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Is Saying Sorry Good Enough? Examining the Typologies of Apology in Organisational Response during Health Crises

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Abstract

When facing crises, organisations are increasingly faced with the prospect of apologizing to their stakeholders to maintain a good image and diffuse the anger and hostility directed at them (Hearit, 1994). While research has found that apology is the most effective crisis strategy (Kim, Avergy, & Lariscy, 2009), there is currently a lack of research on types of apology used and how primary stakeholders receive them. Through the Attribution and Apology Grid which we developed, this research examines public response to the types of apologies offered post-health crises against the levels of responsibility. A Perception-Behavioural Framework of Crisis Response was proposed to examine the relationships between apology, organisational responsibility and consumer behaviour. To ascertain stakeholders’ behavioural responses (complain, withhold and negative word-of-mouth), an experiment was conducted (N = 342) to mimic crisis broadcasts in laboratory setting. As an added dimension to the study, ethical concerns and likeability of the organisation were tested as potential mediating elements on these stakeholder behaviour propensities. Results showed strong interaction effects between attribution of responsibility and degree of apology on the response variables, and ethical concerns and likeability had varying amounts of mediating effects on stakeholders’ responses. Therefore, crisis communication professionals who wish to benefit from the use of the apology tool would need to utilise apology strategically, in order to achieve the desired stakeholders’ behaviour. From the findings, the Perception-Behavioural Framework of Crisis Response was refined, and the opportunities for future academic research, as well as implications for practitioners are also discussed.
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Chapter 1: Introduction

The multitude of crises has led to organisations facing increasing pressure to take responsibility, respond to their consumers and apologise in situations where they are blamed for their malpractices. The struggles faced when crafting post-crisis response point to two key areas: organisations lack knowledge and understanding on typologies of apology and how their stakeholders receive them.

Take the case of the 2008 milk scandal in China for instance. The organisation behind the distribution of tainted milk, Sanlu, was blamed for causing at least six babies’ deaths and damaging the kidneys of some 294,000 babies. As such, China’s reputation as a hotspot for business and manufacturing was tarnished, drastically lowering global consumer confidence in their products (Ye & Pang, 2011). Evidently, crises, in this context, health crises, have the ability to severely impact an organisation’s reputation, affect its performance and generate negative outcomes (Coombs, 2007). Dowling (1986) argued that stakeholders’ investment, career and buying decisions are based on the reputation of firms, and consumers’ confidence in an organisation may diminish as their reputation tarnishes. Thus, there is a need to examine how organisations can engage with stakeholders to mitigate the threat on its reputation and regain consumer confidence.

In crises, organisations are often held responsible and the degree of their crisis responsibility varies. The level of crisis responsibility attributed to the organisation is a primary indicator of the level of threat posed to the organisation’s reputation and the crisis response strategies necessary to address the threat (Coombs, 2008). With a variety of crisis responses available, Benoit and Pang (2008) argued that this would help to save the organisation’s “face” and repair its reputation. Apologising is argued to be the highest form of acceptance of
responsibility (Weiner, 1995), as it is seen as the act of expressing regret, often involving the acceptance or denial of blame for the situation.

Largely triggered by consumers’ responses, organisations apologise mainly to maintain a good image and diffuse some of the anger and hostility directed at them (Hearit, 1994). Research has found that apology is the most effective crisis strategy (Kim, Avery, & Lariscy, 2009), but what constitutes a sincere apology? Would a mere “I apologise” or “I regret this has happened” work? Can an apology be flippant as it can be sincere? What should accompany the apology? Currently, there is a lack of research into the typologies of apology used and how primary stakeholders receive them.

The objective of this study is to address this gap in apology literature and stakeholders’ responses. First, we examine the types of apology statements that can be offered. Second, we seek to investigate stakeholders’ perception of the organisation post-apology. Through this study, practitioners will have a better understanding of typologies of apology they can use post-crisis, and how their stakeholders’ perception of the organisation can affect behavioural responses in terms of complaining, withholding and negative word-of-mouth (WOM) behaviours. Through these insights, practitioners can elicit a particular response from their stakeholders to mitigate the threat on its reputation and regain consumer confidence.

It is important for organisations to understand how they are viewed by their stakeholders and what the consequences of these perceptions will be. Will stakeholders choose to speak out and complain to relevant authorities about the organisation, engage in withholding behaviour or pass on negative views of the organisation and its actions to people they know? These are compelling reasons to investigate the different types of apology statements and how stakeholders view and react to them.
To achieve this, we developed the Attribution and Apology Grid to examine organisational and stakeholder responses. Integrating Hearit and Borden’s (2006) study of manner and content in apologies, Hargie, Stapleton, and Tourish’s (2010) identification of discursive strategies used to disperse the blame attributed to the apologist, as well as real-life apology exemplars, five apology statements were developed. These statements were juxtaposed against the continuum of levels of attribution of responsibility, built on Coombs’ Situational Crisis Communication Theory (SCCT) (Coombs, 2010) and Weiner’s (1986) Attribution Theory. The Attribution and Apology Grid aims to examine the interaction and relationship between the levels of attribution of responsibility and the degrees of apology statements. This would thus guide organisations in the selection of appropriate degrees of apologies as appropriate crisis responses.

To further understand stakeholders’ behavioural responses in a crisis post-apology, the Attribution and Apology Grid was integrated with literature on organisational perceptions (ethical concerns and likeability) and behavioural responses (complaint, withhold and negative WOM behaviours) to develop the Perception-Behavioural Framework of Crisis Response. This conceptual framework seeks to ascertain whether stakeholders’ perceptions of the organisations’ ethics and the likeability of an organisation can potentially mediate their complaining, withholding, and negative WOM behaviours.

To investigate the interaction effects between the levels of attribution of responsibility and the degrees of apology, data was drawn from an experiment where participants were exposed to specially constructed videos, depicting a local news clip reporting on a fictitious health crisis and featuring the delivery of an apology by the organisation. These variables were tested
experimentally in hopes of understanding stakeholders’ perceptions of different degrees of apologies juxtaposed against levels of attribution of responsibility.

This study is significant on three fronts. First, it investigates the relationship between levels of attribution of responsibility and degrees of apology. It seeks clarification on the degree of apology an organisation should use, depending on the level of responsibility attributed to them. Second, this study examines the potential of stakeholders’ post-apology ethical concerns and likeability towards the organisation mediating their response to the crisis situation and the organisation. By doing so, the content of the apology statement as well as the tone and manner it was delivered is explored, investigating how it affects stakeholders’ perception of the organisation post-apology. Third, this study seeks to further understanding of stakeholders’ post-apology reactions, focusing on the extent of which stakeholders will display complaining, withholding, or negative WOM behaviours. Organisations will then be better informed in shaping their apology statements to elicit desired responses and actions from their stakeholders.

With this, we hope that organisations will be able to repair their image effectively after a crisis through the issuance of an apology statement to their stakeholders.

The subsequent chapters in this report will first provide a background on past research relevant to the scope of our study. The method used and data collected from the experiment conducted will be further elaborated upon. Following that, the experiment results will be discussed, before the limitations of this study are addressed.
Chapter 2: Literature Review

2.1 Apology in crisis theories: The strategy of last resort?

Crisis communication research that focuses on developing organisational strategies to respond to different crisis situations has primarily relied on the Image Repair (IR) theory and the Situational Crisis Communication Theory (SCCT) for guidance. Arguably, these are the two dominant theories in crisis research (Coombs, Frandsen, Holladay, & Johansen, 2010; Dardis & Haigh, 2009). While IR theory focuses on texts (Benoit & Pang, 2008), SCCT takes the context into consideration, such as the organisation’s crisis and relationship history (Coombs, 2008).

Reputation is an “important and invaluable resource for an organisation” (Pace, Fediuk, & Botero, 2010, p. 412), where IR theory contends that reputation and credibility of the organisation depends on stakeholders’ perceptions. The image of an organisation plays a critical role in building and maintaining relationships with stakeholders. Thus, when an organisation’s image is threatened, it requires much effort for it to be repaired (Benoit & Brinson, 1999).

When stakeholders attribute responsibility to an organisation, stakeholders expect the organisation to account for its actions (Allen & Caillouet, 1994; Benoit, 1995; Coombs, 1995). SCCT suggests that organisations need to accept responsibility for the crisis in order to reduce any reputation damage they may have incurred (Coombs, 2007). To protect reputational assets, SCCT offers 10 crisis response strategies, categorised into three postures. According to Coombs (2008), each posture represents a set of strategies that share similar communicative goals, varying in terms of their focus in protecting the crisis victims. It is recommended that the deal posture, which includes apology, can be used in situations where an organisation is responsible for the misdeeds, or brought about by human error.
Both IR and SCCT theories recommend apology, or mortification, as the last tactic in its inventory of crisis response strategies that an organisation can undertake. Often, the apology tactic is seen as a strategy to be used at the last resort, when all other strategies have failed. However, Pang and Cameron (2011) classified it as the most accommodative act the apologist can assume when an organisation deals with a crisis.

**2.2 Apology can help assuage stakeholders**

In Bradford and Garrett’s (1995) discussion of message strategies employed by organisations during crises, they found that the preferred message strategy desired by stakeholders is apology. An organisation’s image is negatively impacted by accusations of unethical organisational behaviour if corporate executives do not respond to the current crisis at hand. Based on this significant finding, Bradford and Garrett (1995) suggested that corporate executives should focus on how to respond instead of deciding on whether or not to respond to the accusations of unethical behaviour in the first place. Their study found that when corporate executives remain silent during a crisis, the stakeholders are highly likely to process negative information and thus lower their perceived image of the organisation in question. Ultimately, stakeholders expect conciliatory statements after wrongdoing; anything less and they draw negative conclusions about an organisation and its ethics.

Furthermore, Bradford and Garrett (1995) emphasised the importance of choosing a communicative response option that matches the situational characteristics. In a bid to protect the organisation’s image, corporate executives must not only respond, but should also align their communicative responses according to the severity of the crisis. In certain cases, while offering no response to the accusation of unethical business practices can damage the image of the organisation, providing an inappropriate response strategy might cause a severe backlash.
Perhaps the most significant finding in Bradford and Garrett’s (1995) study is that concession is seen as an effective communicative response option. An indication of this finding is that concessions may not only be used to safeguard an organisation’s image, but may actually help to enhance it. Hence, to avoid incurring further damage to the organisation’s reputation, it is recommended that full disclosure, coupled with a profound apology, be delivered.

### 2.3 What constitutes a good apology?

#### 2.3.1 Manner and Content of an Apology

In what has been termed the “age of apology” (Brooks, 1999, p. 3) and the “apology phenomenon” (Lazare, 2004, p. 7), apologies from organisations are now widely expected by stakeholders, especially when they are affected. To apologise and admit guilt is to assume responsibility and culpability (Hearit & Borden, 2006). Not apologising when the situation calls for it results in public anger and distrust (Tyler, 1997). Hearit and Borden (2006) argued that for apology to be effective, the manner and content should be appropriate. Particularly, the components identified under manner determine the ‘How’ of the apology, while those under content determine the ‘What’ of the apology. Upon establishing the relevance of apology in today’s organisational environment, it is necessary to understand the apology components that when put together, creates a means to communicate with stakeholders in a post-crisis situation.

Hearit and Borden’s (2006) idea of ‘Manner’ pertains to how the apology is carried out by the apologist with five key components identified. The accuracy and adequacy of information conveyed through the apology is identified as **truthfulness** and they suggest that the apologist must not neglect to convey true information that attributes blame to them. Secondly, the **sincerity** of an apology should also be expressed by way of taking action to rectify the situation and communicating a desire to mend the relationship with affected parties. The apologist should also
deliver the apology \textit{voluntarily} rather than do so in response to stakeholders’ pressure. Lastly, Hearit and Borden (2006) acknowledged the need for the apology to \textit{address all stakeholders} who are directly and indirectly affected by the crisis, and deliver the message on a platform that all stakeholders have access to.

In the ‘Content’ of an apology, nine key components were identified. Firstly, the apologist should \textit{explicitly acknowledge the wrongdoing} that caused the crisis and accept blame for the problems caused. The apology should encompass an \textit{expression of regret} that demonstrates sympathy for the predicament of affected parties while \textit{seeking forgiveness} and conveying the apologist’s hope for \textit{reconciliation}. The apologist should \textit{identify with injured stakeholders} by showing empathy towards those directly and indirectly affected by the wrongdoing. The message should contain a \textit{full disclosure} of all information regarding the wrongdoing and \textit{address the expectations of stakeholders}. Particularly, this includes releasing information that addresses the causes and effects of the apologist’s wrongful actions. Hearit and Borden (2006) also suggested that the apologist should \textit{communicate willingness to engage in corrective action} and \textit{offer appropriate compensation} in the apology.

