The effect of the valence of forgiveness to service recovery strategies and service outcomes in food delivery apps

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ABSTRACT

The literature offers valuable insights into various aspects of service recovery and service outcomes. However, the available findings are limited relative to the size of the ever-expanding service economy. In particular, past studies have left more granular nuances of the association between service recovery strategies and service outcomes, such as the mediating role of forgiveness or the valence of forgiveness, under-explored. Recognising that an improved understanding of recovery from failures is crucial for sustaining positive customer–brand relationships in the service economy, the present study investigates the mediating effect of the valence of forgiveness (both exoneration and resentment) on the association between various service recovery strategies (apology, compensation and voice) and service outcomes (brand trust and negative word of mouth [NWOM]) in the context of food delivery apps (FDAs). We tested the proposed model by analysing data from 294 FDA users who had experienced FDA service failures and recovery efforts in the recent past. The findings suggest that recovery strategies are associated with exoneration, resentment and brand trust but not with NWOM. While exoneration mediates the association of these strategies with both brand trust and NWOM, resentment mediates only the association of these strategies with NWOM. Finally, the severity of previously experienced service failures and the speed of the service provider's response moderates the association of the valence of forgiveness with brand trust and NWOM. By uncovering the key role of the valence of forgiveness in service recovery, our study offers significant theoretical and practical implications for stakeholders.

1. Introduction

Food delivery applications (FDAs) have transformed how and where people around the world order ready-to-consume food. A testimony to the growing importance of FDAs as key stakeholders in the hospitality sector is the fact that platform-to-customer online delivery is now the largest segment of the entire online food delivery market, with an estimated volume of 172,243 million USD globally in 2021 (Statista, 2021). Furthermore, worldwide user penetration of FDAs is expected to reach 12.5% by 2024 (Statista, 2020). Research interest in FDAs has also grown substantially, as evidenced by recently published studies examining various aspects of FDAs, such as value proposition (Kaur et al., 2021), barriers to the use of FDAs during the pandemic (Talwar et al.,

2021) and food waste and FDA use (Sharma et al., 2021).

Despite the increasing popularity and use of FDAs, the prior literature has reported various challenges facing FDAs in the pre-and post-adoption phases. For example, at the adoption stage, FDAs must compete with an increasing number of start-ups engaged in the food delivery sector (Ken Research, 2018). After adoption, the sustenance of FDAs primarily depends upon maintaining user satisfaction with the service experience. During this phase, FDAs must address various service-related challenges, such as food quality and packaging (Tandon, 2018), the possibility of tampering with food packages and fear regarding the spread of food-borne illnesses (Wasserstrom, 2018) and customers' expectations regarding delivery staff and delivery charges (Elvandari et al., 2017; He et al., 2018). Any form of service failure can

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imbalance the relationship between the service provider and the customer (Tsarenko & Tojib, 2011). However, service failures are an inevitable part of any service delivery process (Azemi et al., 2019), no matter the preventative efforts the provider expends. Rather, providers must prioritise efforts to handle these failures. Indeed, rectifying service failures via various service recovery initiatives is important for service providers' survival in the already competitive market.

The criticality of managing these issues notwithstanding, academic research on the handling of service failures in FDAs is quite limited, especially relative to the available literature in the area. In fact, a review of the literature reveals that the research on FDAs has been oriented towards examining customers' perspectives, such as user's value perceptions (Roh & Park, 2019; Cho et al., 2019), attitudes (Cho et al., 2019), intentions (Roh & Park, 2019), repurchase intentions (Ahn, 2020), value proposition (Kaur et al., 2021) and actual use of FDAs (E.-Y. Lee et al., 2017; Cho et al., 2019). The paucity of research on service-related issues facing FDAs and service recovery strategies FDAs employ to handle episodes of service failure represents a key gap in the accumulated findings, which must be addressed.

Prior studies revealing that the fulfilment of expectations is essential for maintaining food-ordering customers' satisfaction have also underscored the importance of understanding service recovery strategies and their implications for FDA service providers (Elvandari et al., 2017). Scholars have argued further that service providers can generate new opportunities for customer engagement and increase goodwill for themselves (Harrison-Walker, 2019) by effectively addressing service failures (Cho et al., 2019). In contrast, service failures can prove quite challenging and negatively impact financial performance, customer satisfaction, word of mouth (WOM), customer retention and complaint behaviour (Akamavi et al., 2015). Losing existing customers is especially damaging because prior studies have suggested that attracting a new customer costs five times more than retaining existing ones (e.g. Kaur, 2016). Moreover, effective service recovery can increase loyalty towards a brand by 44% following major service failures and by as much as 33% following minor service failures (Harrison-Walker, 2019). In the hospitality sector (e.g. hotels), in particular, service recovery strategies implemented within 30 min of a service failure event led to higher customer satisfaction (Jin et al., 2019).

The preceding discussion suggests that understanding service failures and the subsequent service recovery strategies FDA service providers employ has substantial theoretical and practical value. Therefore, the present study endeavours to examine some key aspects of service failure and recovery episodes in the context of FDAs. Proposing Harrison-Walker's (2019) study as discussant, this study examines the association of the various service recovery strategies undertaken by FDA service providers with the various aspects of service outcomes. We selected Harrison-Walker's (2019) study as discussant because it represents a pioneering effort to emphasise the role of forgiveness as a key variable in service recovery research. The study also called for additional research in the area to examine the role of forgiveness. In addition, the study emphasised variations in the efficacy of recovery strategies by industry type, which provides us with a basis on which to examine the same for FDAs.

This study draws upon the prior extended literature to identify the key service recovery strategies available to FDA service providers. We identified three popular service recovery strategies—apology, compensation and voice (Harrison-Walker, 2019; Harun et al., 2018)—and three service outcomes—negative word of mouth (NWOM), brand trust and forgiveness (Yagil & Luria, 2016; Harrison-Walker, 2019)—in the prior literature.

Compared to NWOM and brand trust, the literature has devoted less attention to forgiveness as an outcome. Forgiveness, which represents the customer's readiness to pardon a firm's violations (Xie & Peng, 2009), is an important concept for understanding how customers cope with the stress generated by service failures (Harrison-Walker, 2019). It is also an important variable for the service industry because it

significantly contributes to customer retention (Tsarenko & Tojib, 2011). Moreover, forgiveness plays an influential role in the service failure and recovery process (Chong & Ahmed, 2018). Although scholars have not examined forgiveness in the specific context of FDAs, the prior literature has considered it an important variable in the hospitality domain. For instance, Yagil and Luria (2016) argued that a broader zone of tolerance could lead to forgiveness in the event of an Airbnb host's service failure. For this reason, the current study includes forgiveness in the hypothesised framework. In fact, forgiveness is modelled from two perspectives: its presence and its absence. This implies that service recovery strategies may not always result in forgiveness for a service failure. Some customers may continue to hold a grudge for a failure and express it by withholding forgiveness from the firm. Because the literature has focused less on this concept, the current study relies on the existing understanding of the area to term the presence of forgiveness as 'exoneration' and the absence of forgiveness as 'resentment'. This view aligns with the notion of revenge, which scholars have utilised to represent actions taken to settle a score in response to wrongdoings (Lee & Wu, 2015). The recent literature has emphasised the need to study the influence of forgiveness on the other service outcomes—i.e. brand trust and WOM intentions (e.g. Harrison-Walker, 2019). Therefore, the current study also proposes to examine the direct associations of forgiveness with brand trust and NWOM.

We formalise these objectives via five research questions: **RQ1.** What are the direction and strength of the associations of selected service recovery strategies with brand trust and NWOM? **RQ2.** Does forgiveness, as an outcome of the service recovery effort, have valence—i.e. presence (exoneration) or absence (resentment)? **RQ3.** How do firms' service recovery strategies affect exoneration and resentment? **RQ4.** How is the presence of forgiveness (exoneration) associated with brand trust and NWOM in the event of service failure? **RQ5.** Which mediation and moderation effects enhance our understanding of the associations among service recovery strategies, the valence of forgiveness, brand trust and NWOM?

Grounding them in the theory of stress and coping (Lazarus & Folkman, 1984), we tested the proposed associations using data collected from 294 FDA users who confirmed having a prior experience of service failure and service recovery efforts. In addition to the proposed direct relationships, the study examined the mediating influence of the presence and absence of forgiveness on the associations of service recovery strategies with brand trust and NWOM. To better illuminate individual differences, we also tested the moderating influence of the severity of previously experienced service failure and the speed of the failure's resolution.

The three main novel contributions of this study are as follows: (a) The study examines customer responses in the specific context of FDA service failure and recovery efforts, which scholars have not previously examined; (b) It investigates the associations of selected service recovery strategies with forgiveness and service outcomes (i.e. NWOM and brand trust) and (c) It provides insights into a practical but less developed view of forgiveness in the service literature, i.e. the two sides of forgiveness—exoneration, in which users have responded positively to service recovery strategies and forgiven the failure, and resentment, in which users continue to hold a grudge for the service failure and withhold forgiveness from the service provider despite the providers' use of service recovery strategies.

