00$ ,  $N = 1$ ) for high honor. The pattern of results was opposite to what was expected.

### **Face**

ANCOVA results showed that the interaction between repair strategies and face was not significant,  $F(3, 38) = .28$ ,  $p = .84$ , partial  $\eta^2 = .02$ . After controlling for face, the post-repair trust for penance was highest ( $M = 3.86$ ,  $SD = .18$ ) followed by demonstration of concerns ( $M = 3.85$ ,  $SD = .30$ ), account ( $M = 3.77$ ,  $SD = .36$ ), and apology ( $M = 3.00$ ,  $SD = .57$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 4.25$ ,  $SD = .53$ ,  $N = 8$ ) followed by penance ( $M = 3.93$ ,  $SD = .90$ ,  $N = 17$ ), account ( $M = 3.67$ ,  $SD = .58$ ,  $N = 3$ ), and apology ( $M = 3.00$ ,  $N = 1$ ) for high face. In the second method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 4.30$ ,  $SD = .45$ ,  $N = 5$ ) followed by account ( $M = 4.00$ ,  $N = 1$ ), penance ( $M = 3.60$ ,  $SD = 1.44$ ,  $N = 3$ ), and apology ( $M = 3.00$ ,  $N = 1$ ) for high face. The pattern of results was opposite to what was expected. Thus, Hypothesis 2 was not supported.

### **Qualitative Results to Hypothesis 2 and Research Question 3**

There was no meaningful theme found in comparing low and high groups of honor and face, and therefore, the breath of experiences across the cases where the trustee used apology alone or together with other repair strategies were analyzed. In two cases where apology was used alone, the trustor and trustee were friends, and the friendship and individual differences played a bigger role than apology itself (please

see Trustor 1). Furthermore, when apology was used together with other repair strategies, apology was usually used in conjunction with account as the first step in the repair process. However, compared to other repair strategies, apology played a less important role in effectively repairing the damaged trust (please see Trustor 2). This was also supported by the post-repair trust of apology ( $M = 3.00$ ) consistently being the lowest among the four repair strategies.

**Trustor 1 who experienced the trustee not doing his part in the group project:** “I changed my attitude to him and he noticed that I'm mad at him, and then he asked me why I don't answer his phone and stuff like that. As I said, he talked to me, he made an apology and I accepted that. I don't want to hold a grudge.”

**Trustor 2 who experienced the trustee not doing his part in the first group project but making up for it in the second project:** “He did always behave apologetic for his behavior. Always indicated that he did realize that he did mess up and he did give the feeling that he was sorry for what he had done.”

“When he started doing this, we realized that it was him trying to make up for what he had done, because this was something that was completely, you could say, detached from his usual behavior. When we realized it was something he was going out of his way to make up for it, I realized I could trust him again.”

### Hypothesis 3 Results

Hypothesis 3 suggested that penance would be most effective (i.e., highest post-repair trust) for those with high individualism. ANCOVA results showed that the interaction between repair strategies and individualism was not significant,  $F(3, 38) = 1.43, p = .25$ , partial  $\eta^2 = .10$ . After controlling for individualism, the post-repair trust for demonstration of concerns was highest ( $M = 3.97, SE = .31$ ) followed by account ( $M = 3.96, SE = .37$ ), penance ( $M = 3.84, SE = .17$ ), and apology ( $M = 3.00, SE = .57$ ). Moreover, independent-samples t-test results showed that none of the comparisons

were statistically significant. In the first method of splitting the data, the post-repair trust for account was highest ( $M = 4.00$ ,  $SD = 1.00$ ,  $N = 3$ ) followed by demonstration of concerns ( $M = 3.94$ ,  $SD = .68$ ,  $N = 8$ ), penance ( $M = 3.59$ ,  $SD = .98$ ,  $N = 14$ ), and apology ( $M = 3.00$ ,  $N = 1$ ) for high individualism. In the second method of splitting the data, the comparison could not be made because there was no case in using account. As the post-repair trust for penance was not the highest for high individualism, Hypothesis 3 was not supported.

### **Qualitative Results to Hypothesis 3 and Research Question 3**

There was no meaningful difference between low and high groups of individualism in using penance, and instead, an overall trend and a range of experiences were analyzed. Penance was most frequently used alone ( $N = 18$ ) or together with other repair strategies ( $N = 13$ ). Penance was found to best fit the conceptualization of trust repair in that to repair the broken trust, positive expectations and intentions need to be reestablished, and the best way to achieve it is by taking responsibilities of what happened and showing a change in behaviors. This is supported by the study of Schweitzer et al. (2006) that showing trustworthy actions was more effective than promising to change. For example, the trustee did not complete his part in a group assignment and broke the trustor's trust (Trustor 1) to work with him again, but in the following assignments, the trustee performed what he was supposed to, hence meeting the expectations and rebuilding trust.

**Trustor 1:** “Yeah, I guess, in a way because he lived up to the expectations of the group and he completed his assignments on time and everything was proper after that.”

“I guess in a way, he regained my trust. It's just that I wanted everybody to have an equal contribution to the project. He had a little less of contribution but whatever he contributed, he did it properly. In a way, I could say, yeah, he did regain my trust.”

Moreover, in most cases where the trustee used penance, the trustor and trustee continued their relationship and were still in touch for various reasons (e.g., being friends or being assigned to another project). It is intuitive that in order to use penance (i.e., offering compensation, putting in effort to meet expectations, or showing a change in behaviors), the trustor and trustee need to continue the relationship; in other words, the trustee needs a second chance in the relationship to be able to use penance. For example, the trustor (Trustor 2) was promised a job position in another country by the trustee but did not end up getting it, because she did not meet the license requirement of the position. The trustee made up for it by offering another job.

**Trustor 2:** “I thought, “Oh, OK. Maybe I've closed the door on one thing.” Maybe, the door was close on one job. Maybe, there's another job that he has in mind. I called him back, and he told me what it was. Then he told me how much money he was going to pay me to come for this day a week. That sealed the deal, because it was a lot of money.”

