Diverse values of fashion rental service and contamination concern of consumers

Eunsoo Baek^a

Ga-Eun (Grace) Oh^b

^aInstitute of Textiles and Clothing, The Hong Kong Polytechnic University, Hong Kong ^bInstitute of International Business and Governance, Lee Shau Kee School of Business and Administration, Open University of Hong Kong, Hong Kong

Correspondence should be addressed to Ga-Eun (Grace) Oh, email: <u>goh@ouhk.edu.hk</u>; phone: +852-2768-6928; address: Lee Shau Kee School of Business and Administration, Open University of Hong Kong, 30 Good Shepherd St., Ho Man Tin, Kowloon, Hong Kong.

Funding: The authors would like to acknowledge the grants provided by The Hong Kong Polytechnic University (Project Code: 1-BE1G); and the Research Grants Council, University Grants Committee Hong Kong (UGC/IDS/16/17).

Declaration of interest: None.

Abstract

Fashion rental service, as a form of collaborative consumption, has gained increasing attention in the fashion industry. However, due to the COVID-19 pandemic, fashion rental businesses need to strategically respond to consumers with heightened contamination concerns. This research aims to understand how diverse consumption values of fashion rental service form attitudes towards the service depending on one's contamination concerns and predict adoption intentions. Structural equation modeling was used to analyze the data (N = 270). The findings suggest that functional, economic, and emotional values significantly increase attitudes leading to adoption intentions. Further, contamination concerns moderate the relationships between values and attitudes as well as attitudes and intentions. The findings enrich the literature of collaborative consumption by integrating theories of consumption value and consumer contamination. Furthermore, the results provide managerial implications for strategic communication of FRS to effectively reach consumers depending on their contamination concern.

Keywords: fashion rental service; collaborative consumption; consumption value; contamination concern; sharing economy; COVID-19

1. Introduction

Renting is when "one party offers an item to another party for a fixed period in exchange for a fixed amount of money and in which there is no change of ownership" (Durgee & O'Connor, 1995, p. 90). This practice is not new to the fashion business. Traditional fashion rental businesses founded on brick and mortar stores responded to the demand for special occasions such as weddings (Adams, 2019). Leveraging on advanced technology and logistics, today's fashion rental business has built a digital platform to provide the right product temporarily and has re-shaped clothing as a service (McDowell, 2019). Fashion rental service (FRS) has received increasing attention in industry as well as academic press (Becker-Leifhold, 2018; Lee & Chow, 2020; Loussaïef, Ulrich, & Damay, 2019; Park & Joyner Armstrong, 2017; 2019a; 2019b), along with the growth of collaborative consumption (CC). FRS is attractive for consumers who want to access various items without taking responsibility for ownership (Bardhi & Eckhardt, 2017). Traditional fashion retailers such as Banana Republic and Urban Outfitters introduced online rental services in 2019, and H&M, a major fast-fashion retailer, announced their intention to enter the rental market (H&M, 2019), fueling the flood of the market (Meyersohn, 2019).

Meanwhile, the outbreak of the COVID-19 heightened the concern about hygiene due to the immediate threat of virus contact (Kirk & Rifkin, 2020). We analyze the Google Trends search queries in March and April 2020 when the number of infected cases of COVID-19 grew rapidly and drastic measures such as sheltering in place occurred in the United States. The analysis shows that the search popularity of terms such as "contagion" and "Purell" (a popular hand sanitizer brand) in these months surged more than ten times compared with the same period in 2019. Therefore, the ongoing global pandemic makes consumers vigilant about negative contamination arising from shared consumption (Bond, 2020). Many kinds of CC involve physical contact with objects that have been previously touched by other users (e.g., clothing, car), leading to subjectivity to contamination concerns (Becker-Leifhold & Iran, 2018). Although FRS ensures careful product handling through services such as professional cleaning (Park & Joyner Armstrong, 2019b), the association between the idea of renting and negative contamination is difficult to break in consumers' minds (Becker-Leifhold & Iran, 2018). In academia, scholars recognized contamination concern as one of the barriers to the adoption of CC (Edbring, Lehner, & Mont, 2016), particularly fashion consumption (Armstrong, 2015). Yet, little is known about how to communicate the values of FRS to consumers with contamination concerns.

To fill this gap, this study offers an integrative framework to understand how diverse values of FRS influence consumers with varying degrees of contamination concerns. We adopt consumption value theory (CVT, Sheth, Newman, & Gross, 1991) as the central theoretical framework to capture the benefits and values of the emerging FRSs from a consumer perspective. By integrating consumer contamination theory (Argo, Dahl, & Morales, 2006) into CVT, we investigate the effect of consumption values (functional, economic, social, emotional, and green) of FRS on the attitudes and adoption intentions of consumers and examine how contamination concerns moderate the relationships of consumption values, attitudes, and behaviors.

This study makes several theoretical and practical contributions. First, this study provides a systematic understanding of current and potential consumers of FRS based on well-established theory. CVT is a useful tool to elucidate consumers' inherent reasons for choosing particular products or services (Sheth et al., 1991). We believe the application of CVT helps us understand the expectations and perceptions of benefits that consumers want to receive from FRS and enhances the predictability of potential behaviors toward FRS, a relatively new service in the market. Second, this investigation advances CVT literature by introducing a novel moderator, contamination concern, in the relationship between values and attitudes (Yu & Lee, 2019; Yang & Jolly, 2009). This study also extends extant theory on consumer contamination by discovering how contamination concerns influence the way values of FRS affect attitudes. The findings contribute to an emergent body of literature regarding CC, which has been previously overlooked in studies on how to deal with consumers with such concerns.

The research findings also offer actionable managerial implications by highlighting how practitioners can effectively communicate the distinct values of FRS depending on the level of consumers' contamination concerns. Tailored communication efforts targeting different types of consumers by emphasizing different values can expand a consumer base of CC by embracing those who have high contamination concerns. Importantly, during the COVID-19 pandemic, when the contamination concern rises sharply, this study provides timely implications for businesses by showing the distinctive responses of consumers with high contamination concerns, which can be mapped onto their reactions to CC under the influence of the pandemic.

2. Conceptual development

2.1. Consumption values of fashion rental service

Consumption value refers to consumers' perceived utility of consumption of a product or service given the cost (Zeithaml, 1988). Values are essential not only to understand value-driven consumer behaviors (Cronin et al., 2000) but also to assist practitioners in developing effective marketing strategies and gaining market advantage (Woodruff, 1997). Values have gained considerable research interest as a stable construct for predicting attitudes and behaviors (Sweeney & Soutar, 2001; Chen & Dubinsky, 2003; Cronin et al., 2000), including adoption intentions, willingness to buy, and purchase intentions (e.g., Chang & Tseng, 2013; Kim et al., 2011; Hume & Mort, 2010).

[INSERT FIGURE 1 ABOUT HERE]

Consumer behavior is a function of multiple evaluations arising from a consumption experience. Scholars contended that a multidimensional perspective has a higher predictive power than a unidimensional perspective (Gonçalves et al., 2016; Sheth et al., 1991; Sweeney & Soutar, 2001). Each of the diverse values makes a different contribution depending on the context (Sheth et al., 1991). The relevance of a value differs by contexts (Deng et al., 2010; Williams & Soutar, 2009). Considering the FRS context, in our conceptual framework (see Figure 1), we presume five consumption values as antecedents of attitudes toward FRS: (a) functional, (b) economic, (c) social, (d) emotional, and (e) green values (see Table 1 for definitions, relevance of the FRS context, and related literature). Adopting the approach of Sweeney and Soutar (2001), we distinguish (a) functional value (quality-focused) from (b) economic value (price-focused) (Bei & Simpson, 1995; Sweeney & Soutar, 2001). Given the distinctive importance of functionality and price of a product or service determining attitudes and behaviors, we predict that (a) functional and (b) economic values of FRS will positively influence attitudes. Next, we believe (c) social value of FRS may increase attitudes as consumers can build favorable self-presentation and gain social approval by using the service (McNeil & Venter, 2019). We also postulate that (d) emotional value of FRS will positively form attitudes, in line with prior findings that the motivation of consumer participation in collaborative fashion consumption (CFC) is the enjoyment from the experience (Becker-Leifhold & Iran, 2018). Emotional experiences (e.g., enjoyment) are evidently fundamental to drive clothing consumption across various contexts: fast fashion (Barnes et al., 2013), luxury consumption (Li et al., 2012), and slow fashion (Jung & Jin, 2016). Apart from the values proposed in the original CVT (Sheth et al., 1991), other values are often included to better explain the roles of consumption values in specific consumption domains (Khan & Mohsin, 2017; Yu & Lee, 2019; Ledden, Kalafatis, & Samouel, 2007). Given the relevance of sustainability to the CC context (Becker-Leifhold & Iran, 2018; Hamari et al., 2016; Lang & Joyner Armstrong, 2018; Wang et al., 2018) and a proven link between sustainability perception and attitudes (Hamari et al., 2016), we lastly add (e) green value (Chen & Chang, 2012) in our framework as a contributor to attitudes.