\textbf{2.3.2 Discursive Strategies to Deflect Blame}

Hargie et al.’s (2010) analysis of public apologies to derive how public figures used apologies to attribute blame and deflect responsibility identified four main types of discursive strategies, each of which served to disperse the blame attributed to the apologist. In \textit{expressing regret}, it was found that although the apologist employed the phrase “I am sorry for/at...”; not following up with an acknowledgement of the link between their actions and the crisis at hand rendered it an indirect and insincere apology that attributes the blame to external factors.
Secondly, the apologist may practice *alignment with others affected by the crisis* by conveying that they share the negative effects of the crisis with the injured stakeholders, using phrases like “we share your pain” and “we know what you are going through.” Using *disassociation from the events*, the apologist can separate the wrongdoing from his own organisation by using passive sentence structures, such as “the distress that has been caused,” with no acknowledgement of by whom the distress was brought about. Lastly, statements that *express willingness to apologise or reference to past apologies* in place of a direct apology are also a means of deflecting responsibility.

### 2.4 Attribution of Responsibility and Degree of Apology

Situational Crisis Communication Theory (SCCT) was developed to fully articulate the connection between crisis types and crisis response strategies. The central assumption is that the crisis situation shapes what will be seen as an effective crisis response. Hence, the crisis situation guides the organisation in their selection of appropriate crisis responses (Coombs, 2010).

Weiner’s (1986) Attribution Theory is used to understand how crisis affects organisational reputation. Adopting appropriate crisis response strategies is based on how stakeholders attribute organisational responsibility for a crisis. It follows that the greater the stakeholder attributions of organisational responsibility for a crisis, the greater the threat posed by the crisis to the organisation’s image. Attributions of crisis responsibility are linked to organisational reputation, behaviours towards the organisation and affect towards the organisation. According to Coombs and Holladay (2002), assessing the crisis situation requires the identification of crisis type. Stakeholders interpret the event based on the identification of crisis type. The strength of attributions or organisational crisis responsibility generated varies
with the crisis types. Based on SCCT research, crises are categorised into three types, depending on the attributions of organisation crisis responsibility each generates:

(1) victim (low attributions of organisational crisis responsibility);

(2) accidental (modest attributions of organisational crisis responsibility); and

(3) preventable (strong attributions of organisational crisis responsibility)

Intensifiers of the crisis threat also have to be taken into account. The two categories of intensifiers have been identified as crisis history and prior relationship reputation. Crisis history entails similar cases, if any, that occurred in the past. Prior relationship reputation is how well or how poorly the organisation had treated stakeholders in the past (Schwarz, 2008). The threat to an organisation’s image is heightened if both intensifiers have a negative variable. As such, this illustrates that people attribute greater organisational crisis responsibility when there is either a history of past crises or an unfavourable prior relationship reputation. The effect of the intensifiers has been termed the Velcro Effect (Coombs, 2004; Coombs & Holladay, 2006).

To restore an organisation’s image, SCCT thus proposes four groups of crisis response strategies. One of these strategies is the Rebuild strategy, which attempts to improve the reputation and include compensation and apology. SCCT holds that as attributions of organisational crisis responsibility become stronger, organisations must use more accommodative crisis response strategies. In addition, once intensifiers appear, organisations should consider moving to more accommodative strategies, such as compensation and apology (Coombs, 2010). Past literature has pointed out that stakeholders’ perceptions of the organisation post-crisis affect their actions, including their investment, career and buying decisions (Dowling, 1986). As such, this study focuses on three stakeholder behavioural responses: complaining, withholding and negative WOM behaviour.
Complain. Customer complaint behaviour (CCB) will also be examined, as it helps in the understanding of the stakeholders’ dissatisfaction with the organisation, leading to complaint behaviour (Lewis, 1982; Ross & Oliver, 1984; TARP, 1979; 1986). Day (1980) and Landon’s (1980) research revealed that the CCB phenomenon is triggered by feelings or emotions of perceived dissatisfaction. CCB responses can fit into two broad categories: behavioural and non-behavioural. Typically, behavioural responses constitute any or all stakeholder actions that convey an expression of dissatisfaction (Landon, 1980), not limited to those directed towards the organisation, but also including behaviours involving third parties (e.g. taking legal action) or even friends and relatives (e.g. engaging in negative WOM communication) (Day, 1980; Richins, 1983).

Hirschman (1970) also suggested a taxonomy of CCB responses. This helps to classify the options available to dissatisfied stakeholders into three groups: (1) stakeholders could exit the relationship (e.g. terminate future contact with the organisation); (2) stakeholders could voice their dissatisfaction to the organisation (e.g. attempt to change the situation by complaining directly to the organisation rather than end the relationship); and (3) stakeholders could show loyalty to the organisation by neither exiting nor voicing their dissatisfaction (e.g. suffering in silence). Further research by Singh (1988) found that suffering in silence was the most common option selected by stakeholders when they are dissatisfied.

With the understanding of CCB and its consequences, organisations will then be able to explain and predict consumer’s repurchasing intentions and brand loyalty towards the organisation (Day, 1980; Engel & Blackwell, 1982; Richins, 1983).

Withhold. Withholding behaviour measures the extent to which respondents will shy away from interacting with the organisation because of trust and safety concerns they have
Is Saying Sorry Good Enough? Examining the Typologies of Apology

(Lwin, Wirtz, & Williams, 2007a) over the consumption of the organisation’s products. Lwin, Wirtz and Williams (2007b) proposed that stakeholders are more likely to engage in withholding behaviour in situations of high concern. Withholding behaviour includes responding with defensive actions or refusal to have any interaction or relationship with the organisation.

A study by Phelps, Nowak and Ferrell (2000) showed that stakeholders’ purchase intentions were reduced when they were concerned about the organisations’ reputation and actions. This withholding behaviour illustrates that stakeholders have the ability to affect an organisation’s operations. With an understanding of how stakeholders respond to an organisation post-crisis and post-apology through their withholding behaviour, organisations will then get a better sense of the actions and responses they can take to ensure that withholding behaviour towards the organisation is minimised.

**Negative WOM.** Negative WOM communication is measured by the extent to which respondents will report the incident and share about their experiences to their friends and relatives (Lwin et al., 2007a). In the healthcare industry, it was found that there was an increase in the influence of WOM communication over the years (Williams & Hensel, 1991). Several researchers also realised that WOM information was used as a source and was most utilised at the critical stages of evaluation and actual purchase decision (Arndt, 1967; Fisher & Anderson, 1990; Rogers, 1962).

With the intensity of negative WOM behaviour being motivated on an individual’s personal experiences (Wee, Lim, & Lwin, 1995), other researchers found that there were other variables such as credibility and trustworthiness of the organisation that affect negative WOM communication among stakeholders (Bearden & Etzel, 1982; Bearden, Netemeyer, & Teel, 1989; Herr, Kardes, & Kim, 1991; Price, Feick, & Higie, 1989). Past research has also provided
ample support for the existence of a negative or inverse relationship between satisfaction with the organisation and WOM behaviour. A study of Coca-Cola’s customers showed that dissatisfied customers engaged in twice as much WOM, as compared to satisfied customers (TARP, 1981). As such, WOM communication is an important stakeholder behaviour to examine because it has the potential to negatively affect stakeholders’ perception of the organisation, leading to an organisation’s decline in reputation.

Past research shows that the factors of organisational responsibility and organisational response can each influence stakeholder behaviour. In post-crisis, the quality of a company’s response to complaints in the form of apology and effort significantly influence how consumers then choose to act towards them (Davidow, 2000; Yavas, Karatepe, Babakus, & Avci, 2004). Research also points to the existence of a relationship between consumer experience and involvement with the organisation with complaining behaviour. The greater the amount of dissatisfaction with the company and involvement with the product or service, the greater the likelihood of consumers complaining when they are let down by the organisation (Sharma, Marshall, Reday, & Na, 2010). A study by Kim (2006) showed that when stakeholders feel that their predicaments are caused by external organisational factors beyond their control, they are more activated to spread negative WOM about their experience. Increasing consumer activism has also seen the action of withholding engagement with an organisation in response to perceived market abuses (Smith, 1990).

Building on this literature, we seek to investigate the interaction effects between levels of responsibility attributed to an organisation and degrees of apology. As such, the following research question is proposed:
**RQ1:** How do attribution of responsibility and degree of apology interact in influencing these stakeholder responses?

(a) Complain (b) Withhold (c) Negative WOM

2.5 Development of the Attribution and Apology Grid

As discussed, this study aims to investigate the relationship and interaction effects between levels of responsibility attributed to an organisation and degrees of apology. Through this, insights can be gathered on stakeholders’ response and behaviour post-apology. To do so, we developed the Attribution and Apology Grid (Figure 1), using the concept of attribution of responsibility and setting it against the context of apology.

**Figure 1: Attribution and Apology Grid**

As shown in Figure 1, the grid has two focal components visually shown as the horizontal and vertical axes. Along the horizontal axis (degree of apology), the strength of apology is placed along a continuum that is juxtaposed against the continuum levels of attribution of responsibility (vertical axis). The apology strength is categorised into five degrees of apology, which were developed drawing insights from the research of Hearit and Borden (2006) and Hargie et al. (2010). The degrees of apology also parallel exemplars of real-life public apologies.
For instance, the lowest level of apology, also known as pseudo-apology, borrows from a real-life exemplar of John Lennon’s apology after he implied that The Beatles was a more prominent force than Christianity. According to critiques (Frandsen & Johansen, 2010; Hargie et al., 2010; Hearit & Borden, 2006), the singer’s apology statement was insincere, and he offered it only because he felt like he was expected to: “I apologise if that will make you happy. I still don’t know quite what I’ve done” (Wallop, 2009).

On the other end of the spectrum, inspiration was drawn from JetBlue Airways’ apology after their flights were grounded for several days following a storm. The airline’s CEO, David Neeleman, came forward with a video apology, coupled with a published apology. An excerpt of the published apology goes as follows: “Words cannot express how truly sorry we are for the anxiety, frustration and inconvenience that you, your family, friends and colleagues experienced... We know we failed to deliver on this promise” (Neeleman, 2007). The full list of developed apology statements, together with the real-life exemplars which they parallel can be found in Appendix D.

Along the vertical axis, attribution of responsibility is based on Coombs’ (2010) SCCT classification of low, modest and strong attributions, as described earlier. According to Coombs (2007), a crisis is able to change the way stakeholders view the organisation, potentially leading to negative perceptions, damaging the organisation’s reputation. The amount of reputation damage suffered by the organisation is strongly related to how much responsibility stakeholders attribute to the organisation (Coombs, 1998). It is found that when an organisation experiences a low level of attributed responsibility, the reputation damage is expected to be minor. When stakeholders attribute a higher level of responsibility to the organisation, reputation damage is
predicted to be more severe (Pace et al., 2010). The developed crisis scenario of varying levels of attributed responsibility can be found in Appendix C.

Research in crisis communication also suggests that one of the ideal ways for an organisation to respond to crisis situations is through the use of an apology (Benoit, 1995; Hearit & Borden, 2006). When organisations apologise, stakeholders are able to see that the organisation is taking steps to make changes and ensure that such incidents do not take place in the future (Pfarrer, Decelles, Smith, & Taylor, 2008). At the same time, organisations can accept responsibility and apologise to reduce negative feelings stakeholders have towards them (Bachman & Guerrero, 2006). As such, if the organisation fails to accept responsibility and apologise for its actions, stakeholders will be likely to retain their negative feelings about the organisation. Thus, whether an organisation accepts responsibility and provides an apology will affect how hostile stakeholders feel towards the organisation (Pace et al., 2010). Building on this literature, our first research question focuses on how stakeholders’ behavioural responses will change as the degree of the apology delivered by the organisation increases.

Evidently, in the context of a crisis where a health organisation contravenes its promise to deliver wellness to its stakeholders, consumer backlash is inevitable. This is reinforced by the wealth of research into the effects of organisational response quality and blame for the scenario on consumer behaviour. While the two variables - attribution of responsibility and degree of apology - have been separately examined, to our knowledge there is no study to date that investigates the combined effects of these two variables.

2.6 Development of the Perception-Behavioural Framework of Crisis Response

To examine how stakeholders’ post-crisis ethical concerns and likeability towards the organisation post-apology mediate their behavioural responses to the crisis situation and the
organisation, we advanced the Attribution and Apology Grid, together with literature on organisational perceptions (ethical concerns and likeability) and behavioural responses (complain, negative WOM, and withhold behaviours) to develop the Perception-Behavioural Framework of Crisis Response (Figure 2). The conceptual framework links the effects of attribution of responsibility and degree of apology to that of perceptions of the organisation that stakeholders have. In turn, each organisational perception variable affects stakeholders’ behavioural responses.

**Figure 2: Perception-Behavioural Framework of Crisis Response**

Through the development of the Perception-Behavioural Framework of Crisis Response, we hope to investigate the relationship between levels of responsibility attributed to the organisation and degrees of apology, to find out how it affects stakeholders’ perceptions of the organisation. With crises having the ability to impact an organisation’s reputation and the way stakeholders perceive the organisation (Coombs, 2007), this established relationship between crisis responses and stakeholders’ perceptions of the organisation forms the basis of the first section of the Perception-Behavioural Framework of Crisis Response.
It has been found that stakeholders have different behavioural responses when they make decisions about their investment, career and buying choices, based on their perceptions of the organisation (Dowling, 1986). A study by Jones, Moore, Stanaland and Wyatt (1998) also found that an organisation’s credibility plays an important role in influencing stakeholders’ intentions of using an organisation’s products or services. The credibility dimension was developed and found to be formed by four factors: trustworthiness, likeability, expertise and attractiveness. As few studies have looked in-depth into the “likeability” factor of an organisation, this study will investigate and measure the impact of an organisation’s likeability on stakeholders’ behavioural intentions.

