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Economic and Social Satisfaction of Buyers on Consumer-to-Consumer Platforms: The Role of Relational Capital

Abstract: Although the Information Systems (IS) success model has been widely used in the e-commerce context, the Consumer-to-Consumer (C2C) e-commerce context tends to be overlooked. In addition, prior studies treat satisfaction as a unitary concept when investigating the IS success model, which leads to mixed findings about the effect of website quality dimensions on satisfaction and the effect of satisfaction on repurchase intentions. By identifying satisfaction as economic and social aspects in the C2C e-commerce setting, we propose that three dimensions of sellers' website quality (i.e., information, system and service quality) are positively related to economic and social satisfaction. Furthermore, drawing upon social capital theory, we posit that relational capital between buyers and sellers moderates the relationships between these two types of satisfaction and repurchase intentions. Data collected from 311 buyers on the TaoBao website provide strong support for the proposed model. The results indicate that information quality exerts a stronger impact on economic satisfaction compared with that of service quality. Service quality exerts a stronger impact on social satisfaction compared with that of information quality. System quality has no effect on economic or social satisfaction. Economic satisfaction can contribute to buyers' repurchase intentions, but the impact of social satisfaction on repurchase intentions is insignificant. Furthermore, relational capital positively moderates the effect of social satisfaction on repurchase intentions, whereas it has no moderating role in the relationship between economic satisfaction and repurchase intentions. Our findings contribute to the IS success model by demonstrating that satisfaction should be categorized as economic and social aspects in C2C e-commerce contexts. Our study recommends to online sellers that they should more strategically improve website quality dimensions according to different types of satisfaction and realize the importance of relational capital in order to facilitate buyers' repurchase intentions.

Keywords: Website quality, economic satisfaction, social satisfaction, relational capital, repurchase intentions.

Introduction

With fierce competition within Consumer-to-Consumer (C2C) e-commerce, a more important concern for online sellers than ever before is to stimulate buyers' repurchase intentions [27, 49, 57]. Chiu et al. [19] indicated that an average buyer must shop four times at a seller's store before the seller can profit from that buyer. However, less than 50% of 2nd time buyers have the intention to complete a third purchase [17]. According to Jones and Leonard [40], the biggest threat to e-commerce is a buyer's perceptions of website quality due to the buyer treating it as a proxy for the owner of the site. The Information Systems (IS) success model [69, 70] enables researchers to consider the effect of website quality dimensions (i.e., information, system and service quality) on improving buyers' satisfaction, which in turn facilitate their repurchase intentions.

However, prior e-commerce studies that have adopted the IS success model primarily focused on the Business-to-Consumer (B2C) [79] or Business-to-Business (B2B) [68] contexts, largely ignoring the C2C context. Differences have been found between C2C e-commerce and other forms of e-commerce in prior studies [12, 36] suggesting that the existing IS success model cannot be directly applied to the C2C e-commerce. In fact, compared with B2C or B2B e-commerce, C2C e-commerce is considered as more risky because it is difficult to identify the nature of an anonymous trader [71]. The success of C2C e-commerce depends on the aggregation of individual buyer-seller relationships [36]. Thus, C2C e-commerce has been demonstrated to be a distinct area of concern, requiring new models of operation [40].