[INSERT TABLE 1 ABOUT HERE]

Consistent with prior literature that shows the positive relationship between the consumption values and attitudes and behavior (Yang & Jolly, 2009; Yu & Lee, 2019; Sweeney & Soutar, 2001), we propose that each value will favorably contribute to attitudes.

H1. Each consumption value (a: functional, b: economic, c: social, d: emotional, and e: green) is positively related to attitudes toward FRS.

Attitudes shape one's behavioral intention (e.g., Theory of Reasoned Action or TRA, Ajzen & Fishbein, 1980). CC research finds that attitudes shaped by perceptions of the service influence behavioral intentions (e.g., Hamari et al., 2016). Positive links between attitudes and behavioral intentions are also observed specifically in rental contexts (e.g., Becker-Leifhold, 2018; Lang, 2018; Lang et al., 2019; Lee & Chow, 2020). Based on multiple studies that examine the positive link between attitudes and behavioral intentions (Yang & Jolly, 2009; Yu & Lee, 2019), the following hypothesis is developed.

H2. Attitudes toward FRS are positively related to adoption intentions.

2.2. Contamination concern

Consumer contamination theory suggests that touching objects that have physical contact with others will transfer some properties from others to the users (Argo et al., 2006). Theoretically, contamination can be either positive or negative, depending on properties or attributes which are expected to be contaminated through physical contact. However, due to hygiene concerns, negative contamination is more dominant such that people have negative responses to objects that have been in contact with others (Argo et al., 2006; Morales & Fitzsimons, 2007; White et al., 2016). As many forms of CC involve products that had physical contact with others, contamination concern is the main barrier to adopting the CC service (Edbring et al., 2016). In addition to the inevitable physical contact with the shared product, lack of familiarity with other users and uncertainty about the hygiene standards of the service providers increase contamination concerns (Hazée et al., 2019).

Contamination concerns are more pronounced for CFC that involves direct contact with one's skin (Armstrong, 2015). Research shows that the acceptance of CFC is negatively influenced by hygiene concerns (Xu et al., 2014; Lang, Seo, & Liu, 2019) lowering evaluations (Hazée et al., 2019). Despite retailers' effort to ward off negative perceptions by providing careful product handling (Park & Joyner Armstrong, 2019b), contamination concerns indeed discourage sharing clothing (Becker-Leifhold & Iran, 2018). Acknowledging the relevance of negative contamination to the CFC context, we investigate how individuals' contamination concerns in an FRS context will affect the hypothesized relationships as a moderator. *2.2.1. Effect of contamination concern on the consumption values–attitudes link*

People have different levels of sensitivity toward potential contamination. When comparing the sensitivity levels of American consumers with Chinese consumers, the former are less concerned about contamination from using clothes contacted by others (Xu et al., 2014). Some Norwegians are reluctant to buy secondhand clothing because of hygiene concerns (Laitala & Klepp, 2018). Within the North American sample, individuals differ in aversive reactions to products that are previously touched by others (Argo et al., 2006) as well as in sensitivity to potential contamination (Kapitan & Bhargave, 2013). Given the findings, we propose that different levels of contamination concerns will moderate how values related to attitudes toward FRS are moderated.

First, when contamination concerns are heightened, functional benefits, such as superior quality of the products and performance-related aspects, may indicate an advantage (Meng &

Leary, 2019; Bezancon et al., 2019). Emphasizing functional benefits comes to the forefront when security-related threats are elevated (McCabe, Vail, Arndt, & Goldenberg, 2014). Accordingly, we suggest that (a) functional value can facilitate the value perceptions of those with high contamination concerns, leading to positive attitudes about the FRS. Second, (b) economic value-attitudes link may be weakened as contamination concerns rise. Huang et al., (2017) revealed that when people are concerned about contamination, their preference for secondhand products becomes lower, whereas willingness to pay increases for new products. Besides, those who buy (vs. those who do not) items at second and clothing stores tend to have lower contamination concerns with higher price sensitivity (Yan et al., 2015). This suggests that the economic value of FRS is differently weighted depending on one's contamination concern. Third, we believe (c) social value may not contribute to attitudes if consumers have high contamination concerns. Research demonstrates that people worried about negative contamination show reduced interest in socializing (Mortensen et al., 2010; Sawada et al., 2018). That is, seeking social approval or recognition may become less important when contamination concerns are high. Fourth, (d) emotional value may be differently related to attitudes depending on contamination concern. As people are more sensitive to sensory and emotional experiences involved in experience goods such as clothing, they prefer new products rather than secondhand products (Fernando et al., 2018). As contamination concerns evoke disgust (Murray & Schaller, 2016), such negative emotional responses may dampen emotional experiences such as the excitement associated with clothing consumption. Lastly, (e) green value may differentially relate to attitudes depending on the contamination concern. Despite the corporate social

responsibility (CSR) that improves company evaluations (Sen & Bhattacharya, 2001), the effects of CSR are moderated by personal relevance (Patel et al., 2017). Moreover, White et al. (2016) found that the negative effect of contamination cues on product attitudes is attenuated when the brand is associated with another green-related cue (e.g., organic products). This suggests that green value may buffer the negative effect of contamination concern. Taken together, we build the following hypothesis:

H3. Contamination concern will moderate the relationships between values (a: functional,b: economic, c: social, d: emotional, and e: green) and attitudes toward FRS.

2.2.2. Effect of contamination concern on the attitudes-adoption intentions link

Favorable attitudes cannot always be translated into behavioral intentions due to an attitude–behavior gap (Boulstridge & Carrigan, 2000). The attitude–behavior relationship can be moderated by various factors (Smith & Swinyard, 1983; Zhou et al., 2013). Although one's belief is often an antecedent of attitude formation, it also can interact with attitude to affect behaviors depending on conflicts or constraints (Fishbein & Ajzen, 1975). For example, risk perception in consuming particular foods weakens the relationship between favorable evaluation and intention (Tuu, Olsen, & Linh, 2011).

A similar mechanism exists regarding contamination concerns. White et al. (2016) showed that the negative effect of contagion cues (e.g., damaged package for the product) on choice behavior is pronounced for those with high sensitivity to contamination. Meng and Leary (2019) also showed that when there is a contamination cue for clothing (e.g., apparel made of recycled materials), consumers with high disgust sensitivity have the lowest purchase intention of the product with the contamination cues. Murray and Schaller (2016) proposed that the behavioral immune system operates in response to potential contamination, making people avoid behaviors toward potentially contaminated objects. Based on these findings, we predict that contamination concerns will weaken the link between attitudes and adoption intentions of FRS.

H4. Contamination concern will moderate (weaken) the relationship between attitudes and adoption intentions toward FRS.

3. Method

3.1. Measures

Measures of adoption intentions and attitudes were taken from Park and Joyner Armstrong (2019a) (e.g., "The likelihood I would use the rental service is high" for adoption intentions, and "I found the rental service is unfavorable/favorable" for attitudes). Functional value was measured with four items (Lee & Chow, 2020); economic value with five items (Guiot & Roux, 2010); green value with three items (Lee & Chow, 2020); social value with three items (Wang et al., 2018); and emotional value adopted from a five-item enjoyment scale (Lang, 2018). Since our model treats economic value separately, one item ("Renting clothing online would enable me to get the apparel I want more cheaply") was deleted from the functional value construct as it may overlap with economic value.

The contamination concern was measured with four items based on the 7-point Likert scale ("not at all dirty" to "very dirty"; "not at all unsanitary" to "very unsanitary"; "not at all contaminated" to "very contaminated"; "was definitely not touched by other people" to "was definitely touched by other people"; White et al., 2016). We measured fashion involvement based

on Choo et al., (2014) and prior experience of using FRS. Unless specified, all items were measured on a 7-point Likert scale (1 = "strongly disagree", 7 = "strongly agree").