Research has also shown that stakeholders’ concerns pertaining to an organisation’s ethics also affect their behaviours (Katja & Blümelhuber, 2011). Ethical concerns relate to stakeholders’ apprehension and uneasiness over the organisation’s behaviour and responses. However, Katja (2010) found that current research remains inconclusive about how strongly ethical concerns affect stakeholders’ behavioural responses and this study aims to fill this gap.

**Ethical Concerns.** A study by Katja and Blümelhuber (2011) found that stakeholders’ perceptions about an organisation’s ethics impact their evaluation of the organisation and its business, affecting their purchase behaviour. In any crisis situation, an organisation thus needs to communicate to their stakeholders, and be transparent in their actions (Schoenberg, 2005).

**Likeability.** The “likeability” factor refers to the ability to create positive attitudes in individuals, through the delivery of emotional and physical benefits (Sanders, 2005). When faced with a crisis, organisations should be concerned with increasing their “likeability” factor as it has been shown that the more likeable a person or an organisation is, the better its chance of
receiving a positive outcome when faced with decisions that are out of its control (Sanders, 2005, as cited in Lwin, Pang, Dafir, Ruslan, & Yeong, 2010).

As such, ethical concerns and likeability were proposed as potential mediators in the Perception-Behavioural Framework of Crisis Response. Through this conceptual framework, we also propose that ethical concerns and likeability of an organisation by stakeholders will fully mediate stakeholders’ behavioural responses. This study focuses on three stakeholder behavioural responses with basis on past research in the area of stakeholder responses to organisational actions. The measurement scales were adapted from existing research.

Based on the above discussion, the following hypotheses are posited:

**H1:** Ethical concerns will mediate the relationships between the independent variables (attribution of responsibility and degree of apology) and the consumer behaviours of

(1a) complain, (1b) withhold, and (1c) negative WOM.

**H2:** Likeability will mediate the relationships between the independent variables (attribution of responsibility and degree of apology) and the consumer behaviours of

(2a) complain, (2b) withhold, and (2c) negative WOM.

When testing these hypotheses, the measured variables will therefore cover two main areas of stakeholders’ responses to the apology:

(1) impression of the organisation post-apology; and

(2) stakeholders’ actions post-apology.

The dimensions of the measured variables display the different related responses. For the likeability dimensions, it consist of likeability, friendliness, kindness and helpfulness (Moon, 2000); while the ethical concerns dimensions consist of the organisation’s morals, ethical standpoint and whether the organisation is engaging in correct behaviour (Lwin et al., 2007a).
Chapter 3: Method

3.1 Experiment

To determine the effects of various factors on participants’ perceptions and behavioural intentions, the experimental method was used for this study. According to Falk and Heckman (2009), laboratory experiments are powerful whenever tight control of dependent variables (e.g. demographic characteristics of participants, individual preference parameters, etc.) is essential, especially in behavioural assumptions. The laboratory experiment was deemed suitable for this study. According to Baum, Newman, Weinman, West and McManus (1997), the use of laboratory experiment allows for control over the independent and dependent variables, through which numerous extraneous variables could be eliminated. Laboratory experiments also allow for random assignment of subjects to conditions. This helps to reduce any form of bias that may potentially skew the data findings. More importantly, tight control of dependent variables permits replicability of results, which is generally more difficult with field data.

3.2 Subjects

The Institutional Review Board for the ethical treatment of subjects had approved this study. A total of 342 undergraduates and graduates (males = 170, females = 172), aged between 21 and 27 years old, were recruited to participate in this experiment. The sample had an almost equal distribution of gender (males = 49.0%) and there was a good representation of undergraduates from various faculties within the university.

Participants responded to a call for participants via email. They were screened to ensure that they were at least 21 years of age. To ensure that the participants were likely to be exposed to international crisis communication messages in the media, they were asked to quantify their media consumption patterns. On average, most respondents get their news from online platforms...
(\(M = 13.181, SD = 14.795\)), followed by television (\(M = 11.265, SD = 10.756\)) and print newspapers (\(M = 8.264, SD = 9.364\)). Each respondent who participated and completed the accompanying questionnaire was given a monetary incentive of seven Singapore dollars.

Although concern has been raised pertaining to the use of undergraduate subjects (Hooghe, Stolle, Maheo, & Vissers, 2010), there have been considerably strong arguments supporting their use in research. In addition to robustness of data, it enhances interest in future research participation (McConnell, Kaal, & Marton, 2008) and provides educational benefits (Bowman & Waite, 2003).

### 3.3 Design

To create a scenario-based stimulus to mimic a real-life health crisis, a fictitious organisation was created for the purpose of this experiment. In this fictitious scenario, Tevana Pharmaceutical is a leading manufacturer of medicinal supplements in the health industry. Its newly developed drug, Nitrax, used to treat heart disease, has caused a number of patients to develop conjunctivitis upon consumption.

A between-subject factorial design (degree of apology x attribution of responsibility) was utilised for this experiment. The three levels of responsibility attribution and the five degrees of apology accounted for 15 unique conditions. The level of responsibility attribution was manipulated via the factors of the company’s actions after consumers fell ill (pro-active vs. passive) and its relationship with its overseas manufacturer (kept unaware of production fault by overseas manufacturer vs. knowingly engaged a manufacturer with unhygienic production practices). Each participant was randomly assigned to one out of 15 possible conditions, denoted by a different video stimulus. To ensure the scenarios were realistic, the news clips were modeled after a local television broadcaster’s news programme.
A male spokesperson was chosen to represent Tevana Pharmaceutical as their spokesperson in the video (please refer to Appendix B for video screenshots). According to Lwin et al. (2010), males are preferred as a spokesperson for an organisation in the event of a crisis. In addition, those wearing eyeglasses were found to lend an aura of trustworthiness as they were judged to be more successful and honest (Terry, 1989). As such, we took the necessary steps to ensure that the spokesperson representing Tevana Pharmaceutical displayed these important criteria. Participants were briefed prior to watching the news clip twice and presented with a transcript of the video for their reference. The ability to gain access to repeated news telecast mimics the reality of today’s digitised media environment. In recent years, broadcast companies in Singapore have expanded their business into the online digital realm, providing instantaneous access for users to acquire the latest news on the web (Palmer & Eriksen, 1999).

The video was screened in groups, with a maximum of 15 participants per session. Each participant was assigned to a pre-determined seat to reduce any form of communication during the course of the experiment. At the end the video screening, a questionnaire was administered to measure the participants’ perceptions of the organisation’s reputation, behavioural intentions and the overall impression on the handling of the crisis by the organisation. Table 1 shows the combination matrix of the stimuli administered to the participants.

**Table 1: Experimental Group Assignment**

<table>
<thead>
<tr>
<th>Attribution of Responsibility</th>
<th>Degree of Apology</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>1</td>
</tr>
<tr>
<td>Low</td>
<td>Group 1</td>
</tr>
<tr>
<td>Medium</td>
<td>Group 2</td>
</tr>
<tr>
<td>High</td>
<td>Group 3</td>
</tr>
</tbody>
</table>
3.4 Expert Checks

Five experts from both the government and private sectors of the Public Relations industry were consulted in the course of crafting the apology statements and crisis scenarios with differing levels of attribution of responsibility. They each had between five and 30 years experience working in the Public Relations industry. With their expertise and vast experience in the field, the experts provided feedback for the scenarios and apology statements in the following areas: (1) realism and believability; and (2) ranking of the apology statements and levels of attribution of responsibility for the scenarios.

With feedback from industry experts, the apology statements and scenarios were then pre-tested among respondents not from the Public Relations industry to establish whether the order of the statements and scenarios were accurate.

3.5 Manipulations and Stimuli

Altogether, a total of 15 unique video episodes were shot to fulfil the varying sets of stimuli conditions. Care was taken to ensure that all other extraneous variables were kept constant across all 15 videos. After undergoing several rounds of expert check and pre-tests, which will be elaborated in depth under the pre-test section of this chapter, the 15 different combinations of stimuli were created.

*Attribution of Responsibility.* Three levels (low, modest and high) of attribution of responsibility were simulated for this experiment. It followed that Tevana Pharmaceutical’s newly launched drug, Nitrax, has resulted in several consumers experiencing prolonged conjunctivitis upon consuming the drug. Upon investigation by the Health Sciences Authority, it was found that the drug was tainted with a classified chemical compound.
Under the low level of attribution of responsibility, Tevana Pharmaceutical had immediately suspended the overseas plant from manufacturing Nitrax and voluntarily initiated a drug recall, pulling Nitrax off the market. The manufacturing plant was responsible for the drug contamination but Tevana Pharmaceutical had managed to deflect the attribution of blame by initiating corrective measures to handle the crisis. At the medium level of attribution of responsibility, the overseas manufacturing plant had failed to inform Tevana Pharmaceutical about the drug contamination. After learning about the chemical contamination, Tevana Pharmaceutical waited a number of days before acting upon their consumers’ complaints. Lastly, under the high level of attribution of responsibility, Tevana Pharmaceutical had outsourced production of Nitrax to an overseas manufacturer with a previous record of unhygienic production practices and launched the product in the market despite being aware that patients will suffer health complications after consuming Nitrax. The developed crisis scenario of varying levels of attributed responsibility can be found in Appendix C.

Degree of Apology. The independent variable, degree of apology, was manipulated based on real life exemplars of apology articulated in the media. These apologies were adapted to suit the context of the experiment and were pre-tested to achieve their assigned level of apology on the continuum. On the lowest end, the apology statement was considered insincere and delivered only because the spokesperson was pressured to do so (Frandsen & Johansen, 2010; Hargie et al., 2010; Hearit & Borden, 2006). This type of apology was termed pseudo-apology. On the other end of the spectrum, we have termed the profound apology. Based on literature and parallel real life exemplars, this type of apology constitutes full disclosure and willingness to engage in corrective action (Bradford & Garrett, 1995; Hearit & Borden, 2006). The list of apology statements, and the real-life exemplars which they parallel, can be found in Appendix D.
3.6 Scales

Table 2 displays the scale items used (please refer to Appendix A). The items used were either adopted or adapted from existing scales. The full questionnaire is found in Appendix G.

3.6.1 Factor Analysis and Reliability Analysis

To check for data reliability, Cronbach’s alpha test was conducted on all questionnaire items used in this experiment. All the measure scales used attained good alpha scores, greater than 0.7. Factor analysis was conducted on all the questionnaire scales, and items which reduced the reliability loading to less than 0.7 were eliminated.

The complaint scale was trimmed to 3 items in order to increase the validity of the measurement. The scale, with the original 4 items, displayed a Cronbach’s alpha of 0.552, which did not reach the reliability standards of the experiment. Hence, one item was removed from the scale to bring the new 3-item Cronbach’s alpha value to an acceptable level.

These checks also reduced the number of questionnaire items for the Ethical Concerns scale to two, which sharpened its reliability. Gustav and Parkinson (1994) recommended that a larger number of points per scale item should be used, the smaller the number of items used to measure a single response. Therefore, a 7-point Likert scale was appointed to further strengthen the reliability of the adopted scales.

3.7 Pre-Test

3.7.1 Pre-Test of Apology Statements

In order to establish the true order of the degrees of apology and levels of attribution of responsibility, a pre-test and an expert check were conducted. To test for the true order of our attribution of responsibility scenarios and degree of apology statements, we recruited 18 participants through convenience sampling. Each participant was exposed to the three scenario
descriptions and asked to rank them in order from lowest to highest attribution of responsibility to the organisation.

T-tests conducted found that the level means were statistically different ($p < 0.1$) from one another (Low: $M = 1.330, SD = 0.485$, Medium: $M = 1.830, SD = 0.707$, High: $M = 2.830, SD = 0.383$). The same participants were asked to rank the five apology statements shown to them in order of least apologetic to most apologetic. T-tests conducted found that the level means were statistically different ($p < 0.1$) from one another (Level 1: $M = 1.110, SD = 0.323$, Level 2: $M = 2.280, SD = 0.752$, Level 3: $M = 2.830, SD = 0.707$, Level 4: $M = 4.000, SD = 0.686$, Level 5: $M = 4.780, SD = 0.428$). We concluded from this pre-test that the designed levels of attribution of responsibility and degree of apology were valid.

### 3.7.2 Pre-Test of Video Stimuli

The second pre-test was conducted to assess the completed 15 video stimuli before it was used for the experimental design. A total of 45 participants were invited to watch one video clip each. As such, each video stimulus had three participants for this pre-test. All respondents were asked to provide feedback on the following criteria: (1) audio quality of clip (clarity); (2) ease of understanding of the clip (whether sufficient information was provided); and (3) realism (authenticity of the video, scenario and content).

Running descriptive statistics, the results showed that respondents were generally receptive to the video stimuli. Measured by a five-point scale from low to high clarity, the audio quality ($M = 4.240, SD = 0.609$) was determined to be acceptable for viewing participants. Using a five-point scale from low to high understanding, the ease of understanding of the information relayed in the video clip ($M = 4.040, SD = 0.475$) was determined to be acceptable for audiences, with most respondents highly able to comprehend the video content. Lastly, using a five-point
scale from low realism to high realism, respondents were shown to have found the news bulletin simulation highly realistic ($M = 4.070, SD = 0.539$). In conclusion, our video stimuli were shown to be of high audio quality and were easily understandable and highly realistic.