While the IS success model has been widely applied to explain buyer behavior in e-commerce activities, no attention has been paid to the different perspectives of buyer satisfaction in C2C e-commerce contexts. Many researchers thus treated buyer satisfaction as a unitary concept when investigating the IS success model [13, 69, 77], though this can limit our understanding of the IS success model. As a result, prior empirical research reported mixed findings about the effect of website quality dimensions on satisfaction [11, 13, 44, 45, 78] and the effect of satisfaction on repurchase intentions is also confounding [38, 43]. For instance, Jones and Leonard [39] found that website quality factors (i.e., service quality) can contribute to buyers' satisfaction in the C2C e-commerce environment, even though the same factors have not been demonstrated to be significant in prior studies of B2C e-commerce. Jones and Leonard [39] explained that this result is due to the fact that satisfaction in the context of C2C e-commerce is distinctly different from that in other e-commerce contexts, such as B2C or B2B e-commerce. There are two different types of activities that occur between buyers and sellers on a C2C platform: economic exchanges and social interactions [12]. Buyers on a C2C platform evaluate not only the economic or instrumental outcomes during an online transaction process, but also the enjoyment from a social exchange with sellers [12, 57]. It is thus believed that satisfaction in the C2C context should include both economic and social aspects [36]. On the one hand, online purchase activities may produce buyers' economic satisfaction with the sellers, while undermining the buyers' social satisfaction, or vice versa [36]. On the other hand, economic and social satisfaction may have different antecedents and impacts [36]. Furthermore, social

interactions between buyers and sellers are facilitated by some C2C platforms like TaoBao (the leading C2C platform in China) through the provision of an instant messaging technology [12, 57]. Accordingly, we intend to divide satisfaction into economic and social satisfaction so as to reach a more comprehensive understanding of the IS success model in the C2C e-commerce context.

The objective of our research is to investigate how website quality factors influence economic and social satisfaction differently in C2C contexts. Providing high levels of website quality by sellers can help buyers gain useful information, complete a transaction easily and receive high-quality services [35]; the better transaction performance perception will increase buyers' satisfaction with not only economic value (e.g., saving transaction cost) but also social benefits (e.g., personal cares and concerns from sellers). As such, investigating the crossover relationships from sellers' website quality dimensions to economic and social aspects of satisfaction is an interesting and important topic in the context of C2C e-commerce due to its potential theoretical and practical significance. Theoretically, the findings could help explain the somewhat unexpected results in the extant literature, i.e. website quality factors have a much less significant effect on satisfaction [11, 44] than in other studies [45, 69]. Practically, a better understanding of the relationships between website quality dimensions and these two types of satisfaction can inform online sellers how to provide different dimensions of quality more cost-effectively.

Meanwhile, empirical studies reveal that satisfaction alone may not be a sufficient guarantee of buyer transaction intentions [2, 69], which has recently prompted researchers to recognize the moderating role of a relational bond on the relationship between satisfaction and repurchase intentions [32]. Following this concern, relational capital, which describes the interpersonal relationships buyers and sellers have developed with each other [54], is proposed to moderate the impacts of economic and social satisfaction on repurchase intentions. In fact, scholars focusing on investigating the impacts of economic and social satisfaction have found some confounding results. For example, Geyskens and Steenkamp [31] noted that economic satisfaction positively affected repurchase intentions but the impact of social satisfaction was unexpectedly negative. Dabholkar et al. [21] found that both economic and social satisfaction had positive effects on the important relationship consequences, such as commitment. Yet, previous research has largely ignored the moderating role of relational capital in the C2C context.

To address these gaps in the literature, we draw upon the IS success model and emphasize the importance of sellers' website quality. Specifically, we attempt to answer the following questions: (1) How and to what extent do information, system and service quality affect a buyer's economic and social satisfaction? Which factors are more important in enhancing buyers' economic or social satisfaction? (2) How do economic and social satisfaction influence buyers' repurchase intentions? (3) How and to what extent does relational capital moderate the relationships between these two types of satisfaction and repurchase intentions?

This study makes several important research contributions to the literature. First, existing e-commerce research has examined how website design and content can influence the success of e-commerce [1, 25]. However, these studies mainly focused on improving technological attributes of the online shopping website while ignoring buyer-seller relationship constructs. As a result, prior research did not clearly differentiate these three dimensions of quality factors (i.e., information, system and service quality) [48, 55]. By classifying satisfaction in terms of economic and social aspects as well as considering relational capital can advance a complete understanding of the IS success model in investigating e-commerce behavior. Second, our study can provide support for the validity of treating satisfaction as a two-dimensional construct in C2C e-commerce environments by showing that economic and social satisfaction behave differently with respect to their links to antecedents and outcomes. Third, by establishing relational capital as a key moderator of the relationships between economic and social satisfaction and repurchase intentions, our study advances the existing research on the effects of economic and social satisfaction by specifying a boundary condition under which the behavioral effects of economic and social satisfaction vary.