3.2. Data collection, sample, and procedure

The sample of the study was taken from a general population of American consumers aged 18 and above. A total of 270 responses ($M_{age} = 35.9$; 48.1% female) were collected using Amazon Mechanical Turk online survey platform. Each participant received \$.50 as incentive. Among all participants, 44.2% were between 26-35 (20.4% of 45-70, 19.0% of 36-45, and 16.4% of 18-25). The majority of participants were Caucasian (73.3%, followed by African Americans: 9.6%, Asians: 9.6%, Hispanics: 5.6%, and others: 1.5%). Most participants were college graduates (74.8%, 13.3% of 'masters or higher degree' and 11.9% of 'those who graduated high school'). The annual income distribution was following: 30.8 % of \$30,000-\$49,999, 30.3% of < \$30,000, 22.2% of > \$70,000, and 16.7% of \$50,000-\$69,999. Only 13.3% of participants had prior experience of using FRS.

At the beginning of the survey, a three-item attention check (Oppenheimer, Meyvis, & Davidenko, 2009) was conducted, and those who successfully responded could proceed to the main survey. After the check, participants were briefed about the survey and then provided consent for participation.

Next, the definition of FRS with a mock advertisement of a service provider¹ was

¹The fashion rental service is not limited to one-time uses (e.g., cocktail dresses), but can fulfill various needs (e.g., suits, luxury bags, domestic designed branded apparel products).

presented. After reading this, each participant rated their adoption intentions and attitudes toward the service, and then completed questionnaires of perceived values and contamination concerns. Other control variables (prior usage and fashion involvement) and demographic information were measured at the end of the survey. The entire process took approximately 7 minutes.

4. Results

4.1. Measurement model

The analysis was conducted using AMOS 22.0 and SPSS 22. As recommended by Anderson and Gerbing (1988), we applied a two-step approach for separate estimation and respecification of the measurement model prior to the analysis of measurement and structural model. In the first stage, a confirmatory factor analysis (CFA) was conducted. In this stage, we detected one item of social value that had a factor loading less than 0.5 ($\gamma = .428$) and thus it was removed to improve the measurement model (Bagozzi & Yi, 1988; Hair et al., 2010).

A CFA was conducted again to determine the validity of the measurement model. As it is recommended to use multiple fit indices for a more holistic view of the goodness of fit (Barrett, 2007), we checked diverse indices for the measurement model fit (χ^2 /df(278)= 1.75, CFI = .975; NFI = .945; TLI = .971; IFI = .976; RMSEA = .053; SRMR = .027) and found most of them have a good fit as recommended (Arbuckle, 2006). The RMSEA of the current model is considered as a close fit of the model using the recommended cut-off value of 0.05 (Browne & Cudeck, 1992; Hu & Bentler, 1999).

Subsequently, convergent and discriminant validity were assessed. The factor loadings of each construct were assessed to examine convergent validity. Table 2 demonstrates Cronbach's alpha (α), composite reliabilities (CR), and average variance extracted (AVE) for each latent construct that was calculated. All factor loadings provide significant evidence of convergent validity (Hair et al., 2010, p. 710) with the AVE for all scales above the suggested value of .50 (Fornell & Larcker, 1981). Cronbach's alpha and CR were calculated to evaluate the reliability of the scales, which all were above the suggested threshold of .70 (Hair et al., 2010). These results indicate that all scales had adequate internal consistency, and the constructs were reliable (Bagozzi & Yi, 1988).

[INSERT TABLE 2 ABOUT HERE]

Table 3 shows the correlations of the latent constructs. The highest correlation between constructs is .846, which is below the recommended value of .850, providing evidence of discriminant validity (Kline, 1998, p. 60). Additionally, comparisons between the correlations of latent constructs and the square roots of AVE also revealed acceptable discriminant validity (Fornell & Larcker, 1981).

[INSERT TABLE 3 ABOUT HERE]

4.2. Common method variance

Since the data for constructs were collected from a single source, there is a possibility of common method bias (CMB) that affects the relationships among constructs. To test CMB, we conducted CFA, including all the constructs in the model and the moderator, contamination concern, as they all are measured in the same manner in the questionnaires (Podsakoff et al., 2003) and had potential to have a shared variance. Following Podsakoff et al. (2003) and Demiray and Burnaz (2019), we applied a common latent factor by adding a new latent variable

to the CFA model with all other constructs linked to it. The square of the path's constrained value indicated a common variance of 0.45. Since the common variance was less than 0.5, it could be concluded that common method bias is not a major issue. Therefore, the study proceeded with the formal testing of the structural model.

4.3. Hypothesis testing

4.3.1. Structural model and hypotheses testing

After confirming the validity and reliability of the measurement model, the hypotheses were tested with structural equation modeling (SEM). The goodness-of-fit indices of the model showed satisfactory values (χ^2 /df(283) = 2.035, CFI = .965; NFI = .934; TLI = .960; IFI = .966; RMSEA = .062).

H1a–H1e suggested that functional, economic, social, emotional, and green value positively affect attitudes. Results supported that functional value had a significant positive effect on attitudes ($\beta = .217$; p < .007), supporting hypothesis H1a. Similarly, economic ($\beta = .184$; p< .025) and emotional values ($\beta = .461$; p < .001) were found to have a significant positive effect on attitudes, supporting hypotheses H1b and H1d, respectively. However, green and social value were not found to be significantly affecting attitudes (p > .05), rejecting H1c and H1e. Attitudes positively affected adoption intentions ($\beta = .835$; p < .001), supporting H2.

4.3.2. Moderating effect of contamination concern

To test the moderating effect of contamination concern, a multi-group SEM analysis was conducted. By the ratings of contamination concern, respondents were median split into subgroups (Raggioto et al., 2019) as being either low (N = 129) or high (N = 141). The two groups significantly differed in their ratings of all values: functional value ($M_{high} = 3.86$ vs. $M_{low} = 4.59$; p < .001); economic value ($M_{high} = 3.90$ vs. $M_{low} = 4.61$; p < .001); emotional value ($M_{high} = 3.31$ vs. $M_{low} = 4.38$; p < .001); social value ($M_{high} = 2.99$ vs. $M_{low} = 3.51$; p < .012); and green value ($M_{high} = 4.57$ vs. $M_{low} = 3.97$; p < .006). Next, we tested measurement invariance for a valid multi-group comparison (Byrne, 2001).

We first examined configural invariance between the two groups by specifying an unconstrained baseline model in which parameters were freely estimated for both groups, yielding an adequate fit of the model to the data ($\chi^2/(566) = 1.81$, CFI = .945; NFI = .886; TLI = .937; IFI = .946; RMSEA = .055). Thus, configural invariance was supported between the low and high groups. Next, metric invariance between the two groups was assessed by specifying a constrained model in which all of the factor loadings were equal among the two groups. The result of the chi-square difference test between the unconstrained model and measurement weights model was $\Delta \gamma_2(19) = 13.485$, p = .813. The non-significant change in model fit indicated that the factor loadings were invariant between the two groups, confirming full metric invariance. As our prediction on the moderating effect of contamination concern was made on the relevant structural model path, we compared the difference between the measurement weight model and the structural weight model. The result was $\Delta \chi_2(6) = 16.035$, p < .014), indicating the structural weight model significantly differs from the measurement weight model. Thus, we proceeded to the comparison of each path by group.

To examine paths that show significant differences between the lows and highs of contamination concern groups, each path was separately tested using a chi-square difference

between the constrained and the unconstrained model. Table 4 summarizes the standardized path coefficients for each of the groups and the results of the chi-square difference test, which illustrates significant differences between the paths of the two groups (high vs. low).

[INSERT TABLE 4 ABOUT HERE]

The link between functional value and attitudes was significant only for the high group (β = .374, p < .001) but not for the low group (p > .05) ($\Delta \gamma_2(1) = 4.785$, p < .030). On the other hand, the link between economic value and attitudes was significant only for the low group (β = .477, p < .01; $\Delta \chi_2(1) = 4.454$, p = .035). The effect of social value on attitude was not found in both groups, with no difference in path strength by contamination concern (p > 0.05). With the emotional value-attitude link significant for both high ($\beta = .434$, p < .001) and low ($\beta = .447$, p< .001) groups, no significant difference in path strength was detected by contamination concern (p > .05). Green value, which was not significant in the full model, was found to significantly influence attitudes for the high group ($\beta = .164$, p < .05), but not the low group with significant difference in path strength ($\Delta \chi_2(1) = 4.358, p < .037$). The attitude-adoption intention link was significant for both high ($\beta = .768, p < .001$) and low ($\beta = .877, p < .001$) groups, with the effect significantly stronger for those with low contamination concern ($\Delta \chi_2(1) = 5.894, p < .015$). Taken together, the moderating effect of contamination concern on the relationship between consumption values and attitudes was partially supported (H3a, H3b, H3e), and the moderating effect was supported for the relationship between attitudes and adoption intention (H4). Figure 2 depicts the standardized estimates and their significance between the relevant constructs.