2. Background literature

2.1. Service recovery

Customers tend to encounter service failures when they use a service that fails to perform as expected (Azemi et al., 2019; Hazée et al., 2017). Some of the examples of service failures are technical glitches in the service provider's application, delivery of a wrong service (delivering food item which was not ordered or delivering stale food in case of

FDAs) and unacceptable delay in delivery, among others. On their part, service providers make use of different service recovery strategies to rectify the possible mental or physical losses that the customers might have incurred due to the instances of service failure (Harrison-Walker, 2019). Thus, service recovery may be defined as the actions taken by service providers to atone for their service failures (C. H. Choi, Kim, Lee & Lee, 2014). Firms usually have a laid down procedure to achieve service recovery (Yeh et al., 2020). A variety of service recovery strategies are discussed in the literature, such as apology, compensation, response speed, voice and explanation (Harrison-Walker, 2019; Harun et al., 2018) and co-created strategies developed by involving customers in their planning (Hazée et al., 2017). Furthermore, scholars have classified service recovery strategies into different categories, namely, psychological strategies (e.g. an apology) and financial strategies (e.g. compensation, discounts and so on; Azemi et al., 2019). Not only has it discussed a variety of strategies, but also the prior service recovery literature on hospitality has focused on different sub-sectors, namely, hotels (Albrecht et al., 2019), restaurants (Harrison-Walker, 2019) and airlines (Migacz et al., 2018).

The significance of service recovery strategies lies in the fact that successful service recovery leads to success for the service provider and satisfaction for customers (Ozuem, Patel, Howell & Lancaster, 2017). In keeping with this, the service recovery literature has discussed the idea of the 'recovery paradox', which considers service failures as opportunities to convert the disgruntled customers into satisfied and loyal users (Gohary et al., 2016). On the other hand, a bad service recovery strategy can prove to be a disaster for the service providers, even in the case of service failure of mild severity level (Azemi et al., 2019). Additionally, different service domains might require different service recovery strategies. For example, Harrison-Walker (2019) suggests that the service recovery strategies which influence the users' tendency to forgive service failures are different for the healthcare service providers as compared to the restaurant service providers. Hence, it is quite important to explore the phenomenon of service recovery in different domains, sectors and across users with varied demographic profiles. This indicates that the paucity of research on service recovery strategies in the context of FDAs is a void that needs to be addressed to ensure sustained growth of this sector. Therefore, the present study proposes to address this gap.

2.2. Forgiveness

Zechmeister et al. (2004) defined forgiveness as the cognitive, behavioural and affective response to an interpersonal offence. Scholars have argued that forgiveness is an intrinsic psychological aspect with a significant influence on outcomes in the service industry (Tsarenko & Tojib, 2011). Past studies have recognised forgiveness as among the coping strategies in the context of service failure and recovery (Harrisonn-Walker, 2019; Tsarenko & Tojib, 2011). Moreover, forgiveness is considered to have healing powers, helping users to cope with stress and thereby positively impacting the relationship between the user and service provider (Tsarenko & Tojib, 2011). The 'forgiveness hypothesis' (Singh & Sirdeshmukh, 2000) confirms this assertion. It states that the customer–brand relationship can act as a buffer against the backlash of a service failure event (Weber & Sparks, 2010). However, forgiveness is a complex concept, and the prior literature has left unclear the factors that motivate users to forgive or to withhold forgiveness from a service provider (Tsarenko & Tojib, 2011). Thus, a gap exists in the previous findings related to FDAs' service failures and recovery strategies and the factors that motivate users' forgiveness in instances of service failures and subsequent recovery efforts. Therefore, the current study not only examines forgiveness as a service recovery outcome but also captures the valence of forgiveness, where the presence of forgiveness is expressed as '*exoneration*' and the absence of forgiveness is measured as '*resentment*'.

3. Theory and hypothesis development

3.1. Theoretical underpinnings

The prior literature has invoked various theoretical frameworks to understand the phenomenon of service recovery. These include justice theory (Migacz et al., 2018; Harun et al. 2018), the constructivist paradigm (Azemi et al. 2019), the theory of stress and coping (TSC; Harrison-Walker, 2019) and expectation disconfirmation theory (Chen et al., 2018). Consistent with the prior literature, the present study utilises the TSC to examine the proposed associations between the study variables.

The TSC explains the dynamic nature of stress, which it defines as an outcome of the transactions between an individual and his or her complex environment (Lazarus & Folkman, 1984). On the other hand, coping can be understood as a customer's behaviour and thoughts while navigating the pressure and tension generated by the internal and external demands of the stressful situation (Lazarus & Folkman, 1984). Although they know that service failure is an inevitable part of using services, users nevertheless expect that the service will work flawlessly and no failure will occur (Smith et al., 1999). With this expectation, users are likely to feel stress—driven by myriad negative emotions—when a service failure occurs (Tsarenko & Tojib, 2011). In such situations, the level of stress generated depends upon the severity of the service failure. Situations triggered by service failures, moreover, require coping responses, including adaption, adjustment and coping (Lazarus & Folkman, 1984). Thus, the TSC seems the most appropriate framework for examining consumer behaviour related to FDAs' service failures. Based on this theory, the present study proposes that an FDA service failure creates stress and that the subsequent use of recovery strategies initiates the process of coping; in the process of coping, customers deploy various adaptive tools, such as exoneration and resentment, which influence their brand trust and intentions to engage in NWOM.

3.2. Proposed research model

The present study examines the associations between three service recovery strategies—apology, compensation and voice—and its three outcomes—forgiveness (exoneration as well as resentment), brand trust and NWOM (Fig. 1). In addition, the proposed model examines the association of forgiveness (both exoneration and resentment) with the other two service outcomes, i.e. brand trust and NWOM. Our choice of recovery strategies aligns with the prior literature, which has acknowledged apology and compensation as two major service recovery strategies (Chen et al., 2018; Azemi et al., 2019). Furthermore, the prior literature has also suggested that allowing customers to express themselves is a useful recovery strategy (Harrison-Walker, 2019). To avoid any possible bias from the existing conventions and assumptions, moreover, the current study examines the factorial structure of the measures of service recovery strategies and forgiveness. This is important because the culture and nature of a service is likely to influence a customer's perceptions regarding the service recovery strategies employed and the process of forgiveness.

3.2.1. Antecedents: Service recovery strategies

This study models service recovery strategies as a combination of three components—apology, compensation and voice. An apology, which is defined as the manifestation of repentance when a negative event occurs (Vaerenbergh et al., 2018), plays a crucial role in the forgiveness process (Harrison-Walker, 2019). An apology conveys an organisation's courtesy, effort, empathy and concern with addressing the negativity generated by a service failure (Smith et al. 1999; Harrison-Walker, 2019). Meanwhile, compensation is defined as the financial or economic incentives service providers offer to their users who have experienced service failures (Smith et al., 1999). Common
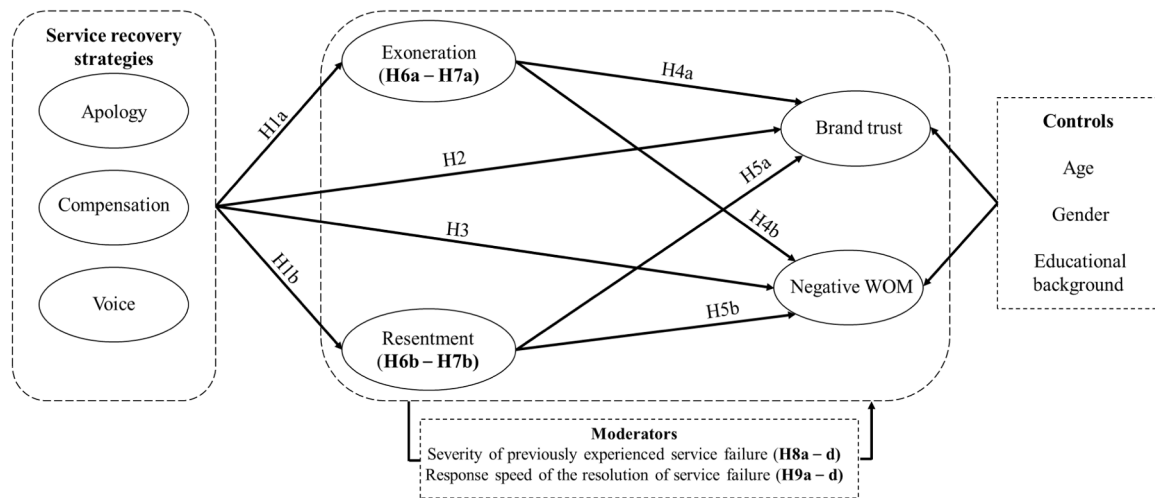
Fig. 1. Hypothesised research model.

examples of compensation include bonuses, discounts and partial or full refunds (Harrison-Walker, 2019). As with apologies, compensation is an indicator of the service provider's commitment to and respect for the user (Vazques-Casielles et al., 2012). Finally, voice refers to the user's expression of concerns about the service failure experience. Harrison-Walker (2019) argued that voice can offer users functional as well as value-expressive benefits. From the functional perspective, voice can enable customers to offer their opinions during the service recovery process. It also provides customers with an outlet for their emotions and negativity. Because some customers do not complain about failure but quietly switch to other service providers (Li et al., 2020), voice is an important recovery strategy.

An evaluation of the factorial structure of various service recovery strategies reveals that respondents do not differentiate between service recovery strategies (i.e. apology, compensation and voice). Therefore, this study considers service recovery strategies to be a unidimensional construct comprised of all three strategies.

3.2.2. Outcomes: forgiveness, brand trust and NWOM

By interpreting forgiveness largely in terms of its presence, previous studies have considered forgiveness as a unidimensional construct (e.g. DiFonzo et al., 2020; Yagil & Luria, 2016). However, this study's factorial-level investigation reveals that forgiveness is comprised of two factors. The first factor indicates the presence of forgiveness, which is termed exoneration. Exoneration represents the benign attitude of users who forgive the service provider and continue to have positive intentions toward using the service despite a service failure. In contrast, the second factor indicates the absence of forgiveness, which is termed resentment. This factor captures the resentful attitude of users who hold a grudge against the service provider and harbour negative feelings following a service failure. Thus, forgiveness, comprising exoneration and resentment, represents the first service outcome in the proposed research model.