Theoretical Foundation

Information Systems Success Model

The Information Systems (IS) success model, initially proposed by DeLone and McLean [24], offers a clear taxonomy for operationalizing IS success. The model consists of six dimensions: information quality, system quality, user satisfaction, use, individual impact and

organizational impact [24]. DeLone and McLean further postulated that these six dimensions are interrelated: higher information and system quality can lead to higher user satisfaction and use, resulting in individual productivity improvements and ultimately leading to positive impact on organizational productivity. Since then, a number of studies (e.g., [61, 63]) have investigated the usage of various IS by refining and extending DeLone and McLean's [24] model.

With the advent of e-commerce activities, DeLone and McLean [23] developed an updated model by adding service quality as another significant dimension of success, and grouping all the "impact" measures into one category called "net benefits". However, Wang [70] and Chen et al. [13] indicated that the measures of net benefits in the updated DeLone and McLean model overlapped with the measures of user satisfaction and system use/intention to use. Wang [70] further suggested that both user satisfaction and system use/intention to use are essentially surrogates/measures of net benefits in the context of e-commerce.

Since its inception, the DeLone and McLean IS success model has been widely used to investigate user behavior in e-commerce activities. For example, Lin [48] noted that website quality dimensions affect customer satisfaction in the context of B2C. Wang [70] examined the effects of information, system and service quality on user intention to reuse the e-commerce systems. Xu et al. [72] integrated the user satisfaction and technology acceptance literature to examine the internal relationships among information, system and service quality. Chen et al. [13] applied the IS success model to predict user satisfaction and attitude toward the e-commerce

website. DeLone and McLean [25] indicated that the updated IS success model should be continuously challenged and tested, especially in the context of e-commerce.

Economic and Social Satisfaction

Prior research has indicated that satisfaction is a multidimensional concept [21].

Researchers have identified that satisfaction can be divided into two categories: economic and social satisfaction [21, 30, 31]. In particular, Geyskens et al. [30] and Geyskens and Steenkamp [31] propose three reasons for classifying satisfaction into “economic satisfaction” and “social satisfaction”: first, economic and social satisfaction should have different impacts in terms of antecedents and consequences; second, an individual can provide economic satisfaction to his counterpart and yet undermine the counterpart’s social satisfaction, and vice versa; third, Geyskens et al. [30] conducted a meta-analysis and demonstrated that research on the economic results of satisfaction differed from studies focusing on a more social perspective of satisfaction. Economic and social satisfaction are conceptually distinct, it is thus imperative to distinguish between these two different components of satisfaction to further enhance our understanding of the role of satisfaction in managing effective long-term relationships [31, 62]. Failure to differentiate economic satisfaction from social satisfaction may result in contradictory research results [31].

Economic satisfaction refers to the “evaluation of the economic outcomes that flow from the relationships” with a partner ([31], p. 13). An economically satisfied individual considers the relationship to be successful when his goals are attained [30]. Economic satisfaction emphasizes

the productivity and effectiveness of the relationship with other partners, as well as the financial outcomes [30, 31, 62]. Social satisfaction, on the other hand, refers to the “evaluation of the psychosocial aspects of its relationships, in that interactions with the exchange partner are fulfilling, gratifying, and facile” ([31], p. 13). Unlike economic satisfaction, social satisfaction emphasizes the social outcomes of the relationship with a partner, which is derived from the interpersonal level. An individual satisfied with the social aspects of the relationship enjoys the personal interaction because he believes the partner is “concerned, respectful, and willing to exchange ideas” ([30], p. 224).