Furthermore, there were a few cases where penance was used indirectly, in other words, the trustee put more effort and showed a change in behaviors in general instead of these behaviors being directed towards the trustor or to compensate for the violation. For instance, the trustee made a mistake in the lab by contaminating bio cells, but when the trustor (Trustor 3) was able to reestablish her positive expectations on the trustee by observing his hard work and competence in the class they were both in.

**Trustor 3:** “I can trust on him again on this semester, we have another same class. So far, he's doing well on that class. Maybe doing better than me. The trust I'm talking about between me and him is just totally about his performance on damaging things, not any other so called social trust or intellectual trust. Just about the study things.”

Finally, when used together with other repair strategies, penance was found to play a bigger role in repairing the broken trust. This was supported by the post-repair trust for penance was second highest in most of the hypothesis results. For instance, the trustor (Trustor 4) did not trust the trustee after the trustee failed to complete her part in the group project which was two semesters long. But, the trustee was able to repair the trust by making extra effort to complete the project and apologizing. The trustor also said that he was very impressed and surprised by her making extra effort without being asked, so penance played a bigger role in the repair process than apology.

**Trustor 4:** “Definitely, the group's trust in her was broken for a few months. This happened around maybe not even a few months, maybe like a month-and-a-half. It happened around November. She was able to repair it over the winter break because she took the drawings. We didn't know that she took them and then she went home. Her dad owned a factory in China. She took the drawings and some of the pieces that we were wondering like how would we build. She went and build them herself and added us factors. I was like, "OK."”

“She did apologize. We didn't really kick her out of the group.”

### **Hypothesis 4 Results**

Hypothesis 4a suggested that demonstration of concerns would be most effective for those with high femininity, whereas Hypothesis 4b suggested that demonstration of concerns would be least effective for those with high masculinity.

### **Hypothesis 4a Results**

ANCOVA results showed that the interaction between repair strategies and femininity was not significant,  $F(3, 38) = .18, p = .91$ , partial  $\eta^2 = .04$ . After controlling for femininity, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SE = .31$ ) followed by penance ( $M = 3.86, SE = .18$ ), account ( $M = 3.78, SE = .34$ ), and apology ( $M = 3.00, SE = .58$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SD = .41, N = 4$ ) followed by account ( $M = 3.75, SD = .96, N = 4$ ), penance ( $M = 3.69, SD = 1.07, N = 13$ ), and apology ( $M = 3.00, SD = 1.41, N = 2$ ) for high femininity. In the second method of splitting the data, the comparison could not be made because there was no case in using demonstration of concerns for high femininity. Although Hypothesis 4a was not supported based on statistical significance, the direction of the relationship was as expected given that post-repair trust for demonstration of concerns was the highest compared to other repair strategies.

### **Hypothesis 4b Results**

ANCOVA results showed that the interaction between repair strategies and masculinity was not significant,  $F(3, 38) = 1.54, p = .22$ , partial  $\eta^2 = .11$ . After controlling for masculinity, the post-repair trust for demonstration of concerns was highest ( $M = 3.94, SE = .27$ ) followed by penance ( $M = 3.91, SE = .17$ ), account ( $M = 3.03, SE = .61$ ), and apology ( $M = 3.00, SE = .49$ ). Moreover, independent-samples t-



test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust of demonstration of concerns was highest ( $M = 4.17$ ,  $SD = .61$ ,  $N = 9$ ) followed by penance ( $M = 3.81$ ,  $SD = 1.06$ ,  $N = 19$ ), account ( $M = 3.50$ ,  $SD = .71$ ,  $N = 2$ ), and apology ( $M = 3.00$ ,  $N = 1$ ) for high masculinity. In the second method of splitting the data, the comparison could not be made because there was no case in using account. As the post-repair trust for demonstration of concerns was not the lowest for high masculinity, Hypothesis 4b was not supported.

For a summary of the means of post-repair trust for four repair strategies and all cultural values from independent-samples t-tests, please see Table 11. One primary finding was that apology was found to be the least effective across all cultural values, but this finding should be interpreted cautiously because when the data were split, there were very few cases of using apology in low and high groups of all cultural values (e.g.,  $N = 2$  for high femininity and  $N = 1$  for high masculinity). Another finding was that in both low and high groups of most cultural values, the post-repair trust of demonstration of concerns was highest followed by penance and account. Interestingly, there were unusually high post-repair trust for some levels of cultural values. For example, the post-repair trust for account and penance was 4.50 and 4.57, respectively, for low honor. Honor is based on one's reputation in the society and others' assessment of oneself. Individuals with low honor might not have self-worth based on what other people think of them, and they might expect the trustee to address the violation itself or repair the broken trust with them directly instead of enhancing

the trustor's reputation and what others think of the trustor. Thus, when the trustee provides an explanation or reason for the violation through account and takes responsibility of the violation through penance, the trustee directly addresses the violation and fulfills the expectations of the trustor with low honor, hence regaining the trust.

Additionally, the post-repair trust for penance for individuals with low individualism was 4.57. Individualism concerns with one's self-reliance and independence from the group and prioritizing one's interests and goals over the group's, and those with low individualism might care about the group's or others' interests and goals. Penance from the trustee might show that the trustee's consideration towards the trustor and compensation for not achieving the trustor's goals because of the violation. Thus, it fulfills the expectations and fits with the value of the trustor with low individualism, resulting in high post-repair trust.

The post-repair trust for account and demonstration of concerns was 4.33 and 4.50 respectively for low fatalism. Fatalism concerns the belief that something happens in life because it is inevitable. Those with low fatalism might therefore believe that the violation happened for a reason other than an inevitable event and might expect to know why it happened and how the relationship led to the violation. Account and demonstration of concerns satisfy such expectation by providing information about the violation and showing care about the relationship and the trustor, and therefore, might be effective in repairing the broken trust. On the other hand, the post-repair trust of penance was 4.50 for high fatalism. The trustor might

think that it was inevitable that the violation happened, and so, it might be the best for the trustee to take responsibility and compensate for it instead of trying to explain, apologize, or show concerns.