As the second outcome in the proposed model, brand trust refers to consumer confidence in the reliability and objectivity of a brand during risky situations (Delgado-Ballester, 2004). Because scholars have argued that service failures tend to induce users to talk negatively about service providers based on their own negative emotions as victims of service failures (Harrison-Walker, 2019), we include NWOM as the third outcome in the model. NWOM is also an important variable in the customer–brand relationship literature, as emphasised by recent studies (e. g. Jabeen et al., 2022, Talwar et al., 2020). Thus, understanding the impact of recovery efforts can provide useful insights for future research and practice.

3.2.3. Mediating, moderating and controlling variables

The study also examines (a) the mediating influence of the presence of forgiveness (exoneration) and the absence of forgiveness (resentment) on the association of service recovery strategies with the other two service outcomes (brand trust and NWOM); (b) the moderating role of the severity of previously experienced service failures and the speed of a service failure's resolution and (c) the confounding effect of three socio-demographic characteristics of users—i.e. age, gender and economic background. The choice of these variables as controls aligns with the extant literature, which has reported the significant influence of demographic characteristics on service failure and recovery. For example, age (Varela-Neira et al., 2010; Moliner-Velázquez et al., 2015) and gender (Mattila et al., 2009) significantly influence consumer behaviour in failure and recovery situations. Similarly, users' economic backgrounds can influence their behaviour. For example, it can influence the level of dissatisfaction or perceived severity following service failure or recovery efforts.

3.3. Service recovery strategies and forgiveness (exoneration and resentment)

The prior literature has found service recovery strategies to influence service outcomes, including reconciliation, re-patronage intentions and WOM (Chen et al., 2018). To elaborate, Chen et al. (2018) observed that just service recovery generates positive customer perceptions, such as increased satisfaction and reduced intentions to engage in NWOM. Scholars have argued that the psychological process of forgiveness is necessary to achieve service outcomes, suggesting that service providers should apologise for service failures (Rapske et al., 2010). DiFonzo et al. (2020) found that apology, along with other strategies, such as restitution, influence users' tendency to forgive providers for service failures. In contrast, Komiya et al. (2020) reported that compensation does not facilitate forgiveness for irreplaceable losses. Nevertheless, it does drive forgiveness for losses that are replaceable. Harrison-Walker (2019) found that apology, compensation and voice actually encourage restaurant industry users to forgive service providers, while voice alone influences users' intentions to forgive service failures in the healthcare industry. Based on the above discussion, we expect that service recovery strategies combining apology, compensation and voice will help FDA service providers to garner users' forgiveness (exoneration) following service failures. Hence, we propose the following hypothesis:

H1a. Service recovery strategies—representing the combination of apology, compensation and voice—are positively associated with

exoneration

The present study also acknowledges that service recovery strategies may not necessarily lead to forgiveness (exoneration). In fact, these strategies (apology, compensation and voice) may actually upset customers even more and increase their sense of dissatisfaction. Although no existing evidence directly indicates the possibility of such a response, prior findings do suggest that service recovery strategies do not always work (e.g. Harrison-Walker, 2019) and thus support the existence or absence of forgiveness. Intuitively, we expect that FDAs' service recovery strategies may further aggravate customers, thereby decreasing their willingness to forgive and increasing their dissatisfaction. Based on this discussion, we hypothesise as follows:

H1b. Service recovery strategies—representing the combination of apology, compensation and voice—are positively associated with resentment

3.4. Service recovery strategies and brand trust

The stress caused by service failures creates an imbalance in the relationship between the service provider and the customer (Smith et al., 1999). This imbalance, in turn, can deplete the existing level of trust between the provider and customer (Tsarenko & Tojib, 2011). However, service recovery strategies can help service providers handle this imbalance. Scholars have confirmed the association of service recovery strategies with customers' trust in varying contexts, such as banking services (Chong & Ahmed, 2018). Prior research has found that service providers' recovery strategies can promote positive outcomes, including stronger brand trust (e.g. Kim, Shin & Koo, 2018). For instance, Azemi et al. (2019) revealed that apology increases users' trust in the service provider. Similarly, Wei et al. (2017) reported that overcompensation positively influences a user's brand trust following a performance-related crisis. Service recovery efforts can also affect a customer's tendency to express enthusiasm and offer positive brand endorsements (Kim, Shin & Koo, 2018). This association is consistent with the '*service recovery paradox*. According to this paradox, a service failure may positively impact organisations because users who experience service failures may have more satisfying experiences with service recovery compared to users who have never experienced a service failure (Matos et al., 2007). We likewise expect that FDA providers can influence customers' trust in their brand by apologising unconditionally, compensating for any monetary losses or inconveniences caused by service failure and allowing disgruntled customers to express their frustration and anger. Therefore, we hypothesise as follows:

H2. Service recovery strategies—representing the combination of apology, compensation and voice—are positively associated with brand trust.

3.5. Service recovery strategies and NWOM

The prior literature has suggested that service failures influence customers' WOM behaviour (Choi & Mattila, 2008). In addition, scholars have revealed that the higher the level of an organisation's responsibility in causing a service failure, the higher is the failure's propensity to generate NWOM (Choi & Mattila, 2008). Furthermore, past studies have argued that customers' tendency to spread NWOM is driven by the negative emotions they experience as victims of service failure (Harrison-Walker, 2019). In such situations, the recovery strategies service providers employ can lessen customers' negative emotions, which, in turn, may lower customers' propensity to engage in NWOM. For example, in the context of the restaurant industry, Harrison-Walker (2019) found that apologies negatively influence NWOM intentions via forgiveness. The same study revealed that voice has an indirect negative influence on NWOM via forgiveness in both the restaurant and healthcare sectors (Harrison-Walker, 2019). Consistent with the prior literature, we anticipate that service recovery strategies, such as expressing regret, allowing customers to share their grievances and offering compensation, can reduce customers' negative feelings following service failures. Consequently, such customers are less likely to engage in NWOM. Based on this discussion, we hypothesise as follows:

H3. Service recovery strategies—representing the combination of apology, compensation and voice—are negatively associated with NWOM.

3.6. Forgiveness (exoneration and resentment), brand trust and NWOM

The prior literature has demonstrated the healing power of forgiveness, which lessens customers' negativity following service failures (McCollough, 1997). To elaborate, forgiveness has a positive influence on users' propensity to accept the disappointment caused by service failures (Harrison-Walker, 2019; Tsarenko & Tojib, 2011). Similarly, forgiveness helps to rebalance the relationship between customers and service providers and thereby promotes positive outcomes (Tsarenko & Tojib, 2011). Noting this, past studies have examined the association between forgiveness and service outcomes, such as brand trust and WOM. For instance, a recent study suggested that customer forgiveness is crucial for the recovery of trust in cases of service failure (Bozic & Kuppelwieser, 2019). Other studies have reported that FDA providers undertake service recovery initiatives to regain customers' lost trust (Azemi et al., 2019; Wei et al., 2017). Based on the preceding discussion, we assume that forgiveness (exoneration in the context of the present study) will increase the brand trust of customers who have experienced both service failures and subsequent service recovery strategies in the form of apology, compensation and voice. Thus, we propose the following hypothesis:

H4a. Exoneration is positively associated with brand trust

Studying NWOM, Harrison-Walker (2019) found that forgiveness decreases the tendency of users in the restaurant and healthcare sectors to engage in NWOM. Even in the banking sector, customers' forgiveness is negatively correlated with their intentions to engage in NWOM (Muhammad & Rana, 2019). Similarly, we assume that the presence of forgiveness (or exoneration) in the event of FDA service failures and the subsequent use of three service recovery strategies (apology, compensation and voice) will reduce NWOM. Hence, we posit as follows:

H4b. Exoneration is negatively associated with NWOM

Because this study presents a dual view of forgiveness, we also hypothesise the associations of resentment (the absence of forgiveness) with brand trust and NWOM. To the best of our knowledge, no prior studies have investigated these associations. Therefore, we have no findings on which to draw. Because resentment represents the opposite of exoneration, however, we intuitively expect that resentment's associations with the other two outcomes will be the opposite of exoneration's associations with these outcomes. This implies that the negative feeling of being mistreated by an FDA via a service failure is likely to erode a resentful user's trust in the brand. Hence, we propose the following hypothesis:

H5a. Resentment is negatively associated with brand trust

Continuing with the same argument, we also expect that a negative service experience will cause customers to harbour negative emotions towards the FDA. These negative emotions, in turn, are likely to encourage customers to give poor feedback to others about the service provider. Based on this discussion, we propose the following hypothesis:

H5b. Resentment is positively associated with NWOM

3.7. The mediating role of forgiveness (exoneration and resentment)

Harrison-Walker (2019) found that forgiveness mediates the association between conflict and relationship quality in business contexts. As in the present study, the extant research in business contexts has empirically demonstrated the mediating role of forgiveness in the associations of apology, compensation and voice with reconciliation and NWOM (Harrison-Walker, 2019). Consistent with prior findings, the present study examines the mediating influence of the presence of forgiveness (exoneration) and the absence of forgiveness (resentment) on the associations of service recovery strategies with brand trust and NWOM. In the wake of service failures, users decide whether or not to forgive the service provider. In both situations, forgiveness is a process with the potential to influence other service failure outcomes depending on the strategies providers undertake to repair the damage (Harrison-Walker, 2019). Hence, forgiveness may mediate the relationships between service recovery strategies and outcomes. Because the present study considers the valence of forgiveness, i.e. exoneration and resentment, we propose two mediating effects to be tested separately:

H6a. Exoneration mediates the association between service recovery strategies and brand trust

H6b. Resentment mediates the association between service recovery strategies and brand trust

H7a. Exoneration mediates the association between service recovery strategies and NWOM

H7b. Resentment mediates the association between service recovery strategies and NWOM

3.8. The effects of moderating variables

Moderating variables offer a useful way to capture the role of individual differences in diminishing or enhancing the strength of the relationship between the antecedent and outcome variables. Past studies on service failure and recovery have confirmed the moderating effect of variables such as emotional intelligence on the association between problem severity and satisfaction (Gabbott et al., 2011). Other moderating influences examined in this context include the attribution of service failure (Akhtar et al., 2019), the severity of service failure (Maginini et al., 2007) and household income and gender (Akinci & Aksoy, 2019). Despite the accumulated literature, recent studies have noted the need to further examine moderating influences in the context of service failure and response via recovery strategies (e.g. Wolter et al., 2019). In consonance, this study examines the moderating influence of the severity of previously experienced service failure and the response speed of the failure's resolution. The moderating effects of these two variables are interesting in the present context because they capture characteristics of both service failure and recovery efforts. We examine the moderating influence of the selected variables on the associations between the valence of forgiveness and the other two outcomes. Hence, we posit the following:

H8a–b. Severity of previously experienced service failure moderates the association of exoneration with brand trust and NWOM, such that the strength of the association differs for different levels of severity

H8c–d. Severity of previously experienced service failure moderates the association of resentment with brand trust and NWOM, such that the strength of the association differs for different levels of severity

H9a–b. Response speed of the resolution of service failure moderates the association of exoneration with brand trust and NWOM, such that the strength of the association differs for different response speeds

H9c–d. Response speed of the resolution of service failure moderates the association of resentment with brand trust and NWOM, such that the strength of the association differs for different response speeds

4. Method

4.1. Survey instrument, data collection and participants

We developed the survey instrument by adapting the items for the study variables from previously validated scales. Because this involved adapting the items to a different context, however, we followed the process for developing a measurement scale. Thus, after preparing the preliminary questionnaire by modifying the pre-validated scales, we sought feedback from an expert panel of three professors specialising in the area of customer–brand relationships. We then revised the instrument based on the experts' input and tested it through a pilot study involving 15 respondents who represented the target participants. This process helped to confirm that the items measured what they were intended to measure and that the study participants were able to understand the language employed. Following some minor corrections, we deemed the instrument ready for data collection. These steps confirmed the instrument's face and content validity, as suggested by recent studies (e.g. Dhir et al., 2021; Talwar et al., 2021). The final instrument comprised the following scales adapted from Harrison-Walker (2019): an eight-item scale for service recovery strategies, a three-item scale for exoneration, a four-item scale for resentment and a three-item scale for NWOM. We measured brand trust using a three-item scale adapted from Albus and Ro (2017). All items were measured on a five-point Likert scale.

The data collection was conducted manually at various shopping malls in India's National capital region. At the shopping centres, the researchers asked people who were willing to participate about their experiences using FDAs. Those who had no experience with FDAs were excluded from participating. Additionally, customers who had experience with FDAs but no experience of service failure were also excluded at the initial stage. A total of 700 people were contacted. Of these, 495 people had experience with FDAs and service failure as well as service recovery. Following the initial manipulation check, we utilised a retrospective experience sampling approach with the selected participants. Under this approach, all of the participants were asked to think about their recent FDA service failure experience for approximately five minutes before responding to the survey (Harrison-Walker, 2019). As Harrison-Walker (2019) noted, this approach enables participants to remember their failure experience and, in a way, relive the experience. Following this period of recollection, the study participants received a pen-and-paper survey through which to provide their responses. In total, the study took approximately 15–20 min. After we had discarded incomplete responses, a total of 294 responses remained. Table 1 presents the study participants' demographic details.

4.2. Data analysis

We analysed the data with SPSS 25.0 and AMOS 25.0 using a two-step approach suggested by Anderson and Gerbing (1988). Our choice of two-step covariance-based structural equation modelling (CB-SEM) was based on the multivariate characteristics of the data, as discussed by recent studies (e.g. Jabeen et al., 2022; Talwar et al., 2021). The first step involved testing the validity and reliability of the study constructs using confirmatory factor analysis (CFA). The second step involved estimating the structural equation model (SEM) as well as mediation and moderation with the intention of establishing the predictability of the proposed model. Finally, we conducted mediation and moderation analyses using PROCESS Macro.

5. Results

5.1. Data diagnostics and common method bias

First, we evaluated the data to confirm their suitability for CB-SEM. Consistent with the suggestion of recent studies (e.g. Talwar et al.,

Table 1
Study participants' profile.

Demographic characteristics		Frequency (percentage)
Gender	Males	156 (53.1)
	Females	138 (46.9)
Age	18–24 years	46 (15.6)
	25–34 years	163 (55.4)
	25–44 years	67 (22.8)
	45–54 years	14 (4.8)
	55–64 years	4 (1.4)
Nature of employment	Employed full-time	209 (71.1)
	Employed part-time	19 (6.5)
	Student	39 (13.3)
	Other	27 (9.2)
Economic background	Less than 1 million INR	87(29.6)
	More than 1 million to 2 million INR	16 (5.4)
	More than 2 million to 3 million INR	158 (53.7)
	More than 3 million INR	33 (11.2)
Experience with FDA	Approximately 1 month	6 (2.0)
	Approximately 3 months	35 (11.9)
	Approximately 6 months	110 (37.4)
	Approximately 1 year	86 (29.3)
	More than 1 year	57 (19.4)

2021), we checked the data for four multivariate assumptions: linearity, normality, homoscedasticity and the absence of multicollinearity. This step ensured that the data met all required standards and cut-offs. Next, because the data were self-reported and collected via a single instrument, we ensured the absence of common method bias (CMB). Following recent studies (e.g. Dhir et al., 2021), we employed Harman's single-factor test in SPSS to determine the presence or absence of CMB. The results indicated that a single extracted factor explained less than the suggested threshold of 50% variance (Podsakoff et al., 2003), confirming that CMB was not an issue in the data collected for this study. Consistent with recent studies (e.g. Bhutto et al., 2021), we also utilised the marker variable technique to confirm the absence of this bias.

5.2. Measurement model

The CFA model returned a good fit relative to the recommendations of the existing literature (χ^2/df = 2.59, *CFI* = 0.95, *TLI* = 0.95, *RMSEA* = 0.07). Several metrics also indicated that the study constructs possessed sufficient convergent validity: (i) The factor loadings of the measurement items for the study measures exceeded 0.50 (Table 2); (ii) The value of the composite reliability (CR) for the study measures exceeded 0.70 and (iii) The value of the average variance extracted (AVE) for the study measures exceeded 0.50. All of these values satisfied the recommended thresholds in the existing literature (Fornell & Larcker, 1981). Additionally, the correlations between pairs of study measures were less than the square root of the AVE values for each study measure. This indicated that the study measures possessed sufficient discriminate validity (Fornell & Larcker, 1981). Furthermore, CR values above 0.70 verified the study measures' sufficient internal reliability (Table 3). Finally, HTMT analysis (Table 4) validated the presence of discriminant validity because the correlations among the constructs were less than 0.90 (Henseler et al., 2015).

5.3. Control variables

The structural model controlled for age, gender and economic background. The analysis revealed that age, gender and economic background did not exert any significant controlling influence on brand trust and NWOM.

Table 2
Items and factor loadings.

Study measures (reference)	Measurement items	CFA	SEM
Service recovery strategies (SRST) (Harrison-Walker, 2019)	SRST1: The FDA apologised to me for the service failure.	0.86	0.86
	SRST2: The FDA apologised for the inconvenience the failure caused.	0.92	0.92
	SRST3: The FDA expressed regret for the mistake they made.	0.91	0.91
	SRST4: The FDA said they were sorry for the service failure.	0.91	0.91
	SRST5: The FDA offered a fair redressal (such as a refund or other compensation) for the problem.	0.90	0.90
	SRST6: The FDA made a very generous offer to compensate me for the breakdown in their service.	0.88	0.88
	SRST7: FDA gave me the opportunity to explain my point of view regarding the problem.	0.87	0.87
	SRST8: Customers have a variety of ways by which they can report failures to the FDA (e.g. Internet, telephone, email, in-person).	0.81	0.80
	SRST9: It is easy for customers of the FDA to notify the provider about problems they encounter.	0.81	0.81
Exoneration (EXO) (Harrison-Walker, 2019)	EXO1: I have compassion for the FDA who mistreated me.	0.75	0.75
	EXO2: I forgive the FDA for what it did to me.	0.87	0.87
	EXO3: Even though the FDA's actions hurt me, I have goodwill for it.	0.90	0.90
Resentment (RST) (Harrison-Walker, 2019)	RST1: I can't stop thinking about how I was mistreated by the FDA.	0.89	0.89
	RST2: I spend time thinking about ways to get back at the FDA that mistreated me.	0.95	0.95
	RST3: I feel resentful toward the FDA that mistreated me.	0.91	0.91
	RST4: The FDA's wrongful actions have kept me from enjoying life.	0.92	0.92
Brand trust (BT) (Albus & Ro, 2017)	TR1: I feel that this FDA is trustworthy.	0.89	0.89
	TR2: I have confidence in the services of this FDA.	0.90	0.90
	TR3: I feel that this FDA has the ability to provide good services.	0.84	0.84
Negative word of mouth (NWOM) (Harrison-Walker, 2019)	NWOM1: I complained to friends or family about the FDA.	0.88	0.88
	NWOM2: I said negative things to others in the community about the FDA.	0.90	0.90
	NWOM3: I told friends and relatives about my bad experience.	0.87	0.87

5.4. Structural model

Similar to the CFA, SEM also returned a good fit (χ^2/df = 2.11, *CFI* = 0.96, *TLI* = 0.96, *RMSEA* = 0.06). Via SEM, we were able to estimate the path coefficients and percentage of variance explained by the dependent study constructs. As shown in Fig. 2, the following hypotheses received support: H1a (β = *0.75****), H1b (β = *0.18***), H2 (β = *0.37****), H4a (β = *0.55****), H4b (β = *0.50****) and H5b (β = *−0.24****). In contrast, H3 (β = *0.14*) and H5a (β = *0.04*) were not supported. Moreover, the structural model explained 57.4% of the variance in exoneration, 12.5% of the variance in resentment, 75.7% of the variance in brand trust and 39.9% of the variance in customers' tendency to engage in NWOM.