[INSERT FIGURE 2 ABOUT HERE]

5. General Discussion

5.1. Summary of findings

This research investigates how attitudes and behavioral intentions toward FRS are shaped by diverse values consumers perceive based on CVT integrated with contamination theory. Specifically, the framework explores diverse values of FRS, namely, functional, economic, emotional, social, and green values, and their unique contribution to consumers' favorable attitudes to predict adoption of the service. The moderating effect of contamination concern in these relationships is tested in the model. In summary, the results illustrate that functional, economic, and emotional values are essential to building positive attitudes toward FRS. Depending on one's contamination concerns, however, each consumption value affects attitudes differently.

Our results show that among the proposed values, emotional value is the most influential in building consumers' positive attitudes toward FRS regardless of contamination concern. Benoit et al. (2017) suggested that consumers may find hedonic value by using otherwise unaffordable items. Indeed, enjoyment is one of the strongest contributors to attitudes toward CC in general (Hamari et al., 2016) as well as to domain-specific attitudes toward fashion rental (Lang et al., 2019). Enjoyment is known as a strong driver of consumers' participation in CC, particularly clothing consumption (Becker-Leifhold & Iran, 2018). This is because consumers find the process of renting as a way of treasure hunting that offers the greatest fulfillment and desired outcome at the lowest cost (Lang et al., 2019). In this process, consumers enjoy not only the outcomes of renting but also the process as "a playable activity" to build their own infinite closet. Unlike our prediction, regardless of different levels of contamination concern, emotional value has the strongest and most significant influence on attitudes. This is in line with prior research that emphasizes the importance of emotional value to green consumption (Lin & Huang, 2012). Following emotional value, functional and economic values affect attitudes positively. This supports previous findings that convenience and functional reasons are the main drivers of CC participation (Barnes & Mattsson, 2016; Park & Joyner Armstrong, 2017). Economic motives have a substantial role in consumers' participation in CC (Barnes & Mattsson, 2016; Benoit et al., 2017; Park & Joyner Armstrong, 2017).

Unexpectedly, social and green values of fashion renting do not affect attitudes. Social value in fashion consumption is considered vital because fashion items are highly visible and easily influenced by social norms (e.g., O'Cass & McEwen, 2004). However, considering that social value in the current study is conceptualized and measured regarding the activity of renting rather than the social value that procured items provide, that social value such as feeling accepted or making a good impression is rated low is not surprising. Social value does not have a much impact on attitudes. The non-significant effect of social value is consistent with prior findings in sustainable consumption (Lin & Huang, 2012; Yu & Lee, 2019). On the contrary, our result shows green value as one of the highest values perceived toward FRS², yet it has no significant

²The mean score of social value is the lowest among the values of online clothing rental service and the only one that is significantly lower than the midpoint of the scale, 4 (t(269) = -7.35, p < .001).

effect on attitudes³. Although CC is closely associated with green value (Hamari et al., 2016), recent research shows that CFC users do not mention an environmental motive for their consumption (Park & Joyner Armstrong, 2019b). Fashion renting may remind people of the idea of an infinite closet, rather than green consumption. Interests in fashion renting may not necessarily be boosted by perceiving the environmental benefits of fashion renting.

Interestingly, the moderating role of contamination concern reveals that the effect of functional value on attitudes is pronounced among those with high contamination concern. By contrast, economic value becomes salient in increasing attitudes for those with low contamination concern. The unique contributions of functional versus economic values to attitudes of consumers with high versus low contamination concern suggest that depending on the contamination concern, the relative importance of these consumption values differ. To further examine this prediction, we conducted a follow-up study (N = 120, $M_{age} = 31.99$, 40% female). We employed a 2 (message appeal: functional vs. economic) x measured contamination concern design, with the message appeal manipulated as between-subjects, to see if the effectiveness of a different message appeal on attitudes varies by individual's contamination concerns (see Supplementary materials for the details of the experiment). The regression analysis controlling for prior usage experience and income reveals the significant interaction between appeal type and contamination concern (b = .51, p < .014), with the main effect of appeal type (0 =

³The mean score of green value is significantly higher than the midpoint of the scale, 4 (t(269) = 2.36, p < .019).

"economic," 1 = "functional") non-significant, (b = .09, p > .667) and the main effect of contamination concern significant (b = -.61, p < .001). Specifically, those with high contamination concern (+1 *SD*) show more favorable attitudes when exposed to the functional appeal ($M_{\text{functional}} = 5.86$) than the economic appeal ($M_{\text{economic}} = 5.25; b = .60, p < .041$). By contrast, those with low contamination concern (-1.28 *SD*) have more favorable attitudes when exposed to the economic appeal ($M_{\text{economic}} = 6.48$) compared with the functional appeal ($M_{\text{functional}} = 6.05; b = -.57, p < .086$) (see Figure 3).

[INSERT FIGURE 3 ABOUT HERE]

Taken together, the findings suggest that even those who have high contamination concern can develop favorable attitudes toward FRS when they recognize values related to quality and sustainability. By contrast, for those who are less sensitive to contamination, attitudes are strongly influenced by the attractiveness of price.

5.2. Theoretical implications

Our findings render insightful theoretical implications. First, basing on the wellestablished CVT (Sheth et al., 1991), we investigated the consumption value of FRS among the current and potential users. Although prior research of CVT primarily examines the direct link between perceived values and behavioral intention (Lee & Han, 2015; Hyun & Fairhurst, 2018; Kaur et al., 2018), we included attitudes as an antecedent to deepen the understanding of how adoption of a relatively new service is shaped via attitudes that are formed by diverse values. By incorporating contamination theory into CVT, the implications of how values affect attitudes, and attitudes–behavioral intention link become rich, advancing the existing CVT and TRA literature.

Second, this study is the first to explore the moderating role of contamination concern in the context of shared consumption, including FRS. Although scholars recognized contamination concern as a barrier to shared consumption (Becker-Leifhold & Iran, 2018; Lang, 2018), they concentrated on examining a negative relationship between contamination and acceptance of products (e.g., Argo et al., 2006; Xu et al., 2014). The present study advances the existing literature, which simply focuses on how to reduce the negative impact of contamination concern of access-based consumption (Hazée et al., 2019). Furthermore, the findings on the moderated effect of attitudes on behavioral intentions extend the existing literature of attitudes–behavior link leveraging on consumption contamination theory. The finding that the attitude–behavior intention link becomes weaker for those with high (vs. low) contamination concern suggests that they are less likely to adopt services despite holding positive attitudes.

Methodologically, this study exhibits robustness when the model is tested by adopting two approaches: SEM and experiment. For an exploratory purpose in the first stage, our predictions on paths were tested on the overall model using a comprehensive SEM analysis. As a confirmatory approach, the findings from the exploratory stage were replicated using experimental design in a follow-up study. The median-split group comparison (high vs. low of contamination concern) in the SEM was also backed up with the use of continuous measure in regression analysis in the follow-up study. The replication validates the generalizability of findings and strengthens the validity of our findings.

5.3. Practical implications

This research provides useful insights into promoting FRS by highlighting meaningful values to build favorable attitudes and increase adoption intentions. First, marketers in the fashion rental industry should focus on emotional value via the rental service as it is the most influential factor on the attitudes. The emotional aspects of the service can be emphasized with diverse communication and promotion methods. For example, a company may highlight advertisement messages that renting trendy and unique fashion items can bring positive hedonic experiences such as excitement and enjoyment. Marketers and retailers should also clearly deliver functional and economic values via the FRS to shape positive attitudes. Despite the emotional value, if FRS providers cannot ensure the quality of the products, convenience of the service, and monetary values, they may not survive in the long run.

Moreover, this investigation provides novel insights that can aid practitioners in the fashion rental industry in devising an effective way to approach potential consumers with contamination concerns. We recommend practitioners to carefully communicate the values of FRS by considering consumer segments: contamination-susceptible versus unsusceptible consumers. By recognizing the distinct aspects of FRS that each consumer group appreciates, the negative expectations of contamination from renting clothing and products that are subject to contact with other users (e.g., cars, houses) may be handled. Specifically, contamination-susceptible consumers may not be the typical target of companies offering CC opportunities. However, even for those who are sensitive to negative contamination from CC, favorable attitudes may be developed if companies can demonstrate values related to the quality of products or services, environmental impact, and emotional experiences of the service. By

contrast, for consumers who are less sensitive about negative contamination, companies can utilize an appeal based on economic and emotional values.