Table 11

*Summary of Means of Post-Repair Trust of Trust Repair Strategies between Low and High Levels of Cultural Values*

	Low on Cultural Value (< 50%/ 25%)				High on Cultural Value (> 50%/ 75%)			
	Account	Apology	Penance	Concerns	Account	Apology	Penance	Concerns
TolAmb	3.50/3.50	3.00/3.00	3.88/3.79	4.30/4.33	4.00/3.67	3.00/3.00	3.83/4.00	3.75/4.00
Fem	4.00/-	3.00/-	4.06/-	3.80/-	3.75/3.00	3.00/3.00	3.69/3.79	4.00/-
Honor	4.00/4.50	3.00/3.00	3.98/4.57	4.13/3.83	3.25/3.00	3.00/3.00	3.75/3.80	3.93/4.00
Face	3.88/4.00	3.00/3.00	3.69/3.69	3.33/3.50	3.67/4.00	3.00/3.00	3.93/3.60	4.25/4.30
Ind	3.63/3.25	3.00/3.00	4.18/4.57	4.17/4.00	4.00/-	3.00/3.00	3.59/3.55	3.94/4.10
Mas	3.90/3.90	3.00/-	4.00/4.25	3.25/3.25	3.50/-	3.00/3.00	3.81/3.47	4.17/4.13
Fatal	4.25/4.33	3.00/3.00	3.88/3.70	4.00/4.50	3.17/3.50	3.00/3.00	3.83/4.50	4.00/4.30
PD	4.00/4.00	3.00/3.00	4.00/3.50	3.83/3.75	3.25/-	3.00/-	3.78/3.19	4.20/4.20

*Note.* TolAmb = Tolerance for Ambiguity, Fem = Femininity, Ind = Individualism, Mas = Masculinity, Fatal = Fatalism, PD = Power distance. Means were not reported if there was no case in the group.

### Qualitative Results to Hypothesis 4 and Research Question 3

There was not much variation across low and high groups of femininity and masculinity in using demonstration of concerns. Overall, compared to other repair strategies, in most cases where the trustee used demonstration of concerns, the trustor and trustee were friends and classmates or colleagues before the violation event, or ended up being friends after trust repair. In other words, they had both professional and personal relationships, and there was a cross-over between professional and personal lives. In some cases, it was the friendship that played a bigger role in buffering against the negative consequences of the violation. For example, the trustor (Trustor 1) who was friends with the trustee for a long time, and they always worked on homework and assignments together. They ended up getting a bad grade because their work was too similar in one assignment. The trustor claimed that the trustee copied it from him but could later rebuild the trust because of the friendship.

**Trustor 1:** “You could say so. What it was...We kept working together. We kept helping each other with stuff when we needed. The majority of it was...We'd sit down, and we'd both do our homework together and figure it out together. Because we've been doing that for so long, we became close friends. It wasn't a major step back or a hit on anything.”

“I guess two things. Like I said, I've been working with him for so long. It was a mistake, going too fast, too much stuff to do, and careless. He obviously knows he doesn't want to do it again if there's a similar situation. He's a little more careful with it.”

Additionally, because the boundary between professional and personal lives was not very distinct, there were some cases where trust was broken in the professional life but repaired in the personal life, or vice versa. For instance, Trustor

2's trust was broken when the trustee failed to take his responsibilities for a student organization they were a part of, but it was regained to some extent when the trustee helped the trustor in the church they went together.

**Trustor 2:** "Mostly, I was in church for the choir. We always seem to be low on singers or instruments. Whenever he was in the congregation, he would see that we were all there. He would just come in and join. He would just help me out a little bit. I would like to think that he joined the choir to make amends. I would want to think that way, but I'm still not sure."

### Research Question 1 Results

Research Question 1 explored ineffective repair strategies for high fatalism individuals. ANCOVA results showed that the interaction between repair strategies and fatalism was not significant,  $F(3, 38) = 1.42, p = .25$ , partial  $\eta^2 = .10$ . After controlling for fatalism, the post-repair trust for demonstration of concerns was highest ( $M = 3.98, SE = .28$ ) followed by penance ( $M = 3.88, SE = .18$ ), account ( $M = 3.65, SE = .34$ ), and apology ( $M = 3.00, SE = .55$ ). Moreover, independent-samples t-test results showed that none of the comparisons were statistically significant. In the first method of splitting the data, the post-repair trust for demonstration of concerns was highest ( $M = 4.00, SD = .60, N = 8$ ) followed by penance ( $M = 3.83, SD = 1.03, N = 13$ ), account ( $M = 3.17, SD = .29, N = 3$ ), and apology ( $M = 3.00, SD = 1.41, N = 2$ ) for high fatalism. In the second method of splitting the data, the post-repair trust of penance was highest ( $M = 4.50, SD = .58, N = 4$ ) followed by demonstration of concerns ( $M = 4.30, SD = .45, N = 5$ ), account ( $M = 3.50, N = 1$ ), and apology ( $M = 3.00, SD = 1.41, N = 2$ ) for high fatalism. As the post-repair trust of apology was

lowest for high fatalism, it was least effective for high fatalism compared to other repair strategies.

### Research Question 2 Results

Research Question 2 explored the three-way interaction between penance, power distance, and status of the trustee. ANCOVA results showed that the two-way interaction between repair strategies and power distance was not significant,  $F(3, 38) = .87, p = .47$ , partial  $\eta^2 = .06$ . After controlling for power distance, the post-repair trust for demonstration of concerns was highest ( $M = 3.97, SE = .27$ ) followed by penance ( $M = 3.92, SE = .18$ ), account ( $M = 3.78, SE = .40$ ), and apology ( $M = 3.00, SE = .75$ ). The three-way interaction between penance, power distance, and status of the trustee was also not significant  $F(7, 34) = .77, p = .62$ , partial  $\eta^2 = .14$ . After controlling for power distance, the post-repair trust for penance for the trustee with higher status was highest ( $M = 3.92, N = 1$ ) followed by equal status ( $M = 3.88, SE = .99, N = 23$ ) and lower status ( $M = 3.00, N = 1$ ).