3.8 Pilot Test

A pilot test was conducted in early January 2012 to simulate the actual experiment proceedings. A total of nine respondents participated in the pilot test where three of the 15 video stimuli were used. Following the set procedure of the actual experiment to be conducted, three respondents viewed each video stimulus simultaneously, in a classroom setting where the video was screened on with a projector. Respondents were provided with a transcript of the video stimuli for them to refer to, as well as a questionnaire, which they filled in after watching the video stimuli twice. Respondents were given a monetary incentive of five Singapore dollars after the questionnaire was administered and feedback on the experiment procedure given to the research assistants.

The rationale for conducting a pilot test was for the research assistants to familiarise themselves with the actual experiment proceedings and to test the questionnaire on a sample population. This was to ensure that the questions and instructions provided throughout the experiment were easily understood and comprehensible. Respondents were encouraged to provide feedback on aspects such as the audibility and clarity of the video stimuli, as well as difficulty encountered while answering the questionnaire. Confusing statements in the questionnaire were identified, and subsequently modified in view of the respondents’ feedback. Care was also taken to control for extraneous variables during the pilot test.
Chapter 4: Results

The following chapter describes the experimental results. A post-manipulation check was conducted to verify sound manipulations of the experiment. Following that, we examined our research questions and tested our hypotheses with the use of statistical methods.

4.1 Post-Manipulation Check

Post-manipulation checks were carried out on the levels of attribution of responsibility and degrees of apology. Firstly, a convenience sample of 15 individuals was drawn to survey the levels of attribution of responsibility. Each respondent was asked to read through the three scenarios that summarised the crisis situations where the company showed low, medium and high cause for blame. They were then asked to rank the scenarios according to how much responsibility they attributed to the company in each scenario. A one-way analysis of variance (ANOVA) test was conducted and it was found that the means of the levels of attribution were statistically different (Low: $M = 1.400, SD = 0.548$, Medium: $M = 2.800, SD = 0.837$, High: $M = 4.400, SD = 0.894$) suggesting that the manipulation was successful.

The post-manipulation check carried out on the designed degrees of apology found that some of the means of the designed apology levels were not statistically different from one another. 25 respondents were drawn by convenience sampling and a survey to rank the apology statements from 1 to 5, with 1 being the least apologetic and 5 being the most apologetic, was administered. Using one-way ANOVA, it was found that there was no statistically significant difference ($p > 0.1$) between the pairs of apology levels 2 and 3, 3 and 4 as well as 4 and 5. (Level 1: $M = 1.000, SD = 0.000$, Level 2: $M = 2.400, SD = 0.894$, Level 3: $M = 2.800, SD = 0.837$, Level 4: $M = 3.800, SD = 0.837$, Level 5: $M = 4.600, SD = 0.548$). As the grid necessitates a high degree of apology to mark the high end of the apology continuum (Doty & Glick, 1994),
apology levels 2, 3 and 4 were combined to form a combined grouping reflecting moderate
degree of apology, with apology level 1 as low degree and apology level 5 as high degree of
apology. As such, the experimental set-up was modified into a 3 (low, medium, high attribution
of responsibility) x 3 (low, moderate, high degrees of apology) factorial design.

Various researchers have proceeded with collapsing data findings that yielded no
significant difference between independent and dependent variables with post-manipulation
checks (Buck, Gray & Nuñez, 2012; Cumming & Nordin, 2005; Kivetz, Netzer, & Schrift,
2011). The lack of significant interaction in apology degrees 2, 3 and 4 revealed that participants
did not respond differently to the magnitude of apology. Table 3 presents the scores for the post-
manipulation checks on the levels of attribution of responsibility and degree of apology.

Table 3: Post-Manipulation Checks on the Levels of Attribution of Responsibility and
Degree of Apology

<table>
<thead>
<tr>
<th>Independent Variable</th>
<th>(I) True Level</th>
<th>(J) True Level</th>
<th>d(f)</th>
<th>Mean Difference (I-J)</th>
<th>Sig.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Attribution of Responsibility</td>
<td>Low</td>
<td>Medium</td>
<td>2</td>
<td>-1.400</td>
<td>&lt;0.1*</td>
</tr>
<tr>
<td></td>
<td></td>
<td>High</td>
<td>2</td>
<td>-3.000</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Medium</td>
<td>High</td>
<td>2</td>
<td>-1.600</td>
<td>&lt;0.1*</td>
</tr>
<tr>
<td>Degree of Apology</td>
<td>Level 1</td>
<td>Level 2</td>
<td>4</td>
<td>-1.400</td>
<td>&lt;0.1*</td>
</tr>
<tr>
<td></td>
<td>Level 1</td>
<td>Level 3</td>
<td>4</td>
<td>-1.800</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Level 1</td>
<td>Level 4</td>
<td>4</td>
<td>-2.800</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Level 1</td>
<td>Level 5</td>
<td>4</td>
<td>-3.600</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Level 2</td>
<td>Level 3</td>
<td>4</td>
<td>-0.400</td>
<td>&gt;0.1</td>
</tr>
<tr>
<td></td>
<td>Level 2</td>
<td>Level 4</td>
<td>4</td>
<td>-1.400</td>
<td>&lt;0.1*</td>
</tr>
<tr>
<td></td>
<td>Level 3</td>
<td>Level 4</td>
<td>4</td>
<td>-2.200</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Level 3</td>
<td>Level 5</td>
<td>4</td>
<td>-1.000</td>
<td>&gt;0.1</td>
</tr>
<tr>
<td></td>
<td>Level 4</td>
<td>Level 5</td>
<td>4</td>
<td>-1.800</td>
<td>&lt;0.1**</td>
</tr>
<tr>
<td></td>
<td>Level 4</td>
<td>Level 5</td>
<td>4</td>
<td>-0.800</td>
<td>&gt;0.1</td>
</tr>
</tbody>
</table>
4.2 Assessment of Research Questions

In order to assess the research questions and proposed hypotheses, we first conducted a 3x3 between-subjects ANOVA on the dependent variables - complaint behaviour, withhold behaviour and negative WOM behaviour. An alpha threshold level of 0.10 (alpha = 10%) was adopted for tests of statistical significance. A summary of the ANOVA results is presented in Table 4, showing the significance values of the interaction effects between attribution of responsibility and degree of apology on the dependent variables in question.

Table 4: Summary of ANOVA Scores: Complain, Withhold and Negative WOM

<table>
<thead>
<tr>
<th></th>
<th>Complain</th>
<th></th>
<th>Withhold</th>
<th></th>
<th>Negative WOM</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>F</td>
<td>Sig.</td>
<td>F</td>
<td>Sig.</td>
<td>F</td>
<td>Sig.</td>
</tr>
<tr>
<td>Attribution of Responsibility</td>
<td>7.403</td>
<td>&lt;0.1**</td>
<td>28.284</td>
<td>&lt;0.1**</td>
<td>2.151</td>
<td>&gt;0.1</td>
</tr>
<tr>
<td>Degree of Apology</td>
<td>2.394</td>
<td>&lt;0.1*</td>
<td>1.971</td>
<td>&gt;0.1</td>
<td>0.036</td>
<td>&gt;0.1</td>
</tr>
<tr>
<td>Responsibility x Apology</td>
<td>2.302</td>
<td>&lt;0.1*</td>
<td>2.136</td>
<td>&lt;0.1*</td>
<td>2.501</td>
<td>&lt;0.1*</td>
</tr>
</tbody>
</table>

The interaction effects of attribution of responsibility and degree of responsibility were significant for all the response variables - complain ($F = 2.302, p < 0.1$), withhold ($F = 2.136, p < 0.1$), and negative WOM ($F = 2.501, p < 0.1$). The following sections will further elaborate on the specific findings of interaction effects.

4.2.1 Examining the Interaction Effects of Independent Variables

The focus of our analysis is the three significant interaction effects between attribution of responsibility and degree of apology on the three response variables: complain, withhold and negative WOM. Within each dependent variable, interesting patterns also emerged. The findings for the variables (1) complain; (2) withhold; and (3) negative WOM, will be presented in the following segment.
Is Saying Sorry Good Enough? Examining the Typologies of Apology

For ease of explication in the following sections, we will make reference to vertical and horizontal comparisons graphically represented in Figures 3, 4 and 5. Vertical comparison will refer to comparison of the means in a specific level of apology across the three levels of responsibility attribution. In contrast, horizontal comparison will refer to comparison of the means in a specific level of attribution of responsibility across the three levels of apology.

(1) **Interaction Effect of Attribution of Responsibility and Degree of Apology on Complaining Behaviour**

**Figure 3: Interaction Effect on Complaining Behaviour**

RQ1(a) examined the possible interaction effects between attribution of responsibility and degree of apology on stakeholders’ complaining behaviour. Two-way ANOVA results in Table 4 found a significant two-way interaction effect on complaining behaviour ($F = 2.302, p < 0.1$).

Figure 3 shows the relationship found. In a horizontal comparison of the high attribution of responsibility condition, complaining behaviour increased as the apology delivered became more profound ($F = 5.797, p < 0.1$). Running one-way ANOVA to vertically compare the means
for complaining behaviour in high apology scenario ($M = 4.073, SD = 1.589$) to the two lower apology scenarios (Low: $M = 2.942, SD = 1.445$, Moderate: $M = 2.975, SD = 1.295$), significant differences were found ($p < 0.1$). In comparison, low and medium responsibility attribution scenarios did not see significant differences in horizontal comparisons of their respective means over the three levels of apology (Low: $F = 0.241, p > 0.1$, Moderate: $F = 0.791, p > 0.1$). Thus, we conclude the presence of interaction effects as the trends for complaining behaviour as apology level increases are different for the three levels of attribution of responsibility.

It is interesting to note that in the high apology scenarios, the propensity for consumers to complain was significantly higher when the attribution of responsibility was high ($M = 4.073, SD = 1.608$) than when it was low ($M = 2.696, SD = 1.439$) or medium ($M = 2.546, SD = 1.378$). The complain mean for high attribution of responsibility was confirmed to be significantly different ($F = 5.797, p < 0.1$) from the means of low and medium attribution levels which were not statistically different from each other.

To aid in the understanding of the findings, the results will be presented according to the different attribution of responsibility conditions.

*Low attribution of responsibility.* For the complain dependent variable, when the company faces low attribution of responsibility, there is little difference in consumer complaint behaviour as the transgressing company issues varying types of apologies. This is illustrated by the red line in Figure 3, which displays a relatively flat gradient, as it moves from the low degree of apology region through to the moderate and high degree of apology regions. This is evidence that regardless of the apology issued, when the company is perceived to harbour less fault, stakeholders will be unlikely to engage in complaint behaviour.
Medium attribution of responsibility. With medium attribution of responsibility, the pattern of behaviour which emerges is in accordance with our expectations, which was that the greater the degree of apology, the less likely negative behaviour will be engaged. From Figure 3, it is shown that the blue medium attribution of responsibility line gradually slopes downwards as it travels from the low to high apology regions of the graph.

High attribution of responsibility. When the organisation faces high attribution of responsibility, an entirely different pattern of behaviour emerges. In this scenario, the complaint behaviour is consistently low when the apology issued is low ($M = 2.696$, $SD = 1.378$) or medium-leveled ($M = 2.546$, $SD = 1.378$). However, when the company issues a high degree of apology, the likelihood to complain drastically increases ($M = 4.073$, $SD = 1.589$). This is represented visually by the green line on Figure 3, which remains flat from the low to medium level of apology segments, but quickly slopes upwards in a steep gradient to reach the scale point for the high degree of apology scenario. The emerged pattern is different from our expectations of the behaviour pattern, which was that the more the company apologises, the less likely the occurrence of negative behaviour.
RQ1(b) sought to investigate the interaction effect of attribution of responsibility and degree of apology on withholding behaviour in stakeholders. ANOVA results in Table 4 showed a significant two-way interaction effect on withholding behaviour ($F = 2.136, p < 0.1$).

As illustrated in Figure 4, withholding behaviour in high attribution scenarios is horizontally consistent across all three apology levels (Low: $M = 6.044, SD = 0.876$, Moderate: $M = 6.106, SD = 0.842$, High: $M = 6.105, SD = 0.723$). A test of one-way ANOVA confirmed that there were no significant differences among the means ($F = 0.125, p > 0.1$). Likewise, the means for withholding behaviour at low attribution of responsibility showed no significant difference as apology level increases (Low: $M = 5.255, SD = 1.060$, Moderate: $M = 4.774, SD = 1.321$, High: $M = 4.791, SD = 1.124$) with an $F$ score of $1.316 (p > 0.1)$. 

(2) Interaction Effect of Attribution of Responsibility and Degree of Apology on Withholding Behaviour

![Figure 4: Interaction Effect on Withholding Behaviour](image-url)
This observation is not manifested for medium attribution of responsibility (Low: $M = 5.408$, $SD = 1.457$, Moderate: $M = 5.431$, $SD = 0.992$, High: $M = 4.664$, $SD = 1.264$) with an F score of 3.909 ($p < 0.1$), showing that the means are significantly different across the three levels of apology. As there is no identical trend for withholding propensity in the three levels of attribution as apology level increases, interaction effects between degree of apology and attribution of responsibility on the withhold variable is concluded.