In addition, although previous research presents inconsistent results regarding the impact of environmental benefits on attitudes and behavior intention (e.g., Barnes & Mattsson, 2016), our findings reveal that identifying different consumer segments based on contamination concern can help companies strategically adopt the green appeal for consumer groups sensitive to the environmental impact of CC.

Furthermore, as the COVID-19 pandemic has led to dramatic changes in consumer behavior for online and offline activities (Pantano et al., 2020; Roggeeven & Sethuraman, 2020), consumers have become increasingly concerned about potential contamination (Kirk & Rifkin, 2020). Prior to COVID-19, FRS was one of the most promising businesses in the fashion industry in light of the sharing economy. It was a general consensus that consumers with high contamination concern were rarely the target market of FRS. However, with the current pandemic situation, not only FRS but also the businesses of CC need to embrace people with high contamination concerns. Our findings suggest a way of communicating the values of CC to consumers.

To respond to consumers with heightened contamination concerns, we recommend businesses to emphasize functional, emotional, and green values to enhance the attitudes about FRS. Nonetheless, our findings show that the high contamination concern weakens the relationship between attitudes and adoption intention, so practitioners should make an additional effort to transfer positive attitudes to behaviors successfully. With the uncertainty about the future of COVID-19 that may last even for a decade until the development of the vaccine (Wan & Johnson, 2020), consumers' heightened hygiene concern and worry of contamination may also persist for a relatively long time. In addition to perceptions, the actual buying behaviors have been changed, which may persist even postpandemic (Sheth, 2020). Albeit uncertainty about the future, our findings provide guidance regarding which values are more appropriate to communicate, considering the contamination concerns of target consumers.

5.4. Limitations and future research

As with any study, this work has inherent limitations. First, using a US sample limits generalizability and calls for validation with different samples, urging future research to adopt diverse participant panels. In addition, owing to the nature of the study and the relatively low penetration of the online FRS in the market, we measured intentions instead of actual adoption behavior. Although previous research often uses adoption intention as a proxy of actual adoption behavior for a relatively new product or service in the market (Lee & Han, 2015; Yang & Jolly, 2009; Wang et al., 2018), future research should measure the actual adoption behaviors to ensure generalizability of the current findings to actual consumption behaviors.

In our empirical investigation, we captured the variation in contamination concerns as individual differences. However, a situational factor such as the recent COVID-19 pandemic can increase the contamination concerns (Kirk & Rikfin, 2020). Seeing that our data collection was completed before the pandemic, the generalizability of our findings to the pandemic situation should be tested to establish how consumers respond to FRS and other CC services in other product categories due to the situationally heightened contamination concerns compared with pre-pandemic or post-pandemic.

Future research can extend our model to the relationship between values and long-term commitment or continuance intention of the service. Substantial evidence supports that consumers' value perception has long-term effects such as consumer commitment (i.e., long-term behavioral loyalty) and post-purchase beliefs. For example, in the post-purchase stage, consumer value can impact commitment via post-purchase satisfaction and trust (Moliner et al., 2007). Future research can investigate the long-term effects of consumer values, such as commitment, on online clothing rental services, which can provide a complete picture of the role of consumer values in the growth of collaborative clothing consumption.

Finally, as fast-fashion brands such as *H&M* enter the FRS market, which is currently monopolized by designer and luxury brand merchandise, investigating how various consumption values are influenced by the image of an original brand or particular factors such as price or style will be interesting. Consumers may perceive the values of FRS that feature moderately priced products differently from those with high-priced products. Future research can address these differences.

References

- Adams, O. (2019, December). Good news, the eco-friendly fashion rental industry is booming. (Retrieved February 27, 2020, from) <u>https://www.marieclaire.co.uk/news/fashion-news/eco-fashion-industry-rental-677169</u>
- Ajzen, I., & Fishbein, M. (1980). Understanding attitudes and predicting social behavior.Englewood Cliffs, NJ: Prentice-Hall.
- Anderson, J. C., & Gerbing, D. W. (1988). Structural equation modeling in practice: A review and recommended two-step approach. *Psychological Bulletin*, *103*(3), 411-423.

Arbuckle, J. (2006). Amos 7.0 user's guide. Marketing Division, SPSS Incorporated.

- Argo, J. J., Dahl, D. W., & Morales, A. C. (2006). Consumer contamination: How consumers react to products touched by others. *Journal of Marketing*, *70*(2), 81-94.
- Armstrong, C. M., Niinimäki, K., Kujala, S., Karell, E., & Lang, C. (2015). Sustainable productservice systems for clothing: exploring consumer perceptions of consumption alternatives in Finland. *Journal of Cleaner Production*, 97, 30-39.
- Bagozzi, R. P., & Yi, Y. (1988). On the evaluation of structural equation models. *Journal of the Academy of Marketing Science*, *16*(1), 74-94.
- Bardhi, F., & Eckhardt, G. M. (2017). Liquid consumption. *Journal of Consumer Research*, 44(3), 582-597.
- Barnes, L., Lea-Greenwood, G., Gabrielli, V., Baghi, I., & Codeluppi, V. (2013). Consumption practices of fast fashion products: a consumer-based approach. *Journal of Fashion Marketing and Management*, 17(2), 206-224.

- Barnes, S. J., & Mattsson, J. (2016). Understanding current and future issues in collaborative consumption: A four-stage Delphi study. *Technological Forecasting and Social Change*, 104, 200-211.
- Barrett, P. (2007). Structural equation modelling: Adjudging model fit. *Personality and Individual Differences*, 42(5), 815-824.
- Becker-Leifhold, C., & Iran, S. (2018). Collaborative fashion consumption–drivers, barriers and future pathways. *Journal of Fashion Marketing and Management*, *22*(2), 189-208.
- Becker-Leifhold, C. V. (2018). The role of values in collaborative fashion consumption-A critical investigation through the lenses of the theory of planned behavior. *Journal of Cleaner Production*, 199, 781-791.
- Bei, L., & Simpson, E. M. (1995). The Determinants of Consumers' Purchase Decisions for Recycled Products: an Application of Acquisition-Transaction Utility Theory. Advances in Consumer Research, 22, 257-261.
- Benoit, S., Baker, T. L., Bolton, R. N., Gruber, T., & Kandampully, J. (2017). A triadic framework for collaborative consumption (CC): Motives, activities and resources & capabilities of actors. *Journal of Business Research*, 79, 219-227.
- Bezançon, M., Guiot, D., & Le Nagard, E. (2019). The role of negative physical contagion in the online purchase of second-hand products. *Recherche et Applications en Marketing* (English Edition), 2051570719881944.
- Bond, S. (2020, June 1). Who Dares To Rent A Dress Now? Coronavirus Upends The Sharing Economy, NPR. (Retrieved June 9, 2020 from)

https://www.npr.org/2020/06/01/865516558/who-dares-to-rent-a-dress-now-coronavirusupends-the-sharing-economy/

- Boulstridge, E., & Carrigan, M. (2000). Do consumers really care about corporate responsibility? Highlighting the attitude-behaviour gap. *Journal of Communication Management*, *4*(4), 355-368.
- Browne, M. W., & Cudeck, R. (1992). Alternative ways of assessing model fit. *Sociological Methods & Research*, 21(2), 230-258.
- Byrne, B. M. (2001). Structural equation modeling with AMOS, EQS, and LISREL: Comparative approaches to testing for the factorial validity of a measuring instrument. *International Journal of Testing*, *1*(1), 55-86.
- Camacho-Otero, J., Boks, C., & Pettersen, I. N. (2019). User acceptance and adoption of circular offerings in the fashion sector: Insights from user-generated online reviews. *Journal of Cleaner Production, 231*, 928-939.
- Chang, E. C., & Tseng, Y. F. (2013). Research note: E-store image, perceived value and perceived risk. *Journal of Business Research*, *66*(7), 864-870.
- Chen, Y. S., & Chang, C. H. (2012). Enhance green purchase intentions: The roles of green perceived value, green perceived risk, and green trust. *Management Decision*, *50*(3), 502-520.
- Chen, Z., & Dubinsky, A. J. (2003). A conceptual model of perceived customer value in ecommerce: A preliminary investigation. *Psychology & Marketing*, *20*(4), 323-347.
- Choo, H. J., Sim, S. Y., Lee, H. K., & Kim, H. B. (2014). The effect of consumers' involvement and innovativeness on the utilization of fashion wardrobe. *International Journal of Consumer*

Studies, 38(2), 175-182.