Based on the qualitative analysis, there were one case of the trustor in a higher status than the trustee (associate manager and employee) and four cases of the trustor in a lower status than the trustee (student and professor or employee and employer). In the case of the trustor in a higher status and who also had high power distance ( $M > 3.00$  by using the first method of splitting the data), the trustee used penance by performing her tasks correctly (i.e., a change in behavior) and regained the trustor's trust. The trustor said in the interview,

“When she started doing everything for a month straight, the way she was

supposed to do it. I stopped checking and making sure she did everything.” In other cases of the trustor in a lower status, the trustor either had medium power distance ( $M = 3.00$ ) or lower power distance ( $M < 3.00$ ). The trustee used a combination of repair strategies and emphasized more on the relational aspects. The followings are two examples. In the first example, the trustor (Trustor 1) was a student, and her advisor broke her trust by making her major in something she was not interested due to the competition between departments to get good students into their departments. Her advisor regained her trust through apology and demonstration of concerns.

**Trustor 1:** “Yeah, sometimes when I talk to him about my problem, at the beginning when he shows sympathy and claims that he understands my situation and he will try all his best to fix it, he regains the trust. At those times, previous experiences, I felt he's like my dad and he's very supportive and he cares. It felt very good at those times. I think even those spontaneous understanding moments are good. Even though I know that in a short time, he will change his mind but even at that time, it is very good for me.”

In the second example, the trustor (Trustor 2) was an employee, and his supervisor broke his trust by giving no time off and showing favoritism. His supervisor later regained his trust through account where he explained that it was due to the pressure from top management and low manpower and through penance where he provided the trustor some flexibility in the schedule when the trustor started the graduate school.

**Trustor 2:** “We talked about it. I approached him and talked to him about it. It took a while to get to that point, to have that conversation. I approached him and said, “Listen, this is affecting our friendship and not only at work friendship but even outside of it. Let's figure it out.” I also saw that he's actually a very reasonable person, that he does go to length to make things



work. To the point where when I had to start my graduate school, he allowed me to go from full time to part time and get me work from home situated which nobody had ever done before.”

These findings are consistent with the literature such that those with low power distance pay more attention to the relational aspect of the relationship and care more about how they are treated, as they see other individuals as equal. On the other hand, those high in power distance weigh more on the favorability of instrumental outcomes and care less about the relational factors (Tyler et al., 2000). Taken together, if the trustor is in a higher status and has high power distance, penance would be effective in regaining trust, whereas if the trustor is in a lower status and has low power distance, other repair strategies that address the relational aspects to some extent, such as apology or demonstration of concerns, would be effective.

### **Supplemental Results**

#### **Other Repair Strategies Not Specified in the Current Study**

There were some trust repair strategies mentioned within the interviews that were not specified in the current study but played a role in effectively repairing the damaged trust. They included some individual differences, time (another type of repair strategy), and friendship (nature of the relationship).

**Individual Differences of Trustor.** There were four cases where individual differences of the trustor (e.g., forgiving the trustee and “just got over it”) played a role in regaining trust, and the followings are two examples. In one case, the trustor (Trustor 1) was a student, and her professor broke her trust by taking all the credits in front of the sponsors without acknowledging her contribution, but she “just got over

it.” In another case, the trustee broke the trustor’s trust (Trustor 2) by stealing the trustor’s notes and lying about it, because the trustee was jealous that the trustor got a better score in that subject. But, they were classmates as well as friends and shared the same group of friends, so the trustor simply forgave the trustee. Because the current study focused on the repair strategies that the trustor and trustee could practically use, these cases were not the main interest of the current study.

**Trustor 1:** “I just didn't really hold a grudge about it. I just got over it fast.”

**Trustor 2:** “I studied from the textbook although I really need my notes because I made a lot of notes. I forgave her for that because she was my close friend and I needed her. If I didn't have these four people, it will just create chaos between all of us and I would be alone.”

**Time.** There were two cases in which time was a factor in how the trust was repaired. In other words, trust was regained, or the relationship became better simply because of the passage of time. In one example, the trustor tried to cheat from the trustee in an exam, but the trustee did not let her. At the time, the trustor said she did not trust the trustee anymore, but the trustee provided an explanation. Most importantly, the trustor said that she became more mature over time, and she and the trustee became friends over the four years of college. So, they were able to repair the trust. The trustor said,

“When I asked him during the test, he didn't let me do it, so I lost my trust to him. I know it's childish but how he regained it, because I know that later we were friend, later after that, I think he just acted nice.”

“He explained that he thought the professor is looking at him. He explained it and later I found that he is a very timid one and he can't risk doing it. It was very risky and it was unreasonable request from me, so later we just get as a

friend.”

“I was younger at that time and we were together in the same course for four years. Our bachelor was four years. First season that I talked about it I was younger and I wasn't that stubborn as I am now, and then the time. We were together for a long time and time helped it.”

**Friendship.** In the current study, half of the trustors shared some degree of friendship or had personal relationships with the trustees. It was the friendship or personal relationship that also involved in repairing the broken trust, because the trustors want to maintain the friendship or continue the relationship. In one example, the trustee did not complete his part of the group project on time and broke the trustor's trust. The trustee later regained by showing hard work in class, although not directly towards the project they worked on, and through the friendship. The trustor said,

“Since we know each other almost a year and basically we'll meet each other in of class and sometimes out of class. My personal relationship with him my friendship keeps gaining. The personal relationship is kind of change my opinion about him. Even his act or performance, I think.”

### **Trustor as an Active Party in Trust Repair Process**

Most of the published research on trust repair assumes that the trustee is the one expected to and held responsible for repairing the broken trust and assumes a passive role of the trustor in the repair process (Tomlinson & Mayer, 2009). However, in the current study, there were two cases where the trustor played an active role in the process. In the first case, the trustee was assigned to a group where he did not like the project, did not have the competence to perform the tasks, and did not want to work as

part of the group. It broke the trustor's trust, but the trustor knew that he could not complete the project by himself, and therefore, he explained the project to the trustee and helped him complete the tasks. The trustee regained the trust by starting to work as a group and trying to help the group as much as he could. The trustor said,

"I explained to him what is the project, work we have to do. It's easy. We didn't give him too much work. I know what he was good in doing things. There was an estimation project, estimation of a building."

"I guess that he was the one who helped me a lot during last days. In library and printing out the stuff, making the manual, all that."