To aid in the understanding of the findings, the results will be presented according to the different attribution of responsibility conditions.

**Low and medium attributions of responsibility.** As the level of apology increases from low to high, the likelihood of stakeholders engaging in withholding behaviour falls in scenarios of low and medium attributions of responsibility. The red and blue lines in Figure 4 (low and medium attributions of responsibility respectively) illustrate this change in behaviour.

The red low attribution of responsibility line in Figure 4 initially slopes downwards but then flattens, while the blue medium attribution of responsibility line in Figure 4 adopts a sharp downward slope to finally come to rest on the bottom right portion of the graph.

The patterns of behaviour shown in both the low and medium attribution of responsibility lines are according to our expectations. In other words, as degree of apology increases, the likelihood of withholding behaviour being employed by the stakeholder will decrease.

**High attribution of responsibility.** A different pattern emerges when the organisation has high attribution of responsibility. With high attribution of responsibility, there is little change in withholding behaviour as the degree of apology issued by the transgressing company is enhanced. This is illustrated by the green line in Figure 4, which remains flat across the top of the graph.
RQ1(c) examined the interaction effect of attribution of responsibility and degree of apology on negative WOM behaviour in stakeholders. Two-way ANOVA results in Table 4 showed a significant two-way interaction effect on negative WOM behaviour ($F = 2.501, p < 0.1$).

As observed from Figure 5, a horizontal comparison for scenarios of high attribution of responsibility show the means increasing as the apology delivered gets more profound (Low: $M = 3.609, SD = 1.438$, Moderate: $M = 4.167, SD = 1.571$, High: $M = 4.681, SD = 1.539$). This is supported by one-way ANOVA results showing that significant differences were present ($F = 2.796, p < 0.1$). In low attribution of responsibility scenarios, negative WOM likelihood appears to be consistent across the three levels of apology (Low: $M = 3.621, SD = 1.554$, Moderate: $M = 3.600, SD = 1.553$, High: $M = 3.652, SD = 1.622$) and the lack statistical difference among the means is confirmed by an F-score of 0.024 ($p > 0.1$). In medium attribution of responsibility

![Figure 5: Interaction Effect on Negative WOM Behaviour](image-url)
scenarios, the means for the propensity for negative WOM behaviour decrease as the degree of apology increases (Low: $M = 4.458$, $SD = 1.560$, Moderate: $M = 3.789$, $SD = 1.487$, High: $M = 3.500$, $SD = 2.077$). However, a one-way ANOVA test found insignificant differences among the means and obtained an F-score of 2.230 ($p > 0.1$). Negative WOM behaviour is seen to be influenced by both attribution of responsibility and degree of apology.

To aid in the understanding of the findings, the results will be presented according to the different attribution of responsibility conditions.

**Low attribution of responsibility.** As can be seen from the relatively flat red line near the bottom of Figure 5, when attribution of responsibility is low, stakeholders’ engagement in negative WOM remains consistently unlikely. This provides evidence that when the company is not perceived to be at fault for the crisis, regardless of the apology issued, stakeholders are unlikely to spread negative information about the organisation.

**Medium attribution of responsibility.** At medium attribution of responsibility, as the degree of apology increases, the likelihood of stakeholder negative WOM decreases. The blue line in Figure 5 illustrates this phenomenon well, with a consistent downward sloping gradient, leading the line from the top of the graph at the low level of apology region, to the bottom of the graph at the high level of apology region. This pattern of behaviour aligns with our expectations, which were that the more the transgressing organisation apologises, the less negative behaviour will be engaged.

**High attribution of responsibility.** When the company faces high attribution of responsibility, an unexpected result occurs. As the level of apology increases, the likelihood to engage in negative WOM behaviour almost proportionately increases. This is shown from the sharp, steep upward sloping of the green line in Figure 5, which is laid out in an opposite
direction of the blue medium attribution of responsibility line (which results are in line with our expectations).

The contrast between the high and low attributions of responsibility is apparent. The green high attribution of responsibility line and the red low attribution of responsibility line both start from a similar point in the low degree of apology region of the graph. However, that is where the similarity ends, as the green line (Figure 5) escalates upwards, while the red line remains flat. This provides evidence that there are significant differences in interaction effects between attribution of responsibility and degree of apology.

This pattern of behaviour displayed in the high attribution of responsibility scenario runs contrary to our expectations, which similar to that of the earlier dependent variables, were that according to the main effects of degree of apology, the greater the degree of apology, the less negative WOM would occur.

4.2.2 Examining the Mediating Effects

A direct effects investigation was carried out to study whether the independent variables indeed had uninterrupted effects on the response variables. Two potential mediators, namely likeability and ethical concerns were hypothesised to possess moderating effects on the dependent variables. To address H1 and H2, ethical concerns and likeability were introduced into the experiment as covariates. Using two-way ANOVA, the interaction effects of attribution of responsibility and degree of apology on the two mediating variables were proven to be significant (Ethical Concerns: $F = 3.404$, Likeability: $F = 2.283$; $p < 0.1$), thus supporting our choice to test for these two variables as mediators in this experiment. Next, to study the effects of ethical concerns and likeability on the relationships between the two independent variables (attribution of responsibility and degree of apology) and three dependent variables (complaint,
Is Saying Sorry Good Enough? Examining the Typologies of Apology

withhold and negative WOM behaviours), analysis of covariance (ANCOVA) was used. The test aimed to detect any mediated outcomes on main effects, as well as the interaction effects between the attribution of responsibility and degree of apology on the three behaviour variables.

### Table 5: Summary of ANOVA Scores with Ethical Concerns and Likeability as Co-variates

<table>
<thead>
<tr>
<th></th>
<th>Complain</th>
<th></th>
<th>Withhold</th>
<th></th>
<th>Negative WOM</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>$F$</td>
<td>Sig.</td>
<td>$F$</td>
<td>Sig.</td>
<td>$F$</td>
</tr>
<tr>
<td><strong>With Ethical Concerns as Co-variate</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ethical Concerns</td>
<td></td>
<td>9.178</td>
<td>&lt;0.1*</td>
<td>49.365</td>
<td>&lt;0.1**</td>
<td>20.93</td>
</tr>
<tr>
<td>Attribution of Responsibility</td>
<td></td>
<td>4.496</td>
<td>&lt;0.1*</td>
<td>17.893</td>
<td>&lt;0.1**</td>
<td>0.335</td>
</tr>
<tr>
<td>Degree of Apology</td>
<td></td>
<td>1.803</td>
<td>&gt;0.1</td>
<td>3.424</td>
<td>&lt;0.1*</td>
<td>0.022</td>
</tr>
<tr>
<td>Responsibility x Apology</td>
<td></td>
<td>2.018</td>
<td>&lt;0.1*</td>
<td>2.284</td>
<td>&lt;0.1*</td>
<td>1.911</td>
</tr>
<tr>
<td><strong>With Likeability as Co-variate</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Likeability</td>
<td></td>
<td>2.330</td>
<td>&gt;0.1</td>
<td>90.834</td>
<td>&lt;0.1**</td>
<td>4.453</td>
</tr>
<tr>
<td>Attribution of Responsibility</td>
<td></td>
<td>5.959</td>
<td>&lt;0.1*</td>
<td>20.950</td>
<td>&lt;0.01**</td>
<td>1.041</td>
</tr>
<tr>
<td>Degree of Apology</td>
<td></td>
<td>2.792</td>
<td>&lt;0.1*</td>
<td>4.196</td>
<td>&lt;0.1*</td>
<td>0.542</td>
</tr>
<tr>
<td>Responsibility x Apology</td>
<td></td>
<td>1.950</td>
<td>&gt;0.1</td>
<td>2.414</td>
<td>&lt;0.1*</td>
<td>2.042</td>
</tr>
</tbody>
</table>

**Ethical Concerns.** By running ANOVA on the main effects of ethical concerns on the complaint, withhold and negative WOM behaviours, highly significant scores ($p < 0.1$) were obtained, indicating a strong relationship (Complain: $F = 9.178$, Withhold: $F = 49.365$, Negative WOM: $F = 20.930$).

With ethical concerns introduced as a covariate, there were two significant changes to the results obtained in Section 4.2.1. Firstly, the main effect of degree of apology on complaining behaviour in stakeholders turned insignificant ($F = 1.803$, $p > 0.1$). Secondly, the interaction effect of attribution of responsibility and degree of apology on stakeholders’ likelihood to spread negative WOM about the company also became insignificant ($F = 1.911$, $p > 0.1$). As the
remaining significant scores for the main and interaction effects of the independent variables did not turn insignificant, partial mediation of ethical concerns on the relationships between attribution of responsibility and degree of apology on the complaint and negative WOM variables was concluded. H1(b) was rejected while H1(a) and H1(c) were partially supported.

**Likeability.** Running ANOVA on the main effects of likeability on the consumer response variables returned two scores (Withhold: $F = 90.834$, Negative WOM: $F = 4.453$) that indicated significant effects ($p < 0.1$).

Applying the same test of covariance to the variable of likeability, mediation on the interaction effect of attribution of responsibility and degree of apology on complaining behaviour was found ($F = 1.950, p > 0.1$). However, this was not observed for any of the other main or interaction effects found in Section 4.2.1. Hence, we reject H2(b) and H2(c) while confirming H2(a) for partial mediation.
Chapter 5: Discussion

The study sets out to explore the effects of apology on stakeholders’ behaviour and perceptions, when the transgressing organisation is facing varying attributions of responsibility. The Attribution and Apology Grid, together with the Perception-Behavioural Framework of Crisis Response, adapted from IR Theory (Benoit, 1995), SCCT (Coombs, 2007), as well as other literature on consumers’ behavioural reactions post-crisis were developed. This framework provides organisations with a guide on how they can make use of varying degrees of apology to communicate with their stakeholders post-crisis to affect their behavioural responses (complain, withhold, and negative WOM). To gain a deeper understanding of how stakeholders attribute crisis responsibility to an organisation and the degree of apology can affect consumers’ behaviour, this study also investigates this interaction effect together with stakeholders’ perception of the organisation in terms of the organisation’s likeability factor and the ethical concerns consumers have of the organisation. The sections below discuss salient findings.

5.1 Higher Degree of Apology Corresponds to Lessened Negative Behaviour

When stakeholders attribute a medium level of crisis responsibility to an organisation, the results found that stakeholders were less likely to engage in complaining, withholding and negative WOM behaviour when the organisation was more apologetic. This demonstrates the effect of the apology utterance, as the apology appears to appease stakeholders and diminish the probability of negative response behaviour. Higher degrees of apology fulfil the manner and content criteria of a sincere apology proposed by Hearit and Borden (2006) as well as the discursive strategies for apology issuance proposed by Hargie et al., 2010. As such, negative behaviour among stakeholders can be mitigated with a higher degree of apology.
Furthermore, McDonald, Sparks and Glendon (2010) proposed crisis management messages to contain reputation-building accounts. Ginzel, Kramer and Sutton (1992) refer to these accounts as explanations that minimise severity of an event and stakeholder antagonism, lessening the damage to the organisation’s reputation and image. However, Mattila (2009) argued that stakeholders are quick to make inferences about the transgressing organisation in crisis, unless a statement that has causal explanation is issued. Combining a profound apology as suggested by Hearit and Borden (2006), as well as Hargie et al. (2010), together with an explanation of the crisis will help to aid the organisation in reputation building.

5.2 Low Attribution of Responsibility Corresponds to Consistently Low Negative Behaviour

In crisis situations where stakeholders attribute a low level of responsibility to the organisation, the results showed that all behavioural responses examined in this study displayed a low likelihood of negative behaviour engaged. Regardless of the apology issued by the organisation, stakeholders were less likely to engage in all three response behaviours, as compared to when a higher level of responsibility was attributed to the organisation.

This finding supports Weiner’s (1986) Attribution Theory that the amount of responsibility attributed to an organisation is directly proportional to the amount of threat to its reputation. Since the organisation was not largely responsible for the crisis, the threat on its image was minimal. With little damage to the organisation’s image and reputation, stakeholders would not be motivated to display negative behaviour against the organisation because their perception of the organisation has not been exacerbated. McDonald et al. (2010) found that stakeholders’ reactions are more influenced by the cause of the crisis than they are by the organisation’s account of the crisis. This supports the results for the low attribution of
responsibility conditions, where stakeholder responses were consistent across the board regardless of the apology.

**5.3 High Attribution of Responsibility Corresponds to Increased Complaint and Negative WOM, Consistent Withholding Behaviour**

During a crisis situation when stakeholders attribute a high level of responsibility to the organisation, the results from this study showed that stakeholders were more likely to engage in complaining behaviour and spread negative information when the level of apology increases. In contrast, it was found that stakeholders’ tendency to withhold from interacting with the organisation remained relatively consistent as the level of apology increased. Although the complaint and negative WOM responses followed the same general trend, there were subtle differences between the two, which could deepen the understanding of stakeholder responses in crisis communication using apology as an effective crisis strategy (Kim et al., 2009).