5.5. Mediation analysis

We conducted a parallel mediation analysis using Model 4 in PROCESS Macro on SPSS. This analysis aimed to understand the mediating role of exoneration and resentment in the relationship between the service recovery strategies adopted by service providers and users'

Table 3
Validity and reliability.

	Mean	SD	CR	AVE	MSV	ASV	RST	EXO	BT	NWOM	SRST
RST	3.56	1.16	0.95	0.84	0.07	0.04	**0.92**				
EXO	3.43	0.94	0.88	0.71	0.71	0.41	−0.26***	**0.84**			
BT	3.62	0.91	0.91	0.77	0.71	0.38	−0.23***	0.84***	**0.88**		
NWOM	3.05	1.17	0.91	0.78	0.31	0.18	0.11	0.56***	0.40***	**0.88**	
SRST	3.60	1.01	0.97	0.77	0.60	0.35	−0.15*	0.75***	0.78***	0.47***	**0.88**

Note: Standard deviation: SD, Composite reliability: CR, Average variance extracted: AVE, Maximum shared variance: MSV, Average variance shared: ASV, Negative word of mouth: NWOM, Resentment: RST, Exoneration: EXO, Brand trust: BT, Service recovery strategies: SRST.

Table 4
HTMT analysis.

	RST	EXO	BT	NWOM	SRST
RST					
EXO	0.25				
BT	0.23	0.84			
NWOM	0.22	0.60	0.40		
SRST	0.15	0.75	0.79	0.48	

brand trust and intentions to spread NWOM. As Table 5 shows, exoneration partially mediated the association between the combination of three service recovery strategies, on one hand, and brand trust and NWOM, on the other. Similarly, user resentment partially mediated the relationship between the service recovery strategies and NWOM intentions. However, resentment did not mediate the association between brand trust and service providers' service recovery initiatives. Hence, H6a, H7a and H7b received support, while H6b did not.

5.6. Moderation analysis

We conducted a moderation analysis using Model 1 in PROCESS Macro. Table 6 presents the results. The severity of previously experienced service failure negatively moderated the association between exoneration and resentment, on one hand, and brand trust and NWOM, on the other. Thus, H8a–d received support. The strength of brand trust, moreover, was greater for users with low and medium levels of exoneration following service failures with high-severity levels (see Fig. 3). However, users with high levels of exoneration following service failures with low levels of severity tended to exhibit higher brand trust than did users with high levels of resentment with the service provider. In

contrast, levels of brand trust remained quite similar across users who exhibited various strengths of resentment and had experienced high-severity service failures. For users with low resentment levels, high-severity service failures resulted in greater brand trust than did service failures with low-severity levels (see Fig. 5). Meanwhile, users who had experienced low-severity service failures were more likely to engage in NWOM against the service provider across varied strengths of exoneration and resentment (see Figs. 4 and 6). Furthermore, the tendency to engage in NWOM was highest among users who exhibited high levels of exoneration and had experienced service failures of varying levels of severity (see Fig. 4). On the contrary, users with high levels of resentment were least likely to engage in NWOM following high-severity service failures. In contrast, users who had experienced low-severity service failures were substantially more likely to engage in NWOM.

Similarly, the speed at which FDA providers responded to and resolved service failures positively moderated the association of user resentment with brand trust and NWOM. Meanwhile, positive moderation occurred in the case of exoneration and NWOM, while negative moderation occurred in the case of exoneration with brand trust. Hence, H9a–d received support. In general, more rapid responses encouraged greater brand trust among users with various intensities of resentment and exoneration (Figs. 7 and 9). Brand trust was highest among users with high exoneration for various response speeds. Similarly, more rapid responses also increased the tendency of users with high and low resentment as well as high exoneration to engage in NWOM (Figs. 8 and 10). In general, users experiencing low response speed and exhibiting low levels of resentment were most likely to engage in NWOM.

6. Discussion
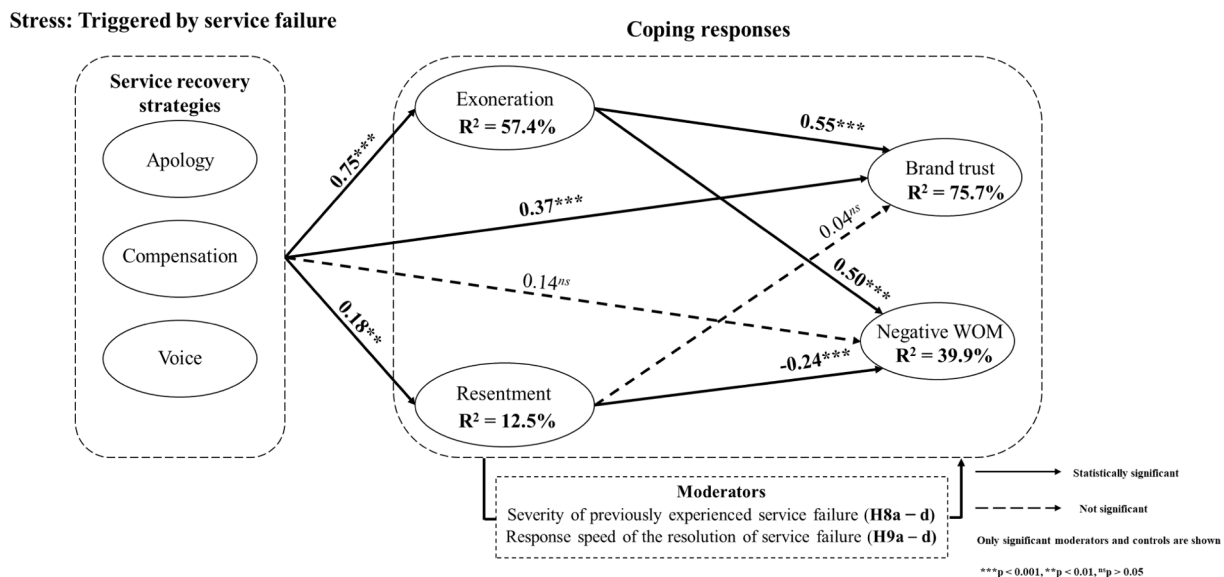
The present study examined the associations between service

Fig. 2. Results of hypothesis testing.

Table 5
Results of mediation analysis.

SRST → EXO/ RST → BT	β	se	t	p	LLCI	ULCI
	β	se	t	p	LLCI	ULCI
SRST → EXO	0.64	0.04	16.16	0.00	0.5619	0.7178
SRST → RST	0.17	0.07	2.51	0.01	0.0364	0.2997
EXO → BT	0.43	0.05	9.22	0.00	0.3386	0.5225
RST → BT	0.04	0.03	1.56	0.12	−0.0113	0.0976
SRST → BT	0.38	0.04	8.87	0.00	0.2953	0.4629
Total effect	0.66	0.04	18.53	0.00	0.5920	0.7327
SRST → EXO/ RST → NWOM						
	β	se	t	p	LLCI	ULCI
SRST → EXO	0.64	0.04	16.16	0.00	0.5619	0.7178
SRST → RST	0.17	0.07	2.51	0.01	0.0364	0.2997
EXO → NWOM	0.61	0.08	7.30	0.00	0.4428	0.7697
RST → NWOM	−0.24	0.05	−4.86	0.00	−0.3356	−0.1421
SRST → NWOM	0.17	0.08	2.29	0.02	0.0246	0.3242
Total effect	0.52	0.06	8.55	0.00	0.4020	0.6424
Indirect effects SRST → BT						
	Effect	se	LLCI	ULCI		
SRST → EXO → BT	0.28	0.06	0.1612	0.3987		
SRST → RST → BT	0.01	0.01	−0.0037	0.0218		
SRST → NWOM						
	Effect	se	LLCI	ULCI		
SRST → EXO → NWOM	0.39	0.07	0.2538	0.5446		
SRST → RST → NWOM	−0.03	0.02	−0.0723	−0.0049		

Table 6
Moderation analysis.