In another case, the trustor and trustee were classmates and friends, but the trustee broke the trustor's trust by telling other mutual friends how the trustor was a horrible person. The trustor attempted to resolve it through account, but the trustee did not want to, failing to repair the trust. The trustor said,

"I kept trying to reconcile. It got to the point where when I still didn't know what was going on. I even suggested that we go to CAPS to talk things through, because there we could have a mediator there to help. She originally said yes to that, then said no, and said it's not worth it."

In the first case, the trustor needed the trustee's contribution and help to complete the project, and because of the potential negative consequences, the trustor initiated the trust repair process. In the second case, the trustor and trustee shared a personal relationship rather than strictly classmates. So, the trustor initiated the repair attempt to maintain the friendship, but they failed to repair the trust. Taken together, when there is something the trustor can benefit from the relationship with the trustee or when there is some degree of friendship or personal relationship involved, the trustor seems to play a more active role in the repair process.

### **Failed Trust Repair**

In addition to the previous example, there were also three cases where the trustee attempted to repair the trust by using some repair strategies, but it was not successful. In one case, the trustor and trustee who were at first supportive ended up applying for the same job position. The trustee got the position by lying to the manager about the trustor (integrity violation) but ended up being fired. Although the trustee apologized, the repair was not successful, because negative connotations from the integrity violation are more hurtful and troubling (Elangovan et al., 2007). The trustor said,

“She apologized when she was fired, which makes me think I might work with her again, but I would never really trust her again.”

In the second case, the trustee apologized for spreading false rumors about the trustor to other people, but because the apology was not sincere, the repair was not successful. The trustor said,

“He did say sorry to me, but it was just for the sorry. He didn't mean it from his heart. It was like "Sorry, I would not have to do that." That was not a real one. It was just sorry. I wasn't convinced from that sorry. He could have done like "OK, that was really my bad."”

The third case was in India where the trustor said that the organizations were starting to make employees work on the weekends. The trustee broke the trustor's trust by not giving the time off and always giving more workload. The trustor claimed that the trustee tried to explain, but because the trustor quit the job, they did not have contact afterwards, and the trust was not repaired. The trustor said,

“I don't think they regained my trust. But they tried. I mean, I think it's a bit hard to say. I think it's less than a binary thing for me, like zero or one, but they did...he did seem to try. He did seem to say, "No, this is not what happened," or something. But beyond that, we haven't been in contact since then.”

All in all, these cases indicate that the sincerity of the trustee in the repair process and the continuing of the relationship or a second chance would play a role in effectively repairing the broken trust at least to some extent.

## CHAPTER SIX: DISCUSSION

The current study is among the very few studies to examine trust violation and repair in the collaborative or work relationships while considering the cultural values of the trustor in question. Specifically, it hypothesized that the effectiveness of trust repair strategies (measured by the post-repair trust) would depend on the cultural values of the trustor. Overall, the current study did not find any statistically significant results for all of the hypotheses and research questions. However, based on the directionality of the relationships (i.e., comparing the means of post-repair trust), demonstration of concerns was found to be most effective for high femininity. Furthermore, in most cases of trust repair experiences, the post-repair trust was highest for demonstration of concerns closely followed by penance and account. Apology was also found to be least effective for high fatalism among the four repair strategies. Penance was effective for the trustor with higher status and high power distance, whereas strategies that addressed some relational aspects (e.g., apology and demonstration of concerns) were effective for the trustor with lower status and low power distance. It is important to note that the sample size was small in the current study, and the Cronbach's alpha reliability coefficients of face and femininity were below .70. Furthermore, the qualitative data was coded and analyzed only by one subject matter expert, so there might be biases in finding themes and errors in making judgment calls. Due to these limitations, the results should be interpreted cautiously.

Another finding of the current study was that penance was the most frequently used trust repair strategy, and demonstration of concerns was most effective (indicated

by highest post-repair trust) closely followed by penance for most of the cultural values. It is cautiously interpreted that demonstration of concerns and penance might be more universally used and effective for most of the cultural values. Interestingly, although penance was most frequently used, post-repair trust for demonstration of concerns was the highest. This might be due to the fact that in half of the cases, the trustor and trustee were peers or colleagues and shared some degree of friendship or personal relationship. Demonstration of concerns most addresses the relational aspects and feminine values, and therefore, it might best fit with the expectations of the trustor as a friend. Moreover, it implies that the boundary of professional and personal relationships is less distinct, and as individuals can be easily connected virtually these days, the boundary of today's professional relationships might need to be reconsidered. Indeed, the current study found that in some cases, personal friendship buffered against the negative consequences from the violation and helped rebuild the trust. This has important implications for trust violation and repair in that trust violated or repaired in the professional relationships can have a cross-over effect on the personal relationships.

In terms of future research directions, the literature has found that there are two sources of trust: cognitive and affective trust (Colquitt et al., 2007). Cognitive trust is a positive belief about the trustee's ability, competence, and performance, whereas affective trust concerns with interpersonal bond and mutual concern. Colquitt and colleagues (2007) suggest that at the beginning of a relationship, only cognitive trust exists, and as individuals get to know each other over time, they develop both



cognitive and affective trust. In fact, affective trust tends to become more salient later in the relationship. In the current study, the post-repair trust was measured by asking participants how much they trusted the trustee at the moment of being interviewed, it might capture affective trust more than cognitive trust, as they already established some level of relationship for trust to be violated and repaired. Therefore, future research needs to distinguish cognitive trust and affective trust when studying the outcomes of trust violation and repair. For instance, trust violation might decrease affective trust more than cognitive trust especially when the trustor and trustee were friends, whereas trust repair effort might only increase cognitive trust by reestablishing positive expectations about the trustee's competence and performance but not fully reestablish affective trust.

In addition to cognitive and affective sources of trust, future research needs to capture both the pre-repair trust and post-repair trust and examine the difference between them as an outcome. Depending on individual differences (e.g., forgiving or propensity to trust) or severity of the violation or consequences suffered by the trustor, the post-violation or pre-repair trust might be very low simply because some individuals tend to trust more or less overall. For example, if the trustor has very negative reactions to the violation or has low forgiving trait, the pre-repair trust might be very low. When the trust was regained, the post-repair trust might still be low compared to a second person whose pre-repair trust was higher to being with, although the amount of increase in trust after the trust repair was the same. Therefore, future research needs to compare the pre- and post-repair trust in order to better measure the

effectiveness of trust repair strategies and to take other individual differences and situational factors into consideration.