- Cronin Jr, J. J., Brady, M. K., & Hult, G. T. M. (2000). Assessing the effects of quality, value, and customer satisfaction on consumer behavioral intentions in service environments. *Journal of Retailing*, *76*(2), 193-218.
- Demiray, M., & Burnaz, S. (2019). Exploring the impact of brand community identification on Facebook: Firm-directed and self-directed drivers. *Journal of Business Research*, *96*, 115-124.
- Deng, Z., Lu, Y., Wei, K. K., & Zhang, J. (2010). Understanding customer satisfaction and loyalty: An empirical study of mobile instant messages in China. *International Journal of Information Management*, 30(4), 289-300.
- Durgee, J. F., & O'Connor, C. G. (1995). An exploration into renting as consumption behavior. *Psychology & Marketing*, 12(2), 89-104.
- Edbring, E. G., Lehner, M., & Mont, O. (2016). Exploring consumer attitudes to alternative models of consumption: motivations and barriers. *Journal of Cleaner Production*, *123*, 5-15.
- Fernando, A. G., Sivakumaran, B., & Suganthi, L. (2018). Comparison of perceived acquisition value sought by online second-hand and new goods shoppers. *European Journal of Marketing*, 52(7/8), 1412-1438.
- Fishbein M., Ajzen I. (1975). Belief, Attitude, Intention and Behaviour: An Introduction to Theory and Research. Reading, Mass.: Addison-Wesley.
- Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, *18*(1), 39-50.

Gonçalves, H. M., Lourenço, T. F., & Silva, G. M. (2016). Green buying behavior and the theory

of consumption values: A fuzzy-set approach. *Journal of Business Research*, 69(4), 1484-1491.

- Guiot, D., & Roux, D. (2010). A second-hand shoppers' motivation scale: Antecedents, consequences, and implications for retailers. *Journal of Retailing*, *86*(4), 355-371.
- Hair, J. F., Anderson, R. E., Babin, B. J., & Black, W. C. (2010). Multivariate data analysis: A global perspective (Vol. 7).
- Hamari, J., Sjöklint, M., & Ukkonen, A. (2016). The sharing economy: Why people participate in collaborative consumption. *Journal of the Association for Information Science and Technology*, 67(9), 2047-2059.
- Hazée, S., Van Vaerenbergh, Y., Delcourt, C., & Warlop, L. (2019). Sharing Goods? Yuck, No! An investigation of consumers' contamination concerns about access-based services. *Journal of Service Research*, 22(3), 256-271.
- Hu, L. T., & Bentler, P. M. (1999). Cutoff criteria for fit indexes in covariance structure analysis:
 Conventional criteria versus new alternatives. *Structural Equation Modeling: A Multidisciplinary Journal*, 6(1), 1-55.
- Huang, J. Y., Ackerman, J. M., & Sedlovskaya, A. (2017). (De) contaminating product preferences: A multi-method investigation into pathogen threat's influence on used product preferences. *Journal of Experimental Social Psychology*, 70, 143-152.
- Hume, M., & Mort, G. S. (2010). The consequence of appraisal emotion, service quality, perceived value and customer satisfaction on repurchase intent in the performing arts. *Journal of Services Marketing*, *24*(2), 170-182.

- Hyun, J., & Fairhurst, A. (2018). Understanding consumers' purchasing behavior of ethnically disparate products. *Journal of Consumer Behaviour*, *17*(1), e114-e126.
- H&M (2019, October). H&M to trial clothing rentals for the first time. (Retrieved February 27, 2020, from) <u>https://about.hm.com/news/general-news-2019/h-m-to-trial-clothing-rentals-for-the-first-time.html</u>
- Jung, S., & Jin, B. (2016). Sustainable development of slow fashion businesses: Customer value approach. *Sustainability*, 8(6), 540.
- Kapitan, S., & Bhargave, R. (2013). Navigating residue sensitivity in the used goods marketplace. *Psychology & Marketing*, 30(4), 305-317.
- Kaur, P., Dhir, A., Rajala, R., & Dwivedi, Y. (2018). Why people use online social media brand communities: A consumption value theory perspective. *Online Information Review*, 42(2), 205-221.
- Kim, H. W., Gupta, S., & Koh, J. (2011). Investigating the intention to purchase digital items in social networking communities: A customer value perspective. *Information & Management*, 48(6), 228-234.
- Kirk, C. P., & Rifkin, L. S. (2020). I'll Trade You Diamonds for Toilet Paper: Consumer Reacting, Coping and Adapting Behaviors in the COVID-19 Pandemic. *Journal of Business Research*, 117, 124-131.
- Khan, S. N., & Mohsin, M. (2017). The power of emotional value: Exploring the effects of values on green product consumer choice behavior. *Journal of Cleaner Production*, 150, 65-74.

- Kline, R. B. (1998). Software review: Software programs for structural equation modeling: Amos, EQS, and LISREL. *Journal of Psychoeducational Assessment*, *16*(4), 343-364.
- Laitala, K., & Klepp, I. G. (2018). Motivations for and against second-hand clothing acquisition. *Clothing Cultures*, 5(2), 247-262.
- Lang, C. (2018). Perceived risks and enjoyment of access-based consumption: Identifying barriers and motivations to fashion renting. *Fashion and Textiles*, *5*(1), 23.
- Lang, C., & Joyner Armstrong, C. M. (2018). Collaborative consumption: The influence of fashion leadership, need for uniqueness, and materialism on female consumers' adoption of clothing renting and swapping. *Sustainable Production and Consumption*, 13, 37-47.
- Lang, C., Seo, S., & Liu, C. (2019). Motivations and obstacles for fashion renting: a crosscultural comparison. *Journal of Fashion Marketing and Management*, 23(4), 519-536.
- Ledden, L., Kalafatis, S. P., & Samouel, P. (2007). The relationship between personal values and perceived value of education. *Journal of Business Research*, *60*(9), 965-974
- Lee, E., & Han, S. (2015). Determinants of adoption of mobile health services. *Online Information Review*, *39*(4), 556-573.
- Lee, S. H., & Chow, P. S. (2020). Investigating consumer attitudes and intentions toward online fashion renting retailing. *Journal of Retailing and Consumer Services*, *52*, 101892.
- Li, G., Li, G., & Kambele, Z. (2012). Luxury fashion brand consumers in China: Perceived value, fashion lifestyle, and willingness to pay. *Journal of Business Research*, 65(10), 1516-1522.
- Lin, P. C., & Huang, Y. H. (2012). The influence factors on choice behavior regarding green

products based on the theory of consumption values. *Journal of Cleaner Production*, 22(1), 11-18.

- Loussaïef, L., Ulrich, I., & Damay, C. (2019). How does access to luxury fashion challenge selfidentity? Exploring women's practices of joint and non-ownership. *Journal of Business Research*, *102*, 263-272.
- McCabe, S., Vail III, K. E., Arndt, J., & Goldenberg, J. L. (2014). Hails from the crypt: A terror management health model investigation of the effectiveness of health-oriented versus celebrity-oriented endorsements. *Personality and Social Psychology Bulletin, 40*(3), 289-300.
- McDowell, M. (2019, November). What to know about "clothing as a service. (Retrieved February 27, 2020, from) <u>https://www.voguebusiness.com/technology/clothing-as-service-caas-rental-rent-the-runway</u>
- McNeill, L., & Venter, B. (2019). Identity, self-concept and young women's engagement with collaborative, sustainable fashion consumption models. *International Journal of Consumer Studies*, *43*(4), 368-378.
- Meng, M. D., & Leary, R. B. (2019). It might be ethical, but I won't buy it: Perceived contamination of, and disgust towards, clothing made from recycled plastic bottles. *Psychology & Marketing*, DOI: 10.1002/mar.21323.
- Meyersohn, N. (2019, August). First on CNN Business: Banana Republic joins the clothing rental craze. (Retrieved February 27, 2020, from)

https://edition.cnn.com/2019/08/16/business/banana-republic-clothing-rental/index.html

Moliner, M. A., Sánchez, J., Rodríguez, R. M., & Callarisa, L. (2007). Perceived relationship

quality and post-purchase perceived value: An integrative framework. *European Journal of Marketing*, *41*(11/12), 1392-1422.