Results from this study showed that when the organisation is perceived to be largely responsible for the crisis, stakeholders likelihood to complain remains largely the same when a low or moderate level of apology is issued. However, a sharp increase of stakeholders engaging in complaining behaviour is seen in a situation where the organisation is perceived to be largely responsible for the crisis, and issues a high degree of apology. This suggests that there is a potential backfiring of apology issuance by an organisation to alleviate complaint intentions, especially when their stakeholders perceive them to be highly responsible for the crisis.

Skarlicki, Folger and Gee (2004) argued that an apology might be perceived by the receiver as insincere and an attempt to manipulate the receiver to become more accepting and understanding of an unfair outcome, and thus could result in the backfiring of the apology.
The results also showed that stakeholders were more likely to spread negative information when the organisation issues a high degree of apology when it is perceived to be largely at fault. McDonald et al. (2010) found that controllability of the crisis is one of the key factors predicting anger and negative attitude towards the transgressor. The high attribution of responsibility meant that the events were very much in control of the organisation, and this could have played an important role in motivating stakeholders to spread negative information regarding the organisation. With negative attitudes influencing negative WOM behaviour, it could potentially worsen an organisation’s reputation (McDonald et al., 2010).

This finding presents significant implications for practitioners. The results illustrate that when a high level of responsibility is attributed to the organisation, the apology issued has the potential to backfire and stimulate even more complaint and negative WOM behaviour among stakeholders. Therefore, when an organisation is deemed to be highly at fault for the crisis situation, the use of apology as a crisis communication response tool has to be used with caution.

Two critical characteristics of negative WOM behaviour were identified: longevity and its ability to spread (Coombs & Holladay, 2007). Furthermore, Liu, Austin and Jin (2011) found that people were more likely to accept the transgressing organisation’s supportive and accommodative crisis responses when they got wind of the information via WOM behaviour. This presents a huge implication for practitioners who not only need to know how to properly harness the power of positive WOM behaviour, but also the methods that can be used to nip negative WOM behaviour in the bud before the crisis escalates and gets out of hand.

A possible explanation for this phenomenon is that withholding behaviour is a passive and defensive reaction, where no action is required to exhibit this behaviour. Due to trust or safety concerns that stakeholders might have, stakeholders may choose to avoid interaction with
the organisation (Lwin et al., 2007a), thereby displaying withholding behaviour. On the other hand, complaining and negative WOM behaviour require some form of activity on the part of stakeholders in order to qualify for an exhibition of that behaviour.

A second explanation for the phenomenon is that stakeholders participate in boycotting behaviour, which is a form of withholding behaviour. John and Klein (2003) described a boycott as a behaviour where people avoid purchasing a product as a result of the same atrocious event, but not necessarily for similar reasons. Friedman’s (1985) definition of a consumer boycott explains one or more parties encouraging consumers to avoid purchasing a certain product in order to achieve certain objectives. At the same time, Klein, Smith and John (2004) found that the more heinous the organisation’s behaviour, the more likely stakeholders are to display boycotting behaviour. The high attribution of responsibility scenarios conveys that the organisation was almost entirely responsible for the crisis’ occurrence. Thus, the organisation’s actions can be reasonably construed to be egregious, and possibly eliciting boycott behaviour on the part of stakeholders.

5.4 Presence of a Tipping Point between Medium and High Attributions of Responsibility

The discrepancy between the findings in the medium and high attributions of responsibility scenarios suggests a tipping point in behavioural responses exists, that lies between the two scenario types of low and high attribution of responsibility. The behavioural pattern that emerged from the results of medium attribution of responsibility scenarios was that the higher the degree of apology, the less negative behaviour engaged by stakeholders. At the same time, the behavioural pattern for high attribution of responsibility scenarios was found to be the opposite: the higher the degree of apology, the more negative behaviour engaged by stakeholders.
Gladwell (2000) defined the term ‘tipping point’ as a threshold, that when crossed, results in a change in the attitude amongst masses. Inferring from the findings of this study, the organisation’s role in the crisis becomes the defining factor that determines whether the stakeholder partakes in negative behaviour or not – the tipping point. The stakeholders’ pattern of behaviour suddenly changed from being more appeased by the higher levels of apology, to becoming aggravated by the apology, thus resulting in the increased likelihood of displaying negative behaviour.

Although our study suggests that a tipping point exists, it is beyond our scope of research, and could be an interesting area for future research. This presents an implication for researchers, as it highlights a gap in literature concerning the presence of a tipping point in stakeholder behaviour, with the use of apology in crisis management communication. Practitioners who wish to benefit from the use of the apology tool would need to correctly identify this tipping point in the crises they are managing, in order to achieve the desired stakeholders’ behaviour.

**5.5 Review of the Perception-Behavioural Framework of Crisis Response**

With the development of the Perception-Behavioural Framework of Crisis Response (Figure 2), we posited that ethical concerns that stakeholders have of the organisation and the likeability of the organisation affects consumers’ behavioural responses (complaint, withhold, negative WOM behaviour). Through this study, the conceptual has been tested for the first time. This section documents how the Perception-Behavioural Framework of Crisis Response holds up, the implications of this study’s findings for the conceptual framework as well as how the conceptual framework can be improved. The findings show that the conceptual framework holds promise. However, some links that are proposed by the conceptual framework did not show significance in the findings.
First, the significant finding for partial mediation by ethical concerns on the relationships tested in this study suggests that ethical concerns stakeholders have of the organisation explain for some of the effects on stakeholder behaviour by the organisation’s level of blame and the nature of the post-crisis communication issued. In fact, Carrigan and Attalla (2001) asserted that unethical behaviour by an organisation is likely to prompt backlash and punishment while ethical behaviour may not be guaranteed of rewards. Evidently, stakeholders respond adversely when they interpret an offending organisation’s post-crisis conduct as unethical and this can interfere with the way organisations seek to gauge stakeholders’ reactions just based on the blame they hold for the crisis and the quality of their apology statement.

Going further, it was found that while likeability is a partial mediating variable to some extent, the likeability of an organisation presented a weaker hold on the relationships of attribution of responsibility and degree of apology on consumer behaviour. From our findings, ethical concerns hold greater sway over consumers’ behavioural decisions than likeability by virtue of having a stronger mediating effect. This could be explained by the fact that knowing of an organisation’s unethical conduct incites in consumers the feelings of being taken advantage of, disappointment and anger (Krapfel, 1985) which is more experiential in comparison to the weaker attitudinal element in likeability. Furthermore, Chaiken (1980) found that likeability does impact the impression but not the overall persuasion of the message that may incline stakeholder towards acting in response. In this way, the findings did not fully support what the Perception-Behavioural Framework of Crisis Response proposed. As such, the conceptual framework has been modified to reflect this study’s findings (Figure 6). The revised framework shows that the combined effect of attribution of responsibility and degree of apology on the complaint and negative WOM responses are partially mediated by ethical concerns. Also, likeability acts as a
partial mediator in the relationship between complain intention, and the combination of attribution of responsibility and degree of apology.

**Figure 6: Revised Perception-Behavioural Framework of Crisis Response**

In summary, the Perception-Behavioural Framework of Crisis Response shows rigour.
Chapter 6: Conclusion

This study aimed to investigate the interaction effects of level of attribution of responsibility and degree of apology and how it affects stakeholders’ behavioural responses, particularly focusing on complaint, withhold and negative WOM behaviours. We developed the Attribution and Apology Grid and the Perception-Behavioural Framework of Crisis Response to examine this relationship, and to ascertain whether there are mediation effects between the organisation’s post-crisis response and stakeholders’ behaviours.

In summary, the data from our experiment yielded several key findings. First, a higher degree of apology does not necessarily result in a reduced engagement of negative behaviour. Second, the attribution of responsibility on degree of apology can influence complaint, withhold and negative WOM behaviour as proposed in our study. Third, the Perception-Behavioural Framework of Crisis Response provides an idea of how ethical concerns mediates negative behavioural intentions after receiving the apology.

Researchers replicating the study in future could look into investigating stakeholders’ reactions in real life crises to test the rigour of the framework proposed in this research. In addition, another interesting area of future research is to undertake a longitudinal study to observe how stakeholders’ perception of an organisation changes with time post-crisis.

There are several limitations that need to be acknowledged. First, the use of a narrow demographic of university students could raise concerns about the external validity of experimental results (Kam, Wilking, & Zechmeister, 2007). Nevertheless, the authors believe that the experimental rigour and internal validity (Onwuegbuzie, 2000), together with the use of statistical methods, contribute considerable credibility to the study’s findings and its implications.
Furthermore, prior relationship with the organisation (Schwarz, 2008), also known as a crisis threat intensifier, could have played a significant part in influencing stakeholders’ perception of an organisation. However, this is beyond the scope of our study and is an area worth looking into in future research.

This study has shed light on how there is no “one-size-fits-all” apology. Beyond that, the key findings in this research hold several implications for both researchers and practitioners. A high level of apology does not necessarily translate to a more desirable stakeholders’ response. In addition, response variables also suggest a potential backfiring of high levels of apology when there is high attribution of responsibility.

We hope that our findings and development of our revised Perception-Behavioural Framework of Crisis Response provide theoretical insights that help to better understand the effects of usage of apology in crisis communication contexts and that it encourages future research on health crisis communication which is sorely needed.
Is Saying Sorry Good Enough? Examining the Typologies of Apology

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## Appendix A

### Measure Scales

<table>
<thead>
<tr>
<th>Construct</th>
<th>Item Code/Scale Item</th>
<th>Response Scale</th>
<th>Cronbach’s Alpha</th>
</tr>
</thead>
<tbody>
<tr>
<td>Complain</td>
<td>C1) Report to the media regarding Tevana Pharmaceutical</td>
<td>1= Very Unlikely,</td>
<td>0.873</td>
</tr>
<tr>
<td></td>
<td>C2) Complain to the relevant authorities regarding Tevana Pharmaceutical</td>
<td>7= Very Likely</td>
<td></td>
</tr>
<tr>
<td></td>
<td>C3) Take legal action against Tevana Pharmaceutical</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Adapted from (Singh, 1988)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Withhold</td>
<td>W1) Decide not to consume Tevana Pharmaceutical’s products in future</td>
<td>1= Very Unlikely,</td>
<td>0.920</td>
</tr>
<tr>
<td></td>
<td>W2) Boycott Tevana Pharmaceutical’s products</td>
<td>7= Very Likely</td>
<td></td>
</tr>
<tr>
<td></td>
<td>W3) Be reluctant to purchase products from Tevana Pharmaceutical</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>W4) Avoid Tevana Pharmaceutical</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>W5) Convince your friends and relatives not to consume Tevana Pharmaceutical’s products</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>(Lwin, Wirtz, &amp; Williams, 2007)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Negative WOM</td>
<td>WOM1) Use online social media tools to share what you know about this incident</td>
<td>1= Very Unlikely,</td>
<td>0.937</td>
</tr>
<tr>
<td></td>
<td>WOM2) Use Twitter to share what you know about this incident</td>
<td>7= Very Likely</td>
<td></td>
</tr>
<tr>
<td></td>
<td>WOM3) Use Facebook to share what you know about this incident</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Adapted from (Singh, 1988)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ethical Concerns</td>
<td>E1) I am concerned about Tevana Pharmaceutical being morally upright</td>
<td>1= Not At All Concerned,</td>
<td>0.915</td>
</tr>
<tr>
<td></td>
<td>E2) I am concerned about Tevana Pharmaceutical’s ethical standpoint</td>
<td>7= Extremely Concerned</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Adapted from (Lwin, Wirtz, &amp; Williams, 2007)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Likeability</td>
<td>L1) Unlikeable – Likeable</td>
<td>1= Unlikeable,</td>
<td>0.898</td>
</tr>
<tr>
<td></td>
<td>L2) Unfriendly – Friendly</td>
<td>7= Likeable</td>
<td></td>
</tr>
<tr>
<td></td>
<td>L3) Unkind – Kind</td>
<td>1= Unfriendly,</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>7= Friendly</td>
<td></td>
</tr>
<tr>
<td></td>
<td>L4) Unhelpful – Helpful</td>
<td>1= Unkind,</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>7= Kind</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(Moon, 2000)</td>
<td></td>
<td></td>
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</tbody>
</table>
Appendix B

Video Screenshots of Experimental Stimuli (Example)

Figure 7: Male Spokesperson for Tevana Pharmaceutical

It was an isolated case of a lapse in our world-class production process that has won multiple awards