Last, but not least, the current study found two cases where the trustor played an active role in the trust repair process while in other cases, the trustor expected the trustee to be the one to initiate the repair process and make the effort. In one case, the trustor wanted to maintain the friendship, and in another case, the trustor had some benefits from continuing the relationship with the trustee and trusting the trustee. In other words, if the trustor had expectations of positive outcomes from continuing the relationship with the trustee, the trustor would be more likely to play an active role in the trust repair process. Additionally, in most cases in the current study, the trustor did not mention or might not be aware of how the trustor might have contributed to the violation event. The trustee also might not be aware that the trustee violated the trustor's trust, and in that case, the trustee would be unlikely to initiate and make effort to repair the broken trust. Thus, more research is needed on the trustor as an active party in the trust repair rather than assuming a passive role.

### **Theoretical Implications**

The conceptualization of trust repair in the current study was based on the trust development model proposed by Doney et al. (1998). They theorize that the development of trust depends on the national cultural values and norms, as these values and norms influence individuals' behaviors, perceptions, and thoughts. In other words, the national culture leads to the cultural norms and values which influence cognitive processes (e.g., weighing pros and cons of trusting someone), and through

these cognitive processes, trust is built. However, their model does not address trust violation and repair, and so, the current study used their model to conceptualize trust repair such that trust repair effort should be targeted towards addressing the cultural beliefs and values as well as meeting the expectations based on the cultural norms. The current study found that the main factor leading to the trust violations described in the interviews was unmet expectations (e.g., not completing the tasks and not getting a job that was promised). Although the results from the current study should be interpreted cautiously, future research can use it as a starting point and further explore this conceptualization of trust repair.

Moreover, the current study provides support for the categorization of trust repair strategies proposed by Ren and Gray (2009) and answers their call for cross-cultural research on trust violation and repair. The current study is among the very few studies to examine trust violation and repair in cross-cultural contexts. It also captures a wide range of cultural values in exploring the effectiveness of these strategies in addition to individualism and collectivism that Ren and Gray (2009) proposed. In addition, a lot of trust violation and repair research has focused on personal relationships (e.g., Finkel et al., 2002), and the research on collaborative or work relationships has been understudied, yet very critical and needed. In fact, there is a need for trust and understanding of how to repair the broken trust in today's organizations more than ever (Reina & Reina, 2005). Thus, the current study extends trust violation and repair research to a new application context, i.e., collaborative classroom settings and the workplace, in addition to the cross-cultural context.

### **Practical Implications**

If trust repair is conceptualized the same across different cultural values as satisfying the cultural beliefs and values and meeting the expectations based on the cultural values, trust repair would not be effective if individuals do not know what these expectations are. In any collaborative relationship, if the expectations are not clear or aligned, the collaboration will not be as successful. Particularly, if individuals want to repair broken trust, the expectations of all parties involved should be clear and explicit, and they need to find how to best align these expectations. Furthermore, the current study found that if the repair strategies were used together, account and apology were usually used as the first steps in the trust repair process, as they could be used to clarify the situation and get the right frame of reference. In most cases, the type of violation and repair strategies matched. For example, account was used when miscommunication or unclear expectations were found to be the factor leading to the violation. Thus, individuals might want to match their repair effort with the type of violation or what causes the violation.

In addition, the current study provides a wide range of repair behaviors based on the operationalized definitions that are within individuals' control and that they can engage in. Given that most trust repair experiences in the current study were considered somewhat successful by the participants, these repair behaviors are expected to be effective to some degree. All in all, if individuals break someone's trust from another culture, they will be able to more rapidly engage in trust repair by using an effective repair strategy. On the flip side, if their trust is broken, they will

understand the expectations they have for the person who broke their trust in terms of what that person can do to repair the trust. By sharing such expectations and avoiding ineffective strategies, the repair process will be much quicker and more effective, ultimately promoting successful collaborative relationships with others from different cultural backgrounds.

### **Conclusion**

In conclusion, the current study examined the effectiveness of four trust repair strategies, account, apology, penance, and demonstration of concerns, for collaborative or work relationships across difference cultures. It used archival data in which participants from different cultural backgrounds shared their experiences of trust development, violation, and repair. The interview data were coded and analyzed quantitatively and qualitatively with their cultural values. Although the results were not statistically significant due to the small sample size, the current study found that penance and demonstration of concerns were most frequently used and most effective in repairing the broken trust for most cultural values, and that account was usually used in the first step of the repair process to clarify expectations or miscommunication that might have led to the violation. Therefore, it implies that account, penance, and demonstration of concerns can be used together to achieve the successful trust repair across different cultural values.

Furthermore, trust repair effort should be targeted towards overcoming negative emotions and consequences from the violation and reestablishing positive expectations and intentions towards the trustee and the relationship. In the cross-

cultural context, the expectations and beliefs might differ based on the cultural norms and values, and trust repair effort should fulfill these expectations and address the cultural norms and values. The most effective strategies to achieve them are by taking responsibility and showing a change in behaviors consistent with what is expected of individuals in the cross-cultural context (penance) and by holding the best interest of the trustor in mind (demonstration of concerns). All in all, if both parties in a collaborative relationship are clear and explicit about their expectations and values, align them well, and show the best interest of both parties, they are more likely to repair the broken trust and achieve a successful collaboration.

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## Appendix A

### Tolerance for Ambiguity Scale (Mclain, 1993)

For the following questions, please indicate how strongly you **agree** or **disagree** with the listed statements.