Economic and social satisfaction have been studied in the marketing channel member relationships context [30, 31]. Dabholkar et al. [21] demonstrated that the concepts of economic and social satisfaction can be applied to the context of B2C and proposed that these two types of satisfaction can affect buying and participation intentions through trust and commitment. Chen et al. [12] indicated that social interactions can facilitate C2C online buyers getting both economic value and social support, which implies that economic and social satisfaction could also be valid in the C2C online shopping context.

Relational Capital

Relational capital, an important dimension of social capital, refers to assets that are rooted in interpersonal relationships through a history of interaction between actors [54, 65]. In previous research, relational capital is studied in the online context with regard to its effect on predicting individual behavior. For example, Chen et al. [14] examined the impact of relational capital on

individuals' self-disclosure behavior at social networking sites. Zhou et al. [80] identified relational capital as both perceived benefits and service-specific investments that influence calculative and affective commitment to social virtual world services.

This study focuses on the relational dimension of social capital because of the following three reasons. First, relational capital is a critical component of social capital. Nahapiet and Ghoshal [54] indicated that “not all dimensions of social capital are mutually reinforcing” (p. 251). The absence of constant relations between individuals leads to a major barrier for interpersonal interactions [14]. Therefore, the key dimension of social capital belongs to the relational capital [42]. Second, relational capital highlights the particular relations people have developed with each other [54]. The nature and quality of the relationships, such as trust, respect and friendship affect individuals' behaviors [54]. Third, the relational capital has not been fully understood in terms of its moderating roles, especially under the C2C e-commerce context.

Following Sun et al. [65], relational capital is manifested as mutual trust, reciprocity and respect. Trust refers to one believes that another party will behave in a manner by exhibiting benevolence, integrity and ability [52]. Reciprocity and respect reflect the expectation of individuals that their contributions will receive equivalent returns and considerable respect from others [41, 65].

Research Model and Hypotheses Development

On the basis of the IS success model and social capital theory, this study proposes a research model as shown in Figure 1. We first examine how information, system and service

quality influence economic satisfaction, and consequently affect buyers' repurchase intentions. It is noteworthy that we only investigate how information and service quality affect social satisfaction while the relationship between system quality and social satisfaction is not examined. Since social satisfaction emphasizes interactions between buyers and sellers, a well-designed system (e.g., easy to navigate) provided by the seller does not automatically lead to buyers' increased social satisfaction with the seller. Moreover, we examine how relational capital moderates the relationship between economic satisfaction and repurchase intentions and the relationship between social satisfaction and repurchase intentions. The remainder of this section will develop the hypotheses presented in the research model.

-----Insert Figure 1 about here-----

The Impact of Information Quality on Economic and Social Satisfaction

Information quality is a buyer's evaluation of the quality of information provided on a seller's website [53]. Information quality reflects the relevance, sufficiency, accuracy and timeliness of the information presented [78]. For example, to help buyers better understand the products and make purchase decisions, online sellers should offer sufficient and accurate product description information as well as relevant and timely promotion activity information [74].

If sellers actively provide buyers with useful and complete information, the likelihood of buyers needing to conduct additional searches for information will be diminished [45]. This implies that high-quality information can be searched and stored by buyers inexpensively [20]. Hence, high-quality information provided by the seller can lead to buyers' economic satisfaction

because economic satisfaction emphasizes an individual's satisfaction with the effectiveness of the relationship with his partner [30, 31]. On the contrary, low-quality information can increase individuals' (i.e., buyers in our case) search and information-processing costs [77]. Thus, buyers have to waste their efforts and time on reading useless information, which can decrease buyers' economic satisfaction.