Severity of service failure

	β	t	p	LLCI	ULCI	Moderation?
EXO → BT	−0.18	−4.86	0.00	−0.2504	−0.1060	Yes
EXO → NWOM	−0.19	−3.64	0.00	−0.2912	−0.0867	Yes
RST → BT	−0.11	−2.68	0.01	−0.1828	−0.0279	Yes
RST → NWOM	−0.25	−6.08	0.00	−0.3322	−0.1697	Yes

Response speed

	β	t	p	LLCI	ULCI	Moderation?
EXO → BT	−0.07	−2.67	0.01	−0.1164	−0.0176	Yes
EXO → NWOM	0.25	4.98	0.00	0.1524	0.3515	Yes
RST → BT	0.12	4.38	0.00	0.0636	0.1674	Yes
RST → NWOM	0.28	5.47	0.00	0.1772	0.3766	Yes

recovery strategies and their outcomes in the event of service failures experienced by FDA users. The study articulated five research questions through which to examine these associations. In response to **RQ1**, which inquired into the direction and strength of the associations of service recovery strategies with brand trust and NWOM, the study first sought to understand the composition of the service recovery strategies. Because our evaluation of the factorial structure of various service recovery strategies revealed that FDA users do not differentiate between strategies, we considered recovery strategies as a unidimensional construct comprising apology, compensation and voice. Possible reasons behind the unidimensional nature of service strategies could be customers' cultural backgrounds as well as the nature of the services, which may ensure that service failures do not cause any serious damage. Thereafter, we examined the associations of these strategies as a single construct with brand trust and NWOM. Consistent with the extant literature (Bozic

& Kuppelwieser, 2019), the identified service recovery strategies were positively correlated with brand trust. This finding is also consistent with the service recovery paradox, which argues for stronger provider–customer relationships following service failures. To explain further, the result implies that service failures by FDAs represent opportunities to enhance the level of users' trust in their service providers. This is only possible, however, if service providers handle service recovery effectively.

In contrast, service recovery strategies were not correlated with customers' intentions to engage in NWOM. This contradicts the extant findings addressing NWOM in the service recovery context (Muhammad & Rana, 2019). A probable reason for the lack of a relationship between service recovery and NWOM could be the nature of the services as well as the types of service failures and their intensity. For example, if food is not delivered on time and the service provider apologises for the delay while also providing coupons for lunch and dinner, the customer may not feel negatively towards the service provider and thus not be inclined to engage in NWOM. Before drawing any definitive conclusions, however, scholars should test this association in other settings while taking various types and severities of service failures into consideration.

In response to **RQ2**, which explored the valence of forgiveness, the study examined the factorial structure of forgiveness. This examination revealed that forgiveness comprises two factors: 'forgiveness' (the presence of forgiveness) and 'ill feelings' (the absence of forgiveness). We termed the former '*exoneration*' and the latter '*resentment*'. A potential cause of this valence could be customers' cultural backgrounds and the hedonic pleasure they expect to derive from the consumption of food ordered via FDAs. The valence of forgiveness also implies that certain FDA service failures may leave users so disgruntled that they continue to harbour resentment despite service providers' use of various recovery strategies.

RQ3 proposed to examine the effect of providers' service recovery strategies on users' exoneration and resentment. The results indicated that the combination of the three service recovery strategies was positively correlated with both exoneration and resentment. This finding is consistent with the existing literature (Harrison-Walker, 2019). To explain further, receiving an apology, compensation and a voice encourages FDA users to forgive service providers in the event of service failures. This willingness to forgive could result from a reduction in users' stress when they receive an apology or compensation for a service failure. It also may be driven by users' healing, which may happen after they receive an opportunity to express themselves or vent their negative emotions. At the same time, service recovery strategies were positively correlated with customers' tendency to hold a grudge towards the service provider. This could be the case, in particular, for customers who experience high-severity service failures and thus might continue to feel resentment towards the service providers despite the providers' efforts to make good on the failure.

RQ4 examined the associations of forgiveness, both exoneration and resentment, with brand trust and NWOM in the event of service failures. The statistical analysis revealed that exoneration was positively correlated with brand trust. This finding lends support to the existing view regarding the association between forgiveness and brand trust (Bozic & Kuppelwieser, 2019; Harrison-Walker, 2019). As mentioned previously, exoneration resulting from providers' efficient recovery efforts further strengthens the customer–brand relationship. To elaborate, the results imply that the presence of forgiveness helps to lessen customers' negative emotions and enhance their positive emotions towards providers despite service failures. One reason could be the effectiveness of service providers' recovery initiatives. In contrast, resentment was not associated with brand trust. This lack of association may be attributed to the context under investigation. In other words, it is quite possible that customers do not develop resentment towards FDAs after service failures because they have past positive experiences using them. Furthermore, other situational factors (e.g. the frequency of failures) may also influence resentment or its absence. In sum, infrequent failures and high FDA
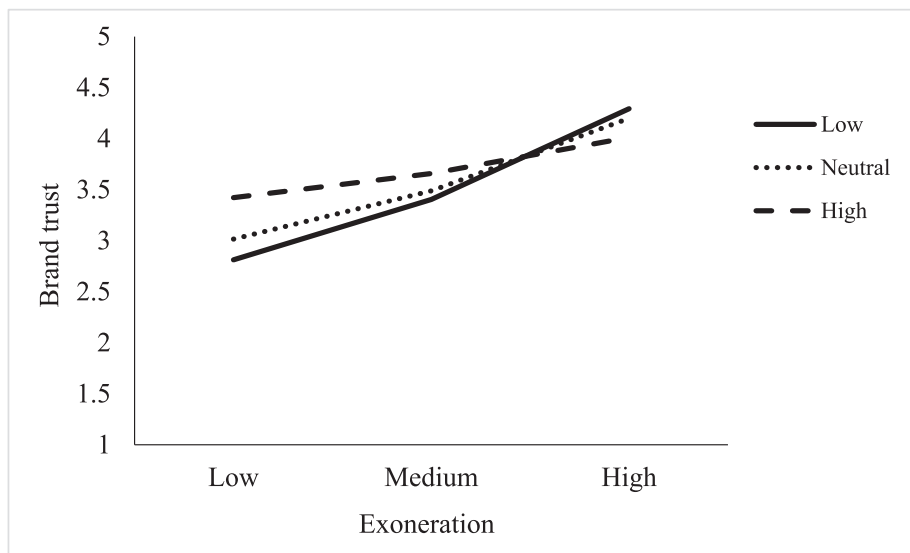
Fig. 3. Moderating effect of the severity of service failure on the association of exoneration with brand trust.
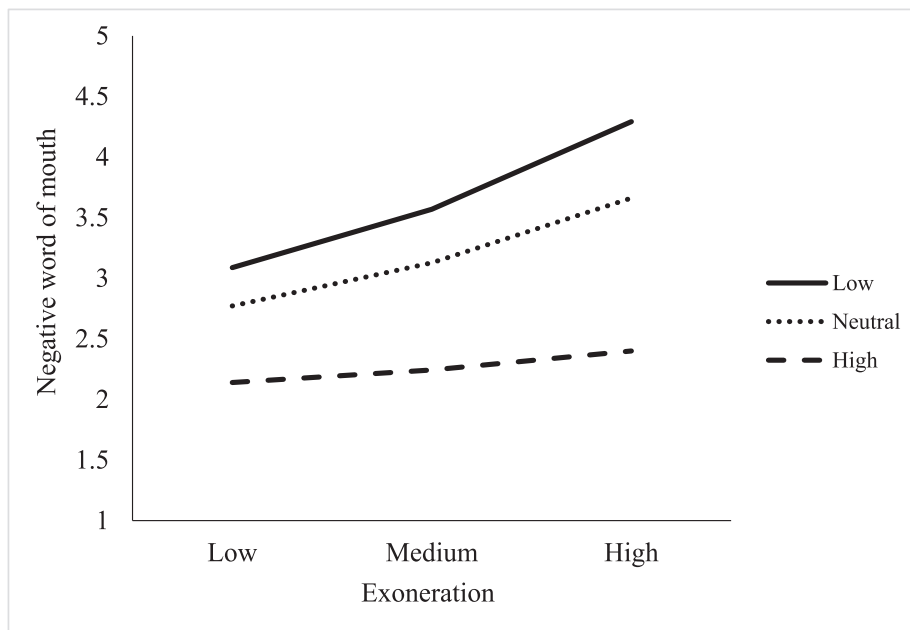

Fig. 4. Moderating effect of the severity of service failure on the association of exoneration with NWOM.

usage could explain the lack of association between resentment and brand trust.

On the other hand, exoneration was positively correlated with customers' intentions to engage in NWOM against service providers. This finding, which contradicts the existing literature (Harrison-Walker, 2019; Muhammad & Rana, 2019), implies that although a service failure followed by effective recovery promotes user trust, it does not pacify customers enough to prevent them from engaging in NWOM. This finding also contradicts the service recovery paradox by suggesting that despite positive outcomes following service failures, some customer bitterness persists.

RQ5 examined the possible mediating and moderating influences on the association of service recovery strategies with their outcomes. We first assessed the mediating influence of exoneration and resentment on the associations of service recovery strategies with brand trust and NWOM. We found that the valence of forgiveness, i.e. both exoneration and resentment, partially mediated the association between service

recovery strategies and NWOM intentions. In addition, exoneration partially mediated the relationship between service recovery strategies and brand trust. In general, these results align with the extant literature (e.g. Harrison-Walker, 2019), confirming that forgiveness can directly and indirectly influence service outcomes. In sum, the presence of a mediated association between service recovery strategies and NWOM via exoneration and resentment suggests that users' mental processing while deciding whether to forgive provides them with time to think about the situation. The thought process during this phase, in turn, determines their resulting level of bitterness.