#### Response Formats

- 1 = Strongly Disagree
- 2 = Disagree
- 3 = Neither Agree nor Disagree
- 4 = Agree
- 5 = Strongly Agree

#### Statements

1. I don't tolerate ambiguous situations well. (reverse coded)
2. I find it difficult to respond when faced with an unexpected event. (reverse coded)
3. I don't think new situations are any more threatening than familiar situations.
4. I'm drawn to situations which can be interpreted in more than one way.
5. I would rather avoid solving a problem that must be viewed from several different perspectives. (reverse coded)
6. I try to avoid situations which are ambiguous. (reverse coded)
7. I am good at managing unpredictable situations.
8. I prefer similar situations to new ones. (reverse coded)
9. Problems which cannot be considered from just one point of view are a little threatening. (reverse coded)
10. I avoid situations which are too complicated for me to easily understand. (reverse coded)
11. I am tolerant of ambiguous situations.
12. I enjoy tackling problems which are complex enough to be ambiguous.
13. I try to avoid problems which don't seem to have only one "best" solution. (reverse coded)
14. I often find myself looking for something new, rather than trying to hold things constant in my life.
15. I generally prefer novelty over familiarity.
16. I dislike ambiguous situations. (reverse coded)
17. Some problems are so complex that just trying to understand them is fun.
18. I have little trouble coping with unexpected events.
19. I pursue problem situations which are so complex some people call them "mind boggling."

- 20. I find it hard to make a choice when the outcome is uncertain. (reverse coded)
- 21. I enjoy an occasional surprise.
- 22. I prefer a situation in which there is some ambiguity.

## Appendix B

### Femininity Scale (Hofstede, 1980a)

#### Response Formats

- 1 = Strongly Disagree
- 2 = Disagree
- 3 = Neither Agree nor Disagree
- 4 = Agree
- 5 = Strongly Agree

#### Statements

1. Men needn't be assertive, but can also assume nurturing roles.
2. Sex roles in society are more fluid.
3. There should be equality between the sexes.
4. Quality of life is important.
5. You work in order to live.
6. People and environment are important.
7. Interdependence is the ideal.
8. Service provides the motivation.
9. One sympathizes with the unfortunate.
10. Small and slow are beautiful.
11. Unisex and androgyny are ideal.

Note: Item #2 and 11 were excluded in the final measure to increase Cronbach's alpha from .51 to .59.

## Appendix C

### Masculinity Scale (Hofstede, 1980a)

#### Response Formats

- 1 = Strongly Disagree
- 2 = Disagree
- 3 = Neither Agree nor Disagree
- 4 = Agree
- 5 = Strongly Agree

#### Statements

1. Men should be assertive. Women should be nurturing.
2. Sex roles in society are clearly differentiated.
3. Men should dominate in society.
4. Performance is what it counts.
5. You live in order to work.
6. Money and things are important.
7. Independence is the ideal.
8. Ambition provides the drive.
9. One admires the successful achiever.
10. Big and fast are beautiful.
11. Ostentatious manliness (“machismo”) is appreciated.

## Appendix D

### Honor, Face, and Dignity Scale (Adapted from Aslani et al., 2016; Severance & Gelfand, 2013)

For the following questions, please indicate how strongly you **agree** or **disagree** with the listed statements.

#### Response Formats

- 1 = Strongly Disagree
- 2 = Somewhat Disagree
- 3 = Neither Agree nor Disagree
- 4 = Somewhat Agree
- 5 = Strongly Agree

#### Statements

1. It is important to maintain harmony with others. (F)
2. How much I respect myself is far more important than how much others respect me. (D)
3. No one (except me) can make me feel diminished. (D)
4. People who are of a higher social status deserve more respect. (H)
5. No one can take a person's self-respect away from him/her. (D)
6. It is important to be tough so that others won't take advantage of you. (H)
7. It is important to not "stand out." (F)
8. Everyone is born with equal human worth. (D)
9. A good clue to another person's worth is how much others respect him or her. (H)
10. If someone insults me and I don't respond, I will look weak. (H)
11. If someone insults me, I personally should punish them. (H)
12. People should know their place and not try to get more status than they deserve. (F)
13. How others treat me is irrelevant to my worth as a person. (D)
14. My worth depends on what other people think of me. (F)
15. It is important to be humble. (F)
16. It is important to let other people know that I can't be pushed around. (H)
17. It is okay to use violence to defend your reputation when necessary. (H)
18. Every human being has worth that can never be taken away. (D)
19. Insults demand personal retaliation. (H)

H = Honor



F = Face

D = Dignity

Note: Item #1 and 15 were dropped in the final measure of face to increase Cronbach's alpha from .27 to .36. Item #1, 2, 3, and 6 were excluded in the final measure of honor to increase Cronbach's alpha from .65 to .74.

## Appendix E

### Fatalism Scale (Jacobson, 1999)

For the following questions, please indicate how strongly you **agree** or **disagree** with the listed statements. If your religion is not Christianity, Judaism, or Islam, in the place of God, please refer to your own religion.

#### Response Formats

- 1 = Strongly Disagree
- 2 = Somewhat Disagree
- 3 = Neither Agree nor Disagree
- 4 = Somewhat Agree
- 5 = Strongly Agree

#### Statements

1. When bad things happen, we are not supposed to know why. We are just supposed to accept them.
2. People die when it is their time to die, and nothing can change that.
3. Everything that happens is a part of God's plan.
4. If bad things happen, it is because they were meant to be.

## Appendix F

## Individualism Scale (Singelis, Triandis, Bhawuk, &amp; Gelfand, 1995)

For the following questions, please indicate how strongly you **agree** or **disagree** with the listed statements.

Response Formats

- 1 = Strongly Disagree
- 2 = Disagree
- 3 = Neither Agree nor Disagree
- 4 = Agree
- 5 = Strongly Agree

Statements

1. I often do “my own thing.”
2. One should live one’s life independently of others.
3. I like my privacy.
4. I prefer to be direct and forthright when discussing with people.
5. I am a unique individual.
6. What happens to me is my own doing.
7. When I succeed, it is usually because of my abilities.
8. I enjoy being unique and different from others in many ways.
9. It annoys me when other people perform better than I do.
10. Competition is the law of nature.
11. When another person does better than I do, I get tense and aroused.
12. Without competition, it is not possible to have a good society.
13. Winning is everything.
14. It is important that I do my job better than others.
15. I enjoy working in situations involving competition with others.
16. Some people emphasize winning; I’m not one of them (reverse coded).

## Appendix G

### Power Distance Scale (a shortened version of Earley & Erez, 1997)

For the following questions, please indicate how strongly you **agree** or **disagree** with the listed statements.