Moreover, information quality can also affect buyers' social satisfaction. During online transactions, buyers tend to exhibit less disagreement and more compliance behavior when sellers' information quality is high. If the information provided by the seller is irrelevant, insufficient, inaccurate or out-of-date, it may cause doubts in the buyers' mind about whether the seller is engaging in opportunistic behavior and may thus reduce their gratification when interacting with the seller. By providing buyers with high-quality information, online sellers can also deliver innovative, value-added and customized products/services to their buyers [45]. The more valuable the information offered by sellers, the greater the likelihood that the buyers will feel the sellers truly understand their needs. This can induce buyers' positive evaluations of the psychosocial aspects of their relationships with sellers because buyers believe the sellers are concerned and willing to exchange ideas. Therefore, we propose that:

***H1.** A seller's information quality contributes to the development of a buyer's economic satisfaction.*

***H2.** A seller's information quality contributes to the development of a buyer's social satisfaction.*

The Impact of System Quality on Economic and Social Satisfaction

System quality is a buyer's perception of the performance of a seller's website in information retrieval and delivery [53]. System quality can be evaluated from the aspects like access speed, ease of use, visual appeal and navigation [78]. In particular, these aspects can be controlled by sellers at TaoBao. For example, sellers' websites on TaoBao are different in terms of their navigation and visual appeal.

Liang and Chen [45] indicated that buyers can benefit from transaction cost savings by using the Internet. The magnitude of the transaction cost savings relies on the convenience and reliability of the system [45]. In other words, a high-quality sellers' system can provide buyers with more convenience and faster responses [1]. Thus, a high level of seller's system quality enables buyers to effectively and efficiently locate products, which facilitates buyers' economic satisfaction. However, if the seller's system is difficult for buyers to use, they will have to filter out or block irrelevant information. An overload of information makes it hard for buyers to complete the transactions [45]. Hence, a low-quality system is unlikely to lead to buyers' economic satisfaction.

H3. A seller's system quality contributes to the development of a buyer's economic satisfaction.

The Impact of Service Quality on Economic and Social Satisfaction

Service quality is a buyer's judgment of the overall quality of online service delivery [48]. Service quality can be evaluated from the perspectives of responsiveness, reliability, assurance and personalization [78].

On a C2C platform, such as TaoBao, buyers like to communicate with sellers to obtain more specific and personalized requests in addition to basic product-related information [57]. Details, such as seller's service, will be specified during the online communication process [57]. Service quality for a seller depends on its accepting buyers' complaints and their timely resolution as well as suggesting complementary products or services to assist buyers' effectiveness [1]. Lin [48] noted that service quality can facilitate efficient and effective online shopping, purchasing and product delivery, which in turn contributes to higher levels of buyer satisfaction. Besides, a good service quality can also satisfy buyers' expectations [47]. Buyers' economic satisfaction will be generated when their expectations with respect to behavioral goal attainment are fulfilled in the relationship [31].

In addition, service quality can also contribute to buyers' greater social satisfaction. In order to facilitate immediate transactions as well as long-term buyer-seller relationships, sellers need to provide high-quality service [45, 64]. High-quality service has a social meaning and it expresses friendship or careful attention from the sellers, which can increase buyers' satisfaction [45]. Prior research indicated that service attributes can be regarded as a cognitive-based construct [45], whereas buyers' social satisfaction is primarily an affective dimension [21]. Cognitive thought process can trigger affective response [45], suggesting that buyers' evaluations of service attributes influence their social satisfaction. We thus propose that:

H4. *A seller's service quality contributes to the development of a buyer's economic satisfaction.*

H5. *A seller's service quality contributes to the development of a buyer's social satisfaction.*

The Impact of Economic and Social Satisfaction on Repurchase Intentions

Researchers (e.g., [7]) have suggested that buyers' perceptions of economic aspects of value can increase their repurchase intentions. Geyskens and Steenkamp [31] demonstrated that economic satisfaction builds buyers' repurchase intentions in marketing channel relationships. Economic satisfaction boosts repurchase intentions because it can strengthen buyers' perceptions of goal attainment and task accomplishment. Dabholkar et al. [21] noted that the achievement of online shopping goals, which is reflected in economic satisfaction, can influence buyers' behavior. In addition, Bhattacharjee [6] have found that individuals' evaluations of instrumental aspects can lead to their continuance intention. If buyers are satisfied with the general effectiveness of their relationship with sellers, they are less likely to be inclined to switch sellers. Accordingly, we propose that:

H6. A buyer's economic satisfaction with a seller contributes to his/her repurchase intentions with the seller.