Finally, the present study examined the moderating influence of the severity of service failure and response speed. The findings revealed that the severity of service failure negatively moderated the associations of exoneration and resentment with brand trust and NWOM. On the other hand, response speed positively moderated the associations of resentment with NWOM and brand trust as well as the association of exoneration with NWOM. However, response speed negatively moderated
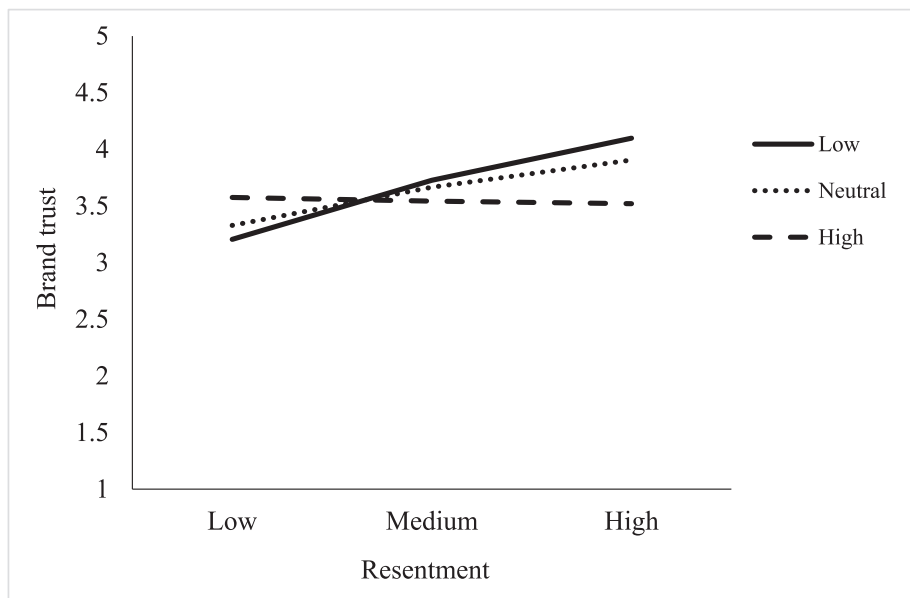
Fig. 5. Moderating effect of the severity of service failure on the association of resentment with brand trust.
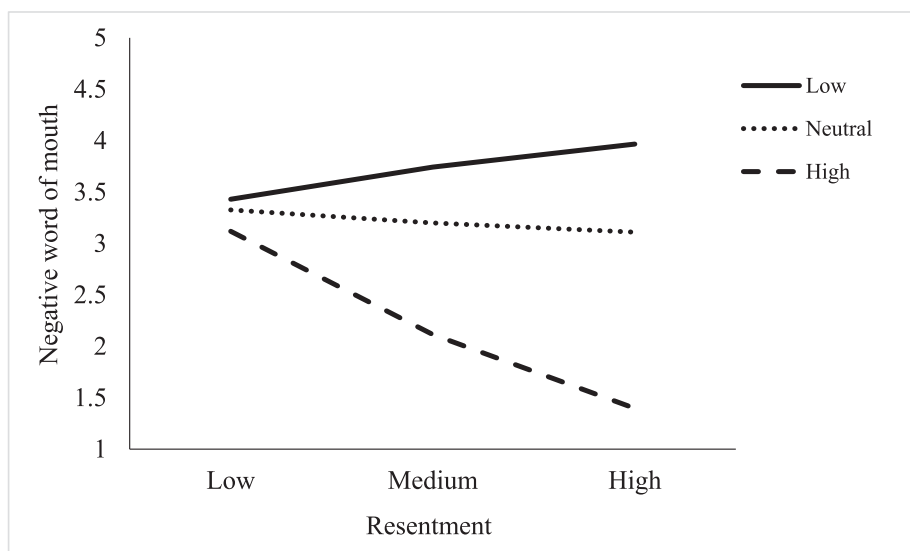

Fig. 6. Moderating effect of the severity of service failure on the association of resentment with NWOM.

the association between exoneration and brand trust. The significant moderating influence of the moderators highlights the importance of other situational factors in the service recovery process. For example, different individuals may have different perceptions of the severity of service failures in the hospitality industry (Swanson & Hsu, 2011). Swanson and Hsu (2011) found that the magnitude of service failure influences intentions to repurchase and engage in WOM regarding the failure.

Our findings regarding the moderating influences suggest that factors such as response speed and failure severity may directly influence not only service outcomes but also the dynamics of the associations of other variables with those service outcomes.

7. Conclusion

Service providers must give careful consideration to service recovery strategies because such strategies are activated in the event of service failures, which might negatively influence customers. In addition,

providers must thoroughly understand the role of forgiveness in the service recovery process. In particular, forgiveness should not be considered a linear concept. Rather, its valence—i.e. the presence (exoneration) or absence (resentment) of forgiveness—requires consideration. This is especially important in the dynamic marketplace where customers are not loyal to any particular brand or organisation (Kaur, 2016).

The present study aimed to examine the phenomenon of service recovery in the context of FDAs. In doing so, it sought to address the gaps reported in the extant literature on service recovery across diverse domains. Additionally, the study examined the mediating role of forgiveness as well as the moderating role of the severity of previously experienced service failures and the speed with which the service providers responded. The findings offer interesting insights with the potential to significantly influence future research in this domain. The study advances the notion that individuals from different cultures can respond to failure events and implement subsequent recovery strategies differently. For example, Indian FDA users perceive the three service
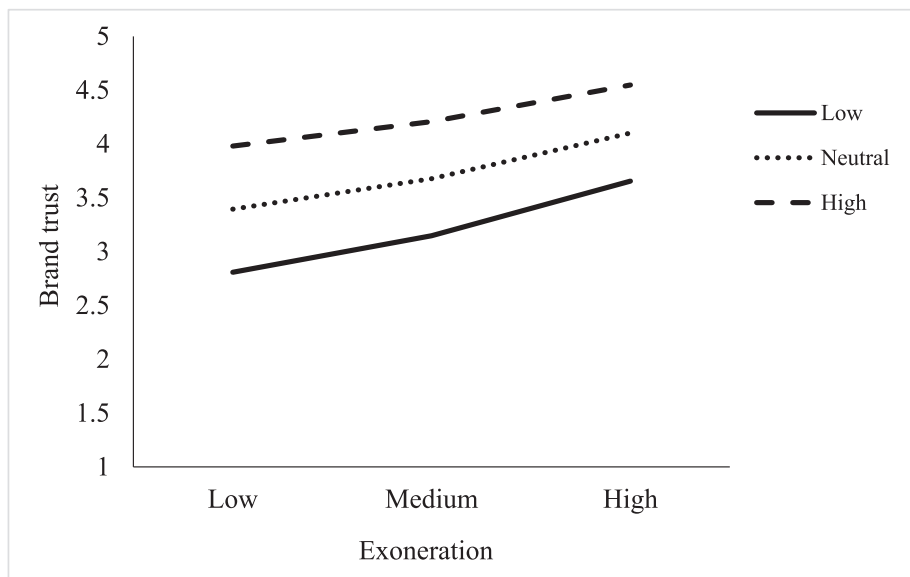
Fig. 7. Moderating effect of response speed on the association of exoneration with brand trust.
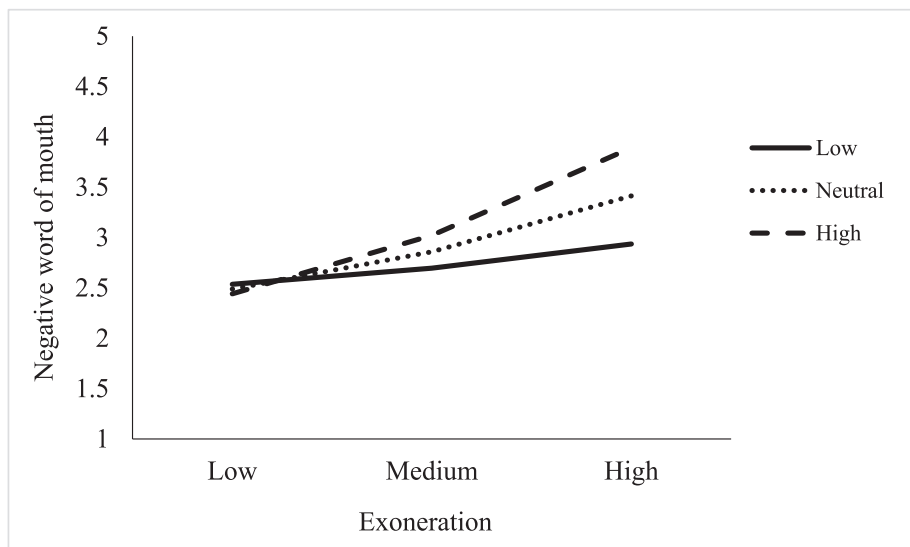

Fig. 8. Moderating effect of response speed on the association of exoneration with NWOM.

recovery strategies—apology, compensation and voice—as one. This study also conceptualised the valence of forgiveness, i.e. the presence of forgiveness (exoneration) and the absence of forgiveness (resentment). Furthermore, the findings suggest that providers' service recovery strategies affect customers' intentions to forgive those providers or to hold a grudge against them. These strategies are also directly or indirectly associated with brand trust and intentions to engage in NWOM. On the whole, the study offers several key theoretical and practical implications.

7.1. Theoretical implications

The findings of the present research make four key theoretical contributions to the existing knowledge about service recovery and service failures (e.g. Harrison-Walker, 2019; Harun et al., 2018; Yagil & Luria, 2016). First, the study expands the findings of the identified discussant article (Harrison-Walker, 2019) by contributing insights on service failure and recovery in the case of the FDA sector. We developed our intent to examine service recovery strategies and their consequences in

the case of FDAs on the basis of Harrison-Walker's (2019) evidence showing that service recovery strategies impact customers' tendency to forgive service providers differently in the healthcare and restaurant sectors. To elaborate, Harrison-Walker's (2019) study revealed that voice, apology and compensation influence forgiveness in the case of the restaurant industry, while voice alone influences forgiveness in the case of the healthcare industry. These findings underscore the need to investigate the phenomenon of service recovery individually in different sectors. The present study addresses this need in the case of FDAs. Furthermore, Harrison-Walker's (2019) study measured forgiveness using two subscales—one measuring the absence of negative responses and the other measuring the presence of positive responses. The current study gives more concrete shape to the dichotomous nature of forgiveness by uncovering its valence—i.e. exoneration, or presence of forgiveness, and resentment, or absence of forgiveness. It thus reinforces the notion that forgiveness is a complex but key variable in the service failure–recovery literature.