#### Response Formats

- 1 = Strongly Disagree
- 2 = Disagree
- 3 = Neither Agree nor Disagree
- 4 = Agree
- 5 = Strongly Agree

#### Statements

1. In most situations managers should make decisions without consulting their subordinates.
2. In work-related matters, managers have a right to expect obedience from their subordinates.
3. Employees who often question authority sometimes keep their managers from being effective.
4. Employees should not express disagreements with their managers.
5. Managers should be able to make the right decisions without consulting with subordinates.
6. Managers who let their employees participate in decisions lose power.
7. A company's rules should not be broken even when the employee thinks it is in the company's best interest.
8. Once a decision of a top-level executive is made, people working for the company should not question it.

## Appendix H

### Interview Protocol and Questions

Thank you for agreeing to participate in this research! We really appreciate your help. We'll start your interview with just a few questions about the concept of trust. There are no right or wrong answers, so please just answer as honestly as you can.

1. What does the word "trust" mean to you?
2. What does trust mean to you within a work (or class project) environment?
3. How do you know when someone at work (or in a project) is trustworthy?
4. When you trust someone at work (or in a project), how do you treat (act toward) them?

Now we'll ask you some questions about specific past experiences you've had, ideally at a job, or perhaps during a class project if you have not had a job before. Try and think of experiences that you can remember well because it is more helpful to us if we can get a lot of details about it.

5. Think of a person you trusted a lot when working with them.
  - a. Can you describe the situation in which you were working with this person?
  - b. Why did you trust them so much?
  - c. How would you describe that person?
  - d. What did the person do or say that made you trust them?
  - e. How long did it take for you to trust them? Why?
  - f. Is there anything else relevant to us understanding why you trusted this person?
  - g. Can you provide some basic information about the person you trusted, like their gender, age, ethnicity, religion, relationship to you, and anything else you think might be relevant?
  - h. Do you have other examples of a person you trusted a lot at work? (*If so, repeat a-g*)
6. Can you think of a time when you were working with someone, either at a job or during a class project, when that person did something to lose, damage, or break your trust?
  - a. Can you describe the situation in which you were working with this person?
  - b. What did they do?
  - c. How did you react?
  - d. How did it make you feel?
  - e. What did it make you think?
  - f. How did the situation resolve itself (what was the outcome)?

- g. How did this experience change the way you interacted with that person?
  - h. Did the person ever regain your trust? If not, why not? If so, [SKIP TO 7b]
  - i. What would have been the best way that person could have regained your trust?
  - j. Can you provide some basic information about the person you trusted, like their gender, age, ethnicity, religion, relationship to you, and anything else you think might be relevant?
  - k. Do you have other examples of a person that lost your trust? (*If so, repeat a-j*)
7. Can you think of a time when someone you were working with, either at a job or during a class project, lost your trust, but that person eventually regained your trust?
- a. Can you describe the situation in which you were working with this person?
  - b. What did the person do to regain your trust?
  - c. How long did it take to regain your trust?
  - d. How did you react?
  - e. How did it make you feel?
  - f. What did it make you think?
  - g. How did the situation resolve itself (what was the outcome)?
  - h. How did this experience change the way you interacted with that person?
  - i. What would have been the best way that person could have regained your trust?
  - j. On a scale of 1 (no trust) to 5 (full trust), how much do you trust that person now? (*KP's thesis outcome*)
  - k. Can you provide some basic information about the person you trusted, like their gender, age, ethnicity, religion, relationship to you, and anything else you think might be relevant?
  - l. Do you have other examples of a person that regained your trust? (*If so, repeat a-j*)
8. Do you have any other thoughts on the experience of trust in work settings that you would like to share?

## Appendix I

### Example Transcript

**Interviewer:** Did that situation resolve itself? How was the outcome like, or how did you guys come up with a solution?

**Interviewee:** Definitely, the group's trust in her was broken for a few months. This happened around maybe not even a few months, maybe like a month-and-a-half. It happened around November. She was able to repair it over the winter break because she took the drawings. We didn't know that she took them and then she went home.

Her dad owned a factory in China. She took the drawings and some of the pieces that we were wondering like how would we build. She went and build them herself and added us factors. I was like, "OK."

**Interviewer:** How did you react to that?

**Interviewee:** We were grateful and surprised when she just brought it in.

**Interviewer:** You said it was over the winter break that you guys trusted her again. Did you guys continue working even over the winter break?

**Interviewee:** No. That's why we were so impressed because she was the only that went on ahead.

**Interviewer:** Did she ever apologize on why she didn't do anything about that specifically?

**Interviewee:** Yeah, she did apologize. We didn't really kick her out of the group.

**Interviewer:** How did it make you feel or think at the time?

**Interviewee:** We were surprised. I was pretty shocked, because we didn't know that she had access to our machine so as to make this. We were like, "Where did this come from?" The school was closed over the break.

## Appendix J

### Procedures in Coding Trust Repair Strategies

1. If a participant had more than one example, treat them as separate cases, because most of the times, the experiences (emotions, thoughts, etc.), strategies used, and post-repair trust were different.
2. If participants reported both personal and professional post-repair trust, only use professional post-repair trust in quantitative analysis.
3. If they used a strategy not specified in the current study, do not include it in quantitative analysis but in qualitative one.
4. If they used a combination of strategies, both of which are specified in the current study, only include the one that played a bigger role in repairing trust in quantitative analysis. Then, analyze the combination in qualitative analysis.
  - a. If they used a combination of strategies, one from the current study and one not from the current study (e.g., apology and time respectively), only include the one specified in the current study (i.e., apology) if it played a bigger role in repairing trust. Otherwise, treat them as not specified in the current study and analyze them qualitatively.
5. If the trustee was two people involved in the same violation situation, but participants did not talk about them separately or did not have different relationships or experiences with them, treat them as an individual.
  - a. If participants talked about them separately, had different post-repair trust, or had different relationships, treat them as separate cases.
6. If they gave two post-repair trust (e.g., 3 or 4), average them (e.g., 3.5).
7. There were two cases where the trustees showed a change in behavior and put effort (penance), but it was not directed towards the trustors or the violation situation (e.g., the project they worked together). After the violation, they showed hard work and responsibility in class in general, and the trustors observed that and said the trustees regained their trust. They were still coded as penance in the quantitative analysis and put a note on it.