Figure 8: Screenshot of Local News Clip for Experiment

Good afternoon and thank you for joining us on Cable News.
## Appendix C

### Crisis Scenarios

<table>
<thead>
<tr>
<th>Attribution of Responsibility</th>
<th>Scenarios</th>
</tr>
</thead>
<tbody>
<tr>
<td>Low</td>
<td>Several heart disease patients who have been taking Tevana Pharmaceutical’s popular drug, Nitrax, have reported suffering from prolonged conjunctivitis. After a round of intense drug testing by the Health Sciences Authority, the drug was found to be tainted with a classified chemical compound. It was discovered that the manufacturing of the drug was contracted to an overseas manufacturer who mishandled the product, leading to chemical contamination. The manufacturing plant had failed to inform Tevana Pharmaceutical about the chemical contamination that occurred. When Tevana Pharmaceutical after receiving patients’ complaints, it immediately suspended the plant from further manufacturing Nitrax, voluntarily pulled Nitrax off the market, and is working closely with the relevant authorities to investigate the incident. A drug recall was immediately initiated by Tevana Pharmaceutical and consumers were advised to stop taking Nitrax.</td>
</tr>
<tr>
<td>Medium</td>
<td>Several heart disease patients who have been taking Tevana Pharmaceutical’s popular drug, Nitrax, have reported suffering from prolonged conjunctivitis. After a round of intense drug testing by the Health Sciences Authority, the drug was found to be tainted with a classified chemical compound. It was discovered that the manufacturing of the drug was contracted to an overseas manufacturer who mishandled the product, leading to chemical contamination. The manufacturing plant had failed to inform Tevana Pharmaceutical about the chemical contamination that occurred. Tevana knew about the contamination and waited for a few days before it acted. It has has promised to work with the relevant authorities to investigate the situation.</td>
</tr>
<tr>
<td>High</td>
<td>Several heart disease patients who have been taking Tevana Pharmaceutical’s popular drug, Nitrax, have reported suffering from prolonged conjunctivitis. After a round of intense drug testing by the Health Sciences Authority, the drug was found to be tainted with a classified chemical compound. It was discovered that the management of Tevana Pharmaceutical was aware that patients will suffer health complications upon the consumption of Nitrax. Despite that, Tevana Pharmaceutical went ahead with the product launch, outsourcing the production of the drug to an overseas manufacturer with previous record of unhygienic production practice. Tevana knew about the complaints 2 months ago but failed to act. When the complaints reached the health authorities, they ordered an immediate investigation on Tevana Pharmaceutical and recommended that patients refrain from taking it immediately.</td>
</tr>
</tbody>
</table>
## Appendix D

### Apology Exemplars

<table>
<thead>
<tr>
<th>Degree of Apology</th>
<th>Exemplars</th>
</tr>
</thead>
</table>
| **Level 1 - Pseudo Apology** | "I apologise if that will make you happy. I still don't know quite what I've done. I've tried to tell you what I did do but if you want me to apologise, if that will make you happy, then OK, I'm sorry."

Apologiser: John Lennon  
Date: August 11, 1966  
Crisis description: Lennon referred to The Beatles as more popular than Jesus Christ (Wallop, 2009)  

*Adapted apology:*  
“It was an isolated case of a lapse in our world-class production process that has won multiple awards for innovation and efficiency. We were earnest to put Nitrax in the market and never meant to hurt anybody. If apologising for that will make you happy, then OK, I’m sorry.” |
| **Level 2** | “I sincerely regret that my words were misinterpreted to wrongly imply anything negative about those in uniform, and I personally apologize to any service member, family member, or American who was offended. It is clear the Republican Party would rather talk about anything but their failed security policy. I don't want my verbal slip to be a diversion from the real issues. I will continue to fight for a change of course to provide real security for our country, and a winning strategy for our troops.”

Apologiser: Senator John Kerry  
Date: November 2, 2006  
Crisis description: Kerry said that Americans who did not study hard enough would end up serving the military in Iraq (Kerry, 2006)  

*Adapted apology:*  
“I shall regret the unintentional hurt that was caused to anyone. We did not mean any harm but unfortunately, the error of judgment hurt some. I shall apologise to you. I don’t want this setback to be a diversion from the main issue of improving the health of patients suffering from heart disease. If our enthusiasm in putting Nitrax out caused any hurt, please accept our apologies. At present, Tevana Pharmaceutical is looking at solutions to better this situation.” |
<table>
<thead>
<tr>
<th>Level</th>
<th>Apology</th>
</tr>
</thead>
</table>
| **Level 3** | "To my fellow Americans and to everyone else who has seen this email I forwarded and was offended by my action, I humbly apologize and ask for your forgiveness of my unwise behavior. I say unwise because at the time I received and forwarded the email, I didn't stop to think about the historic implications and other examples of how this could be offensive."  

Apologiser: Republican politician Marilyn Davenport  
Date: April 15, 2011 (email was published by the media)  
Crisis description: Davenport sent a racist photo of President Barack Obama to a small group of Republican committee members via email (Sheridan, 2011)  

*Adapted apology:*  
“"To anyone who has been hurt by Nitrax, I humbly apologise. We regret that some of our customers’ health has suffered from the consumption of the drug. Tevana Pharmaceutical takes the health and safety of our customers very seriously and we are working hand in hand with the relevant authorities to ensure that such an incident will not happen again.” |

| Level 4 | "We appreciate the gravity of this situation and, like any responsible company would, are putting all necessary resources toward understanding the facts surrounding it as quickly as possible."... "As soon as we realized that an element of the campaign was being mistaken for something potentially dangerous, appropriate law enforcement officials were notified and through Federal law enforcement channels, we identified the specific locations of the advertisements in all 10 cities in which they are posted."... "We also directed the third-party marketing firm who posted the advertisements to take them down immediately."... "We appreciate the commitment demonstrated by the Boston police department and other law enforcement agencies, as well as the Massachusetts Governor's Office, and deeply regret the hardships experienced as a result of this incident."  

Apologiser: Phil Kent, Chairman and CEO of Turner Broadcasting System  
Date: January 31, 2007  
Crisis description: A series of advertisements for a television show, which were placed at several Boston locations, sparked a city-wide bomb scare (Powell, 2007) |

(Level 4 continued next page)
**Appendix D**

| Adapted apology: |
|-----------------|---|
| “We appreciate the commitment demonstrated by the health authority and doctors, and are aware of the hardships experienced as a result of this incident. You expect and deserve better from us. We sincerely apologise to everyone who has been hurt. We appreciate the gravity of this situation. Like any responsible company, we are putting all the necessary resources towards understanding the facts surrounding it as soon as possible. We are closely monitoring the situation and will work to ensure that such incidents will not happen again.” |

| Level 5 – Profound Apology |
|---------------------------|---|
| “Words cannot express how truly sorry we are for the anxiety, frustration and inconvenience that you, your family, friends and colleagues experienced. This is especially saddening because JetBlue was founded on the promise of bringing humanity back to air travel, and making the experience of flying happier and easier for everyone who chooses to fly with us. We know we failed to deliver on this promise last week.”... “Most importantly, we have published the JetBlue Airways Customer Bill of Rights – our official commitment to you of how we will handle operational interruptions going forward – including details of compensation.” |

Apologiser: David Neeleman, JetBlue Airways’ founder and Chief Executive Officer  
Date: April 20, 2007  
Crisis description: Several JetBlue flights were stranded due to bad weather, with flights only resuming according to schedule several days later  
(Neeleman, 2007)  

Adapted apology:  
“We are aware and concerned about the health issue pertaining to Nitrax and would like to take this time to address the matter. We acknowledge our shortcomings regarding this incident and understand that the public has high expectations of Tevana Pharmaceutical; expectations we failed to meet. Tevana deeply regrets the physical, mental and emotional anguish that has resulted from this situation and those who have suffered as a result of this situation are rightfully distressed and angry.

*(Level 5 continued next page)*
Appendix D

We take full responsibility for the hurt and injury that have been caused by the consumption of Nitrax. You expect and deserve better safety and assurance from us. Our customers’ health and safety are always our top priority. We are deeply sorry for the situation, and sincerely apologise to all who are affected by this incident.

We are truly sorry for the unfortunate situation that our customers have been put in and offer our sincere apologies to all parties affected. Going forward, we plan to dedicate all our resources to understand the facts quickly. We will fully participate with the health authorities in cooperating with their investigation into the events of recent weeks. As such, Tevana Pharmaceutical will offer compensation to all victims.

We ask for your forgiveness in this matter and would like to assure the public that Tevana is launching a thorough review of production protocol under the supervision of external experts and will overhaul the production process to ensure such incidents never happen again.

Concerned members of the public may access all the important information they need or address their concerns through a 24-hour hotline manned by Tevana Pharmaceutical employees, which will be set up immediately.”
Appendix E

**Newscaster Script – Scenario and Attribution of Responsibility**

<table>
<thead>
<tr>
<th>Level of Attribution</th>
<th>Newscaster Script</th>
</tr>
</thead>
</table>
| **Low Attribution of Responsibility** | Good afternoon, and thank you for joining us on Cable News.  

In headline news today, local company Tevana Pharmaceutical’s newly launched drug, Nitrax, has resulted in several consumers experiencing prolonged conjunctivitis upon consuming the drug. Released into the local market last October, Nitrax is a drug designed to treat heart disease. Upon investigation by the Health Sciences Authority, it was found that the drug was tainted with a classified chemical compound.  

At present, 25 cases of Nitrax consumers suffering from prolonged conjunctivitis have surfaced. It has been found that the overseas manufacturer that produces Nitrax mishandled the drug, leading to chemical contamination. Despite this contamination, the overseas manufacturer failed to inform Tevana Pharmaceutical about it. After receiving complaints from their consumers, Tevana Pharmaceutical immediately suspended the overseas plant from manufacturing Nitrax, and voluntarily initiated a drug recall, pulling Nitrax off the market. Currently, Tevana Pharmaceutical is working closely with the relevant authorities to investigate the situation. Tevana Pharmaceutical advises consumers of Nitrax to stop taking the drug immediately.  

A spokesperson from Tevana Pharmaceutical released a statement regarding the incident earlier this morning.  

[SPOKESPERSON TO DELIVER APOLOGY STATEMENT]  

Based on sales figures released by the company, there are an estimated 3,000 consumers of Nitrax locally. Tevana Pharmaceutical advises consumers of Nitrax to seek immediate medical attention should they suffer any eye discomfort. |
Good afternoon, and thank you for joining us on Cable News.

In headline news today, local company Tevana Pharmaceutical’s newly launched drug, Nitrax, has resulted in several consumers experiencing prolonged conjunctivitis upon consuming the drug. Released into the local market last October, Nitrax is a drug designed to treat heart disease. Upon investigation by the Health Sciences Authority, it was found that the drug was tainted with a classified chemical compound.

At present, 25 cases of Nitrax consumers suffering from prolonged conjunctivitis have surfaced. It has been found that the overseas manufacturer that produces Nitrax mishandled the drug, leading to chemical contamination. Despite this contamination, the overseas manufacturer failed to inform Tevana Pharmaceutical about it. Tevana Pharmaceutical knew about the chemical contamination but waited a few days before acting upon their consumers’ complaints. Tevana Pharmaceutical has promised to work with the relevant authorities to investigate the situation.

A spokesperson from Tevana Pharmaceutical released a statement regarding the incident earlier this morning.

[SPOKESPERSON TO DELIVER APOLOGY STATEMENT]

Based on sales figures released by the company, there are an estimated 3,000 consumers of Nitrax locally. The Ministry of Health advises consumers of Nitrax to seek immediate medical attention should they suffer any eye discomfort.
Good afternoon, and thank you for joining us on Cable News.

In headline news today, local company Tevana Pharmaceutical’s newly launched drug, Nitrax, has resulted in several consumers experiencing prolonged conjunctivitis upon consuming the drug. Released into the local market last October, Nitrax is a drug designed to treat heart disease. Upon investigation by the Health Sciences Authority, it was found that the drug was tainted with a classified chemical compound.

At present, 25 cases of Nitrax consumers suffering from prolonged conjunctivitis have surfaced. Preliminary investigations found that the management of Tevana Pharmaceutical had been aware that patients will suffer health complications after consuming Nitrax. Despite that, Tevana Pharmaceutical went ahead with the drug launch, outsourcing the production of Nitrax to an overseas manufacturer with a history of unhygienic production practices. Complaints from consumers of Nitrax first surfaced two months ago. However, Tevana Pharmaceutical failed to take any action. The health authorities have since ordered an immediate investigation on Tevana Pharmaceutical and recommends patients to refrain from consuming Nitrax immediately.

A spokesperson from Tevana Pharmaceutical released a statement regarding the incident earlier this morning.

[SPOKESPERSON TO DELIVER APOLOGY STATEMENT]

Based on sales figures released by the company, there are an estimated 3,000 consumers of Nitrax locally. The Ministry of Health advises consumers of Nitrax to seek immediate medical attention should they suffer any eye discomfort.
### Appendix F

**Spokesperson Script – Degree of Apology**

<table>
<thead>
<tr>
<th>Level of Apology</th>
<th>Spokesperson Script</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Level 1 Apology – Pseudo Apology</strong></td>
<td>It was an isolated case of a lapse in our world-class production process that has won multiple awards for innovation and efficiency. We were earnest to put Nitrax in the market and never meant to hurt anybody. If apologising for that will make you happy, then OK, I’m sorry.</td>
</tr>
</tbody>
</table>
| **Level 2 Apology**           | I shall regret the unintentional hurt that was caused to anyone. We did not mean any harm but unfortunately the error of judgment hurt some. I shall apologise to you. I don’t want this setback to be a diversion from the main issue of improving the health of patients suffering from heart disease.  
If our enthusiasm in putting Nitrax out caused any hurt, please accept our apologies. At present, Tevana Pharmaceutical is looking at solutions to better this situation. |
| **Level 3 Apology**           | To anyone who has been hurt by Nitrax, I humbly apologise. We regret that some of our customers’ health has suffered from the consumption of the drug. Tevana Pharmaceutical takes the health and safety of our customers very seriously and we are working hand in hand with the relevant authorities to ensure that such an incident will not happen again. |
| **Level 4 Apology**           | We appreciate the commitment demonstrated by the health authority and doctors, and are aware of the hardships experienced as a result of this incident. You expect and deserve better from us. We sincerely apologise to everyone who has been hurt. We appreciate the gravity of this situation. Like any responsible company, we are putting all the necessary resources towards understanding the facts surrounding it as soon as possible. We are closely monitoring the situation and will work to ensure that such incidents will not happen again. |
We are aware and concerned about the health issue pertaining to Nitrax and would like to take this time to address the matter. We acknowledge our shortcomings regarding this incident and understand that the public has high expectations of Tevana Pharmaceutical; expectations we failed to meet.