- Morales, A. C., & Fitzsimons, G. J. (2007). Product contagion: Changing consumer evaluations through physical contact with "disgusting" products. *Journal of Marketing Research*, 44(2), 272-283.
- Mortensen, C. R., Becker, D. V., Ackerman, J. M., Neuberg, S. L., & Kenrick, D. T. (2010). Infection breeds reticence: The effects of disease salience on self-perceptions of personality and behavioral avoidance tendencies. *Psychological Science*, 21(3), 440-447.
- Murray, D. R., & Schaller, M. (2016). The behavioral immune system: Implications for social cognition, social interaction, and social influence. *Advances in Experimental Social Psychology*, 53, 75-129.
- O'Cass, A., & McEwen, H. (2004). Exploring consumer status and conspicuous consumption. Journal of Consumer Behaviour, 4(1), 25-39.
- Oppenheimer, D. M., Meyvis, T., & Davidenko, N. (2009). Instructional manipulation checks: Detecting satisficing to increase statistical power. *Journal of Experimental Social Psychology*, 45(4), 867-872.
- Pantano, E., Pizzi, G., Scarpi, D., & Dennis, C. (2020). Competing during a pandemic? Retailers' ups and downs during the COVID-19 outbreak. *Journal of Business Research*, *116*, 209-213.
- Park, E. J., Kim, E. Y., Funches, V. M., & Foxx, W. (2012). Apparel product attributes, web browsing, and e-impulse buying on shopping websites. *Journal of Business Research*, 65(11), 1583-1589.

- Park, H., & Joyner Armstrong, C. M. J. (2017). Collaborative apparel consumption in the digital sharing economy: An agenda for academic inquiry. *International Journal of Consumer Studies*, 41(5), 465-474.
- Park, H., & Joyner Armstrong, C. M. J. (2019a). Will "no-ownership" work for apparel?:Implications for apparel retailers. *Journal of Retailing and Consumer Services*, 47, 66-73.
- Park, H., & Joyner Armstrong, C. M. J. (2019b). Is money the biggest driver? Uncovering motives for engaging in online collaborative consumption retail models for apparel. *Journal of Retailing and Consumer Services*, 51, 42-50.
- Patel, J. D., Gadhavi, D. D., & Shukla, Y. S. (2017). Consumers' responses to cause related marketing: moderating influence of cause involvement and skepticism on attitude and purchase intention. *International Review on Public and Nonprofit Marketing*, 14(1), 1-18.
- Podsakoff, P. M., MacKenzie, S. B., Lee, J. Y., & Podsakoff, N. P. (2003). Common method biases in behavioral research: a critical review of the literature and recommended remedies. *Journal of Applied Psychology*, 88(5), 879-903.
- Raggiotto, F., Scarpi, D., & Mason, M. C. (2019). Faster! More! Better! Drivers of upgrading among participants in extreme sports events. *Journal of Business Research*, *102*, 1-11.
- Roggeveen, A. L., & Sethuraman, R. (2020). How the COVID Pandemic May Change the World of Retailing. *Journal of Retailing*, *96*(2), 169-171.
- Sawada, N., Auger, E., & Lydon, J. E. (2018). Activation of the behavioral immune system:
 Putting the brakes on affiliation. *Personality and Social Psychology Bulletin*, 44(2), 224-237.
 Sen, S., & Bhattacharya, C. B. (2001). Does doing good always lead to doing better? Consumer

reactions to corporate social responsibility. Journal of Marketing Research, 38(2), 225-243.

- Sheth, J. N., Newman, B. I., & Gross, B. L. (1991). Why we buy what we buy: A theory of consumption values. *Journal of Business Research*, 22(2), 159-170.
- Sheth, J. (2020). Impact of Covid-19 on Consumer Behavior: Will the Old Habits Return or Die? Journal of Business Research, 117, 280-283.
- Smith, S., & Paladino, A. (2010). Eating clean and green? Investigating consumer motivations towards the purchase of organic food. *Australasian Marketing Journal*, *18*(2), 93-104.
- Smith, R. E., & Swinyard, W. R. (1983). Attitude-behavior consistency: The impact of product trial versus advertising. *Journal of Marketing Research*, 20(3), 257-267.
- Sweeney, J. C., & Soutar, G. N. (2001). Consumer perceived value: The development of a multiple item scale. *Journal of Retailing*, 77(2), 203-220.
- Tuu, H. H., Olsen, S. O., & Linh, P. T. T. (2011). The moderator effects of perceived risk, objective knowledge and certainty in the satisfaction-loyalty relationship. *Journal of Consumer Marketing*, 28(5), 363-375.
- Wan, W., & Johnson, C. Y. (2020, May 28). Coronavirus may never go away, even with a vaccine. *The Washington Post*. (Retrieved June 10, 2020, from)

https://www.washingtonpost.com/health/2020/05/27/coronavirus-endemic/

Wang, Y., Douglas, M. A., Hazen, B. T., & Dresner, M. (2018). Be green and clearly be seen:
How consumer values and attitudes affect adoption of bicycle sharing. *Transportation Research Part F: Traffic Psychology and Behaviour, 58, 730-742.*

White, K., Lin, L., Dahl, D. W., & Ritchie, R. J. (2016). When do consumers avoid

imperfections? Superficial packaging damage as a contamination cue. *Journal of Marketing Research*, 53(1), 110-123.

- Williams, P., & Soutar, G. N. (2009). Value, satisfaction and behavioral intentions in an adventure tourism context. *Annals of Tourism Research*, 36(3), 413-438.
- Woodruff, R. B. (1997). Customer value: The next source of competitive advantage. *Journal of the Academy of Marketing Science*, 25(2), 139-153.
- Xu, Y., Chen, Y., Burman, R., & Zhao, H. (2014). Second-hand clothing consumption: a crosscultural comparison between American and Chinese young consumers. *International Journal of Consumer Studies*, *38*(6), 670-677.
- Yan, R. N., Bae, S. Y., & Xu, H. (2015). Second-hand clothing shopping among college students: the role of psychographic characteristics. *Young Consumers*, 16(1), 85-98.
- Yang, K., & Jolly, L. D. (2009). The effects of consumer perceived value and subjective norm on mobile data service adoption between American and Korean consumers. *Journal of Retailing* and Consumer Services, 16(6), 502-508.
- Yu, S., & Lee, J. (2019). The effects of consumers' perceived values on intention to purchase upcycled products. *Sustainability*, *11*(4), 1034.
- Zeithaml, V. A. (1988). Consumer perceptions of price, quality, and value: a means-end model and synthesis of evidence. *Journal of Marketing*, *52*(3), 2-22.
- Zhou, Y., Thøgersen, J., Ruan, Y., & Huang, G. (2013). The moderating role of human values in planned behavior: the case of Chinese consumers' intention to buy organic food. *Journal of Consumer Marketing*, *30*(4), 335-344.

1				
Definition of	Relevance in the FRS	Relevant literature		
consumption value	context			
 a. functional: "the perceived utility acquired from an alternative's capacity for functional, utilitarian, or physical performance" (Sheth et al., 1991) b. economic: "the utility derived from the product due to the reduction of its perceived short- and longer-term costs" (Sweeney 	Functional benefits of convenient online shopping and positive product quality perception Cost-effective to use the same fashion items	Online outlets offer convenient and easy access to a greater range of desirable items, saving time and resources (Park et al., 2012; Park & Joyner Armstrong, 2017; Park & Joyner Armstrong, 2019b). Quality perception contributes to positive attitudes (Smith & Paladino, 2010). Economic benefits are a major driver of CC (Barnes & Mattsson, 2016; Park & Joyner Armstrong, 2017; Camacho- Otero, Boks, & Pettersen, 2019) and		
& Soutar, 2001); "value for money" (Zeithaml, 1988)		CFC (Park & Joyner Armstrong, 2019b).		
c. social : "the perceived utility acquired from an alternative's association with one or more specific social groups" (Sheth et al., 1991)	Favorable self- presentation and social approval by using FRS	Consumers obtain social acceptance by participating in collaborative fashion consumption such as second-hand purchase (McNeil & Venter, 2019)		
d. emotional : "the perceived utility acquired from an alternative's capacity to arouse feelings or affective states" (Sheth et al., 1991)	Enjoyment and positive emotional experiences from the service	Emotional value is highly related to consumers' clothing consumption in various contexts: fast fashion (e.g., Barnes et al., 2013); luxury consumption (e.g., Li et al., 2012); slow fashion (e.g., Jung & Jin, 2016).		
e. green: "a consumer's overall appraisal of the net benefit of a product or service between what is received and what is given based on the consumer's environmental desires, sustainable expectations, and green needs" (Chen & Chang, 2012)	Contribution to environmental sustainability	Green (or environmental) value positively influences attitudes and behavioral intentions (e.g., Yu & Lee, 2019; Khan & Mohsin, 2017; Chen & Chang, 2012). The perceived sustainability of CC is directly related to favorable attitudes (Hamari et al., 2016).		