Second, the present study provides new knowledge about the role of various moderating variables in the service recovery process. In doing
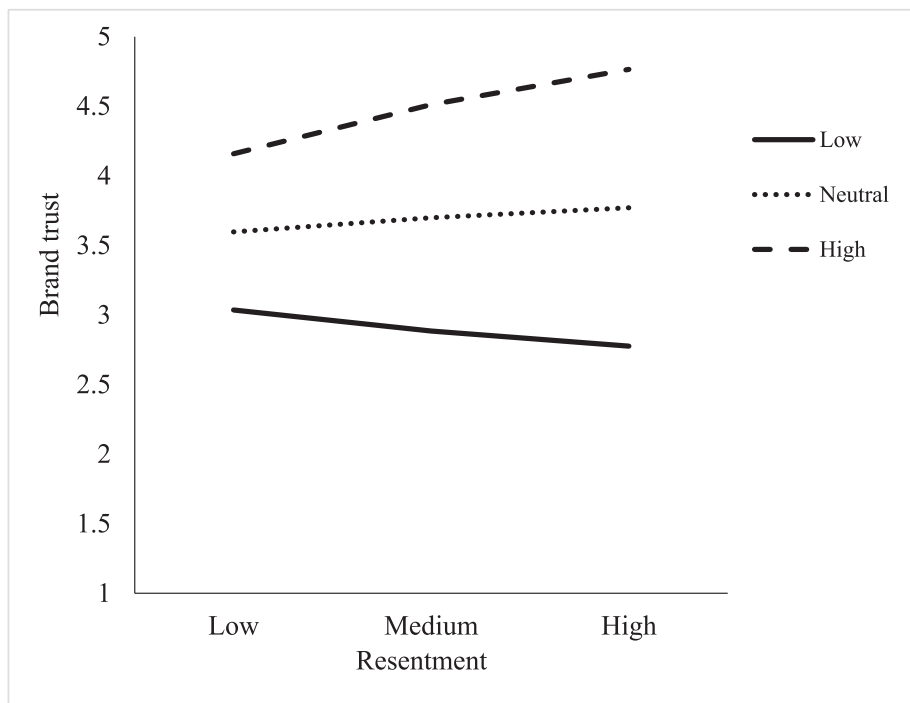
Fig. 9. Moderating effect of response speed on the association of resentment with brand trust.
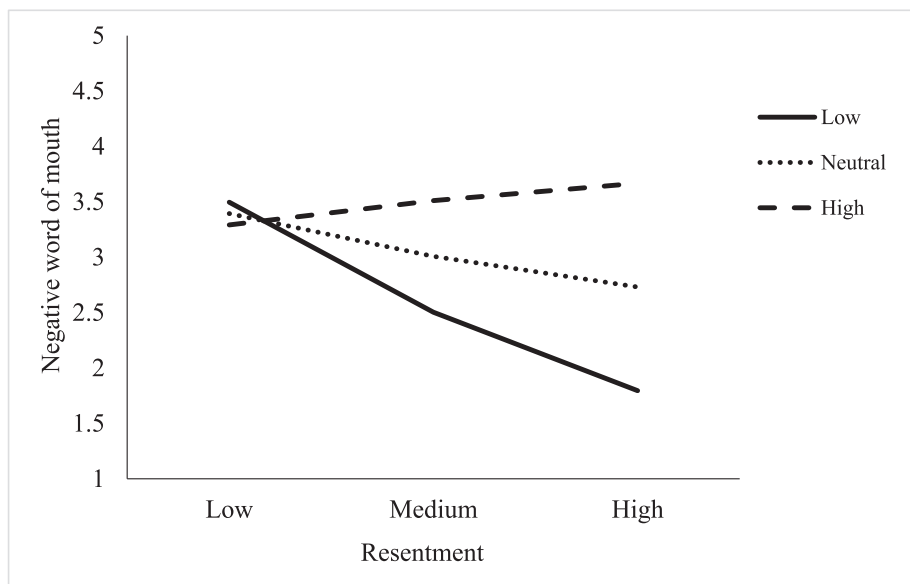

Fig. 10. Moderating effect of response speed on the association of resentment with NWOM.

so, it responds to recent calls to investigate the role of such moderating variables when examining user behaviour in the context of service recovery (e.g. Harrison-Walker, 2019). The present study empirically confirms the moderating effects of the severity of service failures and response speed on the associations between the valence of forgiveness and outcomes (brand trust and NWOM).

Third, the study contributes to the existing literature by suggesting that researchers in the domain of service recovery evaluate the identified constructs at the level of their factorial structures. As in the present case, some contextual factors may induce differences in the constructs relative to their current form in the extant literature. In other words, the present research suggests that conceptualising research on service recovery at the superficial level of the relationships and constructs as we

know them now may influence the robustness of findings. Hence, we suggest that one approach to ensure a deeper understanding of the collected data is to evaluate these constructs at their factorial structure level.

Finally, the study strengthens the extant understanding of the mediating role of the valence of forgiveness as an aspect of service recovery. For example, our findings indicate that exoneration exerts a mediating influence on the association between service recovery strategies and brand trust, while resentment does not appear to have such an effect. Meanwhile, both exoneration and resentment mediate the association between service recovery strategies and NWOM. Overall, the study suggests that future researchers examining the concept of forgiveness should consider not only its valence but also its complex role

in the process of service recovery.

7.2. Practical implications

The study findings offer three practical implications for service providers. First, the findings suggest that users from different cultural backgrounds may perceive service recovery strategies differently. In addition, the nature and characteristics of the service provided may influence the effectiveness of these strategies. For example, Indian customers of FDAs consider recovery strategies involving apology, compensation and voice as one. Hence, FDA providers in India should package these three strategies as one to offset the stress and negative emotions customers experience following an episode of service failure. By packaging their response as a single strategy, customer care executives, who are responsible for interacting with customers following failure episodes, can provide a comprehensive response. This is a key point because service recovery strategies can have a powerful influence on the provider–customer relationship (Kim et al., 2012).

Second, the findings indicate that service recovery strategies indirectly influence customers' tendency to spread NWOM even after exonerating the service provider. Therefore, the present study recommends that providers design service recovery strategies that establish an emotional connection with customers, promote customer–brand engagement and reduce customers' bitterness. For example, service providers can design recovery strategies that go beyond material benefits—perhaps by offering customers recognition for being involved enough to report the failure and positively seeking recovery rather than simply becoming disengaged with the brand.

Finally, the study recommends that service providers consider the severity of service failure and response speed as critical aspects in the service recovery process. This suggestion is motivated by the findings of the moderation analysis, which indicates that the severity of service failure negatively influences the association between the valence of forgiveness and the two outcomes—i.e. brand trust and NWOM. Service providers should thus respond quickly to customers' grievances by deploying recovery strategies that are commensurate with the severity of the experienced failures. Providers must also keep in mind that the perceived severity of service failures varies from individual to individual (Mattila, 2001). Thus, customisation based on customers' needs is likely to increase the chances that a provider's service recovery strategy will succeed.

7.3. Limitations and future work

The present study entails certain limitations, which pave the way for future research. Two key limitations are related to the study's methodology. First, the results are not generalisable because the research context is limited to a single country. As mentioned previously, the study examines the behaviour of Indian FDA users by analysing data collected through a cross-sectional survey. Consequently, researchers must be cautious in extrapolating these results both to other service contexts and to other countries. Furthermore, because it is cross-sectional, the study provides insights only into the correlations—and not the causal relationships, which are more useful in decision-making—between the variables under study. Nevertheless, future research can easily overcome these two limitations. To this end, future researchers can replicate the current model in different geographical settings and service contexts to uncover specific associations. In addition, scholars can conduct longitudinal or experiment-based studies to reveal causal relationships among the variables examined in this study. Furthermore, future studies can employ a mixed-methods approach, using a qualitative study with focus group discussions and open-ended essays to understand the variables of interest followed by quantitative data collection and analysis. Such efforts can better elucidate customers' perceptions and responses.

In terms of its scope, the present research considers service recovery strategies to be a unidimensional construct comprised of only three elements. However, future research should investigate various service recovery strategies independently. Studies can also include other service recovery strategies, such as explanation and courtesy. The present study provides a referent framework, which future researchers can easily extend to elucidate the impact of additional service recovery strategies on outcomes, such as brand trust, brand love, NWOM, brand disappointment and others. Finally, given that the COVID-19 pandemic has affected individuals' use of and perceptions towards digital platforms, future studies examining the efficacy of service recovery strategies in the context of the pandemic as well as those examining variations in customer responses across various digital contexts could be quite useful.

CRediT authorship contribution statement

Puneet Kaur: Conceptualization, Data curation, Formal analysis, Methodology, Software, Writing – original draft. **Shalini Talwar:** Investigation, Methodology, Supervision, Validation, Writing – review & editing. **Nazrul Islam:** Conceptualization, Investigation, Supervision, Validation, Visualization, Writing – review & editing. **Jari Salo:** Resources, Supervision, Writing – review & editing. **Amandeep Dhir:** Conceptualization, Data curation, Funding acquisition, Investigation, Resources, Supervision, Validation, Writing – review & editing.

Declaration of Competing Interest

The authors declare that they have no known competing financial interests or personal relationships that could have appeared to influence the work reported in this paper.

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