Tevana deeply regrets the physical, mental and emotional anguish that has resulted from this situation and those who have suffered as a result of this situation are rightfully distressed and angry.

We take full responsibility for the hurt and injury that have been caused by the consumption of Nitrax. You expect and deserve better safety and assurance from us. Our customers’ health and safety are always our top priority. We are deeply sorry for the situation, and sincerely apologise to all who are affected by this incident.

We are truly sorry for the unfortunate situation that our customers have been put in and offer our sincere apologies to all parties affected. Going forward, we plan to dedicate all our resources to understand the facts quickly. We will fully participate with the health authorities in cooperating with their investigation into the events of recent weeks. As such, Tevana Pharmaceutical will offer compensation to all victims.

We ask for your forgiveness in this matter and would like to assure the public that Tevana is launching a thorough review of production protocol under the supervision of external experts and will overhaul the production process to ensure such incidents never happen again.

Concerned members of the public may access all the important information they need or address their concerns through a 24-hour hotline manned by Tevana Pharmaceutical employees, which will be set up immediately.
Appendix G

QUESTIONNAIRE

Instructions
Based on the video that you have just watched, please answer the following questions as honestly as you can. The questionnaire is designed to gather your thoughts and feelings about the crisis situation based on the scenario that you have just encountered.

The information you provide will be used for the purpose of academic research only and will be kept confidential within limits.

Please answer all questions.

Section A

1. Please circle the number that best represents the degree to which you think Tevana Pharmaceutical was telling the truth, on a scale of 1-7, with 1 being Strongly Disagree and 7 being Strongly Agree.

<table>
<thead>
<tr>
<th>Strongly Disagree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>1. They communicated honestly with me.</td>
<td>1</td>
</tr>
<tr>
<td>2. They told me something that was true.</td>
<td>1</td>
</tr>
<tr>
<td>3. I believe what they told me.</td>
<td>1</td>
</tr>
<tr>
<td>4. They appeared to be telling the truth.</td>
<td>1</td>
</tr>
</tbody>
</table>

2. Please circle the number that best represents how you feel about the way Tevana Pharmaceutical handled the problem, on a scale of 1-7, with 1 being Strongly Disagree and 7 being Strongly Agree.

<table>
<thead>
<tr>
<th>Strongly Disagree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>1. They seemed very concerned about the problem.</td>
<td>1</td>
</tr>
<tr>
<td>2. They appeared sympathetic.</td>
<td>1</td>
</tr>
<tr>
<td>3. They appeared caring.</td>
<td>1</td>
</tr>
<tr>
<td>4. They seemed very understanding about the problem the victims experienced.</td>
<td>1</td>
</tr>
<tr>
<td>5. They explained the cause of the problem.</td>
<td>1</td>
</tr>
<tr>
<td>6. I was given a reasonable explanation as to why the problem occurred.</td>
<td>1</td>
</tr>
<tr>
<td>7. They told me how the problem had occurred in the first place.</td>
<td>1</td>
</tr>
</tbody>
</table>
3. With respect to your own feelings about Tevana Pharmaceutical, please indicate the degree of your agreement or disagreement with each statement by circling one of the five alternatives below for each statement.

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly Disagree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I really care about the fate of this organization.</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>2. I feel emotionally attached to this organization.</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>3. I really feel this organization’s problems are my own.</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>4. I have confidence in this organization’s capabilities.</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>5. This organization is an effective problem solver.</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>6. I can depend on this organization to solve the problem.</td>
<td>1</td>
<td>6</td>
</tr>
</tbody>
</table>

4. Based on the video you have just watched, please indicate how likely YOU would:

<table>
<thead>
<tr>
<th>Action</th>
<th>Very Unlikely</th>
<th>Very Likely</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Decide not to consume Tevana Pharmaceutical’s products in future</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>2. Boycott Tevana Pharmaceutical’s products</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>3. Be reluctant to purchase products from Tevana Pharmaceutical</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>4. Avoid Tevana Pharmaceutical</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>5. Convince your friends and relatives not to consume Tevana Pharmaceutical’s products</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>6. Use online social media tools to share what you know about this incident</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>7. Use Twitter to share what you know about this incident</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>8. Use Facebook to share what you know about this incident</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>9. Complain to a consumer agency to ensure Tevana Pharmaceutical takes care of the problem</td>
<td>1</td>
<td>6</td>
</tr>
<tr>
<td>10. Report to the media regarding Tevana Pharmaceutical</td>
<td>1</td>
<td>6</td>
</tr>
</tbody>
</table>
### Is Saying Sorry Good Enough? Examining the Typologies of Apology

5. Based on the video you have just watched, please indicate how likely you feel that Tevana Pharmaceutical would:

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th>Very Likely</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Take appropriate actions to manage the crisis</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>2. Provide compensation to affected victims</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>3. Tackle the root of the problem</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>4. Provide good customer service in future</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>5. Take safety precautions in the future for everyone’s benefit</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
</tbody>
</table>

6. After watching the video, I feel that the delivery of apology made by Tevana Pharmaceutical’s spokesperson was:

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th>Sincere</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Insincere</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>2. Dishonest</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>3. Manipulative</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>4. Not credible</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>5. Biased</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>6. Unreliable</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>7. Untruthful</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>8. Not dependable</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>9. Untrustworthy</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>10. Not believable</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>11. Untimely</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
<tr>
<td>12. Inadequate</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
</tr>
</tbody>
</table>
7. Please rate how you feel about Tevana Pharmaceutical according to the scale below.

<table>
<thead>
<tr>
<th>Scale</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Inexpert</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Expert</td>
</tr>
<tr>
<td>Inexperienced</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Experienced</td>
</tr>
<tr>
<td>Unknowledgeable</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
<td>Knowledgeable</td>
</tr>
<tr>
<td>Incompetent</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Competent</td>
</tr>
<tr>
<td>Unintelligent</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
<td>Intelligent</td>
</tr>
<tr>
<td>Unlikeable</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Likeable</td>
</tr>
<tr>
<td>Unfriendly</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Friendly</td>
</tr>
<tr>
<td>Unkind</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Kind</td>
</tr>
<tr>
<td>Unhelpful</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Helpful</td>
</tr>
</tbody>
</table>

8. Please evaluate how you feel about the Tevana Pharmaceutical’s behaviour in dealing with the problem.

<table>
<thead>
<tr>
<th>Scale</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Unjust</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Just</td>
</tr>
<tr>
<td>Unacceptable</td>
<td>1</td>
<td>2</td>
<td>3</td>
<td>4</td>
<td>5</td>
<td>6</td>
<td>7</td>
<td>Acceptable</td>
</tr>
<tr>
<td>Unfair</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Fair</td>
</tr>
<tr>
<td>Immoral</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Moral</td>
</tr>
<tr>
<td>Unethical</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Ethical</td>
</tr>
</tbody>
</table>
9. Please circle the number that best represents the degree to which you accept Tevana Pharmaceutical’s apology.

<table>
<thead>
<tr>
<th>Question</th>
<th>Not At All</th>
<th>Very Much</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. How satisfied are you with the apology?</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>2. How likely are you to actually accept the apology?</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>3. How contented would you be after receiving this apology?</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>4. The organization is responsible for the crisis.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>5. The organization has committed a serious offence.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>6. How much do you blame the organization for the problem caused?</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>7. How responsible was the organization for the problem caused?</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>8. The organization is at fault for the problem caused.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
</tbody>
</table>

10. Please circle the number that best reflects how concerned you are with regards to Tevana Pharmaceutical according to the scale below.

<table>
<thead>
<tr>
<th>Question</th>
<th>Not At All Concerned</th>
<th>Extremely Concerned</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I am concerned that my safety might be compromised if I consume a product manufactured by Tevana Pharmaceutical.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>2. I am concerned about falling ill if I use a product manufactured by Tevana Pharmaceutical.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>3. I am concerned that my health will suffer if I take Tevana Pharmaceutical’s products.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
<tr>
<td>4. I am concerned about Tevana Pharmaceutical being morally upright.</td>
<td>1 2 3 4 5 6 7</td>
<td></td>
</tr>
</tbody>
</table>
5. I am concerned about Tevana Pharmaceutical’s ethical standpoint.  

6. I am concerned about Tevana Pharmaceutical doing what is right.  

11. Please circle the number that best represents how you feel about the situation after Tevana Pharmaceutical delivered its apology.  

<table>
<thead>
<tr>
<th>Feeling</th>
<th>Not At All</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
<th>6</th>
<th>7</th>
<th>Very Much</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Concerned</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Delighted</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Sympathetic</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Alarmed</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Frightened</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. Worried</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. Sad</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Angry</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

12. Please answer the following questions. Select the answers that best describe YOU.  

<table>
<thead>
<tr>
<th>Statement</th>
<th>Strongly Disagree</th>
<th>Strongly Agree</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. I generally trust other people.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>2. I tend to count on other people.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>3. I generally have faith in humanity.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>4. I feel that people are generally reliable.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>5. I generally trust other people unless they give me reason not to.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>6. I take great responsibility for my actions.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>7. I forgive people easily.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>8. I am easily affected by disaster news.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
<tr>
<td>9. I am a highly emotional person.</td>
<td>1  2  3  4  5  6  7</td>
<td>1  2  3  4  5  6  7</td>
</tr>
</tbody>
</table>
Section B

Please answer the following questions.

1. For a usual school day (Monday to Friday), how many hours per day do you spend:

<p>| | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>A.</td>
<td>watching television</td>
<td>_____ hours</td>
</tr>
<tr>
<td>B.</td>
<td>playing computer or video games</td>
<td>_____ hours</td>
</tr>
<tr>
<td>C.</td>
<td>chatting online (e.g. Messenger) or social networking online (e.g. Facebook)</td>
<td>_____ hours</td>
</tr>
<tr>
<td>D.</td>
<td>watching online newsclips, movies or other online contents (e.g. Youtube)</td>
<td>_____ hours</td>
</tr>
<tr>
<td>E.</td>
<td>reading magazines</td>
<td>_____ hours</td>
</tr>
<tr>
<td>F.</td>
<td>reading books/newspapers</td>
<td>_____ hours</td>
</tr>
</tbody>
</table>

2. For a usual weekend day (Saturday and Sunday), how many hours per day do you spend:

<p>| | | |</p>
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>A.</td>
<td>watching television</td>
<td>_____ hours</td>
</tr>
<tr>
<td>B.</td>
<td>playing computer or video games</td>
<td>_____ hours</td>
</tr>
<tr>
<td>C.</td>
<td>chatting online (e.g. Messenger) or social networking online (e.g. Facebook)</td>
<td>_____ hours</td>
</tr>
<tr>
<td>D.</td>
<td>watching online newsclips, movies or other online contents (e.g. Youtube)</td>
<td>_____ hours</td>
</tr>
<tr>
<td>E.</td>
<td>reading magazines</td>
<td>_____ hours</td>
</tr>
<tr>
<td>F.</td>
<td>reading books/newspapers</td>
<td>_____ hours</td>
</tr>
</tbody>
</table>
Section C

Lastly, please answer the following questions about yourself.

1. Gender
   a. Male
   b. Female

2. Age: ____________

3. School: __________________________________________

4. Year of study
   a. Undergraduate: ______
   b. Graduate: ______

5. Race
   a. Chinese
   b. Malay
   c. Indian
   d. Eurasian
   e. Others (please specify): ______________________

6. Nationality
   a. Singaporean
   b. Permanent Resident
   c. Others (please specify): ______________________

7. Type of Residence
   a. 2 Room HDB flat
   b. 3 Room HDB flat
   c. 4 Room HDB flat
   d. 5 Room HDB flat
   e. Apartment/Condominium
   f. Landed property
## Appendix H

### Experimental Video Stimuli

<table>
<thead>
<tr>
<th>Attribution of Responsibility</th>
<th>Degree of Apology</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Low</td>
<td>Group 1</td>
<td>Group 4</td>
<td>Group 7</td>
<td>Group 10</td>
<td>Group 13</td>
</tr>
<tr>
<td></td>
<td>Medium</td>
<td>Group 2</td>
<td>Group 5</td>
<td>Group 8</td>
<td>Group 11</td>
<td>Group 14</td>
</tr>
<tr>
<td></td>
<td>High</td>
<td>Group 3</td>
<td>Group 6</td>
<td>Group 9</td>
<td>Group 12</td>
<td>Group 15</td>
</tr>
</tbody>
</table>