Table 1 Summary of definition, relevance in the FRS context, and relevant literature for five consumption values

Factor	Items	Factor loading	Cronba ch's α	AVE	CR
Functional	Renting clothing online would enable me to get the apparel I want more quickly.	.894 ¹			
Value (M= 4.20,	Renting clothing online would enhance my effectiveness in getting the apparel I want.	.932*	.941	.841	.941
SD = 1.75)	Renting clothing online would enable me to get the apparel I want more easily.	.925*			
	I can use more clothing because I pay less for renting clothing.	.869*			
Economic	One can wear more clothing for the same amount of money if one rents clothing.	.724*			
Value (M= 4.24,	I feel that I have lots of clothing for not much money by renting them.	.838*	.875	.611	.884
SD = 1.41)	I don't want to pay more for a clothing just because it's new.	.542*			
	By renting clothing, I feel l I'm paying a fair price for clothing.	.884 ¹			
Social Value (M= 3.24, SD = 1.69)	Renting clothing online would help me feel accepted.	.927 ¹	000	007	000
	Renting clothing online would make a good impression on other people.	.869*	.892	.807	.893
	I found it would be fun to rent clothing online.	.924*			
Emotional	I would be enjoying renting clothing online	953*			
Value	Renting clothing online would be a real pleasure	.955 967*			
(M= 3.82 , SD = 1.85)	Renting clothing online would be enjoyable	.967*	.973	.882	.974
	Renting clothing online would be a great play activity.	.884 ¹			
	Renting clothing online would reduce pollution.	.931*			
Green Value (M= 4.26, SD = 1.79)	Renting clothing online is important to save natural resources.	.936*	.953	.872	.953
	Renting clothing online would save land that would be used as dumpsites for apparel disposal93-				
	I found the rental service is:				
Attitudes (M= 4.70, SD = 1.51)	unfavourable – favourable	.922 ¹			
	negative – positive	.924*			
	bad – good	.934*	.967	.856	.967
	dislikable – likable	.945*			
	unattractive – attractive	.900*			

Table 2 Measurement validity and reliability

Adoption	The likelihood I would use the rental service is high.	.888 ¹			
intentions	I would be willing to use the rental service.	.919*	025	805	025
(M=3.56,	I would be willing to recommend the rental service	00/*	.923	.805	.923
SD = 1.84)	to my friends.	.884*			

Notes: * p < .001; ¹ Loadings fixed to 1 in unstandardized solution.

	Functional	Economic	Social	Emotion	Green	Attitudes	Adoption
Functional	.841	.770	.670	.797	.513	.711	.755
Economic	.593	.611	.681	.760	.640	.695	.732
Social	.449	.464	.807	.721	.611	.576	.666
Emotion	.635	.578	.520	.882	.606	.758	.846
Green	.263	.410	.373	.367	.872	.529	.548
Attitudes	.506	.483	.332	.575	.280	.856	.818
Adoption	.570	.536	.444	.716	.300	.669	.805

 Table 3 Discriminant validity of constructs

Notes: The numerical value of diagonal: average variance extracted, the numerical value of bottom of diagonal: squared correlation coefficient (Φ^2), the numerical value of the top of diagonal: correlation coefficient.

Paths	Std. es	Chi-square	
	Low	High	difference $(df = 1)$
H3a. Functional \rightarrow Attitudes	$\beta = .031$	$\beta = .374^{***}$	4.785*
H3b. Economic → Attitudes	$\beta = .477^{**}$	$\beta = .061$	4.454*
H3c. Social \rightarrow Attitudes	$\beta =057$	$\beta =120$	Ns
H3d. Emotional \rightarrow Attitudes	$\beta = .447^{**}$	$\beta = .434^{***}$	Ns
H3e. Green → Attitudes	$\beta =102$	$\beta = .164*$	4.358*
H4. Attitudes \rightarrow Adoption	$\beta = .877^{***}$	$\beta = .768^{***}$	5.894*

 Table 4 Comparison of multi-group SEM analysis between two contamination concern groups.

Note. **p* < .05, ***p* < .01, ****p* < .001.







Figure 2 Structural model analysis result for the high and low contamination concern groups



Figure 3 Attitudes as a function of message appeal and contamination concern

Note. †*p* <.10; **p* < .05.

The estimates for those who have low contamination concern were made at 1.28 *SD* below the mean of the contamination concern scale and the estimates for those who have high contamination concern were made at 1 *SD* above the mean of the scale.

Supplementary materials

A. The descriptions of the fashion rental service (main study)

Fashion rental services allow consumers to rent clothing and accessories with no purchase commitment – you simply wear, return, and repeat.

In the past, fashion rental services began in offline store with a focus on one-off (one-time use) clothing such as gowns and cocktail dresses. Nowadays, these services have grown to become online platforms that fulfill diverse demands: one-off clothing, suits, luxury brand bags, everyday high-end brands, and domestic designer branded apparel products.

These service businesses are based on strategic partnerships with multiple designers and agencies that allow consumers to wear the latest outfits and accessories. You can rent out items for up to one week and be changed a certain percentage of the rental price for a fee that covers minor expenses such as service charges, dry cleaning, etc.

[Page break]

The following is an example of a fashion rental services. Please take a careful look at the description of the service.



B. Follow-up study

We conducted a follow-up study to see if message appeals targeting different perceived values can be differently effective to consumers with high versus low contamination concerns. We selected two different types of appeals: functional appeal and economic appeal based on our findings. In the main study, the functional value contributed to attitudes of consumers with high contamination concerns whereas the economic value contributed to attitudes of consumers with low contamination concerns, respectively. Thus, we aimed to see whether the functional appeal has a positive effect on attitudes of those who have high contamination concerns whereas the economic appeal has a positive effect on attitudes of those who have how contamination concerns.

Method

We collected the data from the same Amazon Mechanical Turk as in the main study. We restricted participants' age under 50. Only responses of those who were successful in the attention check were used for the analysis (N = 120; $M_{age} = 31.99$, SD = 6.88; 40.0% female). We employed a 2 (message appeal: functional vs. economic) between-subject design with a measured contamination concern. In the study, all participants received brief information about the FRS. And then, participants in the functional appeal condition were shown the functional benefits of the FRS with the message: "By renting, you can get easy and quick access to a variety of fashion items for all occasions" (see Figure A for the stimuli). Participants in the economic appeal condition received the economic benefits with the message: "By renting, you can save your money. With the monthly subscription payment, you can wear many items at \$0". After exposure to the message, participants indicated their attitudes (3-item; $\alpha = .920$) as well as their contamination concerns (3-item; α = .938), similar to the main study. We also asked their prior FRS usage experience (31.7% having prior usage experience) and annual income (a majority with '\$50,000 - \$69,999' (32.5%), followed by '\$30,000 - \$49,999' (25.0%), '\$70,000 and above' (24.2%) and 'below \$30,000' (18.3%)). Since these demographics showed that participants in the follow-up study showed higher prior experience rate and higher income levels than the main study, we controlled for these variables in the analysis.

Results

The regression analysis revealed that controlling for prior usage experience (b = .76, p < .003) and income (b = -.04, p > .4), the main effect of appeal type (coded as 0 = "economic appeal"; 1 = "functional appeal") was not significant, (b = .09, p > .667), the main effect of contamination concern (standardized) was significant (b = -.61, p < .001), which was qualified by the significant interaction between appeal type and contamination concern (b = .51, p < .014) (see Figure 3). Specifically, those with high contamination concern (1 SD above the mean of the scale) showed more favorable attitudes when exposed to the functional appeal ($M_{\text{functional}} = 5.86$) than the economic appeal ($M_{\text{economic}} = 5.25$; b = .60, p < .041). By contrast, those with low contamination concern (1.28 SD below the mean of the scale) had more favorable attitudes when exposed to the functional appeal ($M_{\text{functional}} = 6.05$; b = -.57,

p < .086). Also, without controlling for prior usage experience and income, the significance and the pattern of the results remain similar. These findings suggest that the effectiveness of the message appeal (functional vs. economic) for the FRS depends on the contamination concerns of the audience. Consistent with the findings in the main study, the functional appeal is effective specifically when targeting consumers with high contamination concerns whereas the economic appeal is effective specifically when targeting consumers with low contamination concerns. Additionally, the main effect of contamination concerns on attitudes shows that the higher contamination concerns, the lower the attitudes in general, which is consistent with prior findings and our main study.

Figure A Stimuli for message appeal manipulation (follow-up study) *Functional appeal*



Economic appeal



Note. Source of pictures: Rent the Runway (www.renttherunway.com/).