Moreover, buyers' repurchase intentions towards a seller are also built on their evaluation of a successful long-term relationship with the seller [43]. Chen et al. [12] indicated that interpersonal aspects of interaction can facilitate the development of intimate relationships between buyers and sellers. Indeed, the social and hedonic aspects of interpersonal interactions with service providers can cultivate buyers' sense of belonging [5], which are more likely to induce buyers' repurchase intentions. Researchers have suggested that behavior demonstrating interpersonal cares and concerns is vital for the development of repurchase intentions [64]. An

integral aspect of social satisfaction is the evaluations of interpersonal interactions [31], it is proposed that social satisfaction can contribute positively to buyers' repurchase intentions. Thus, we hypothesise that:

H7. A buyer's social satisfaction with a seller contributes to his/her repurchase intentions with the seller.

Moderating Impact of Relational Capital

Relational capital, which emphasizes the particular relationships people have, such as trust, reciprocity and respect, also influences their behavior [54, 65]. Prior research indicated that individuals who express a stronger relational capital should report a greater extent of affective commitment to a relationship [80], particularly given perceived risks during the online purchase process [57]. Affective commitment, in turn, causes comparable alternative providers to appear less attractive [10]. When relational capital is strong, the relationship between economic satisfaction and repurchase intentions should be strengthened, given that such strong relational capital can function as strong emotional ties and buyers may consider that purchasing products from a seller is a low risk activity, thus economic satisfaction will be conveniently applied to infer buyers' repurchase intentions in the current transaction. In contrast, when relational capital is weak, Delerue-Vidot [22] noted that "even the most promising relationship from an economic point of view is most likely to fail" (p. 741). Hence, we hypothesise that:

H8. Relational capital positively moderates the influence of economic satisfaction on repurchase intentions.

The role of social satisfaction may also vary depending on the strength of relational capital between buyers and sellers. Relational capital that is characterized by mutual trust, respect and reciprocity plays a vital role in facilitating cooperative behavior among individuals [29]. Individuals with stronger cooperative tendencies are more positive about and benevolent to other's behavior [29]. Tsai and Ghoshal [66] also found that relational capital functions as a lubricant of relationships and thus encourages resource exchange and combination. In the context of C2C e-commerce, when relational capital between buyers and sellers is strong, buyers will have a positive attitude towards the seller and thus their previous social satisfaction experience with the seller can be treated as a reliable cue to inform their future behavior. This means that in situations of strong relational capital, high levels of social satisfaction might induce buyer repurchase intentions. In contrast, when relational capital is weak, the influence of social satisfaction on repurchase intentions is low because buyers might give a less positive appraisal to the seller. Therefore, we hypothesise that:

H9. Relational capital positively moderates the influence of social satisfaction on repurchase intentions.

Research Methodology

Measurement Development

To test our proposed model, we designed a survey instrument. As the constructs in this study have been well established in the previous research, we thus adapted previously validated measurement items as appropriate. A five-point Likert scale, anchoring from 1 ("strongly

disagree”) to 5 (“strongly agree”), was used to measure all items. Appendix A lists all the measurement items in the questionnaire.

As the survey was conducted in China, we followed the translation committee approach [67] to translate the English questionnaire into Chinese version. In addition, we hired a professional translator, who was unfamiliar with our study, to translate the Chinese questionnaire back to English. We found no semantic discrepancies between the retranslated questionnaire and the original English version. Moreover, to ensure content validity, we invited three IS PhD students, who had online shopping experience at TaoBao, to review and critique the questionnaire.

Specifically, information quality was measured using a four-item scale adapted from Zhou [78]. System quality was measured with four items adapted from Zhou [78]. Service quality was also assessed with a four-item scale adapted from Zhou [78]. In addition, economic satisfaction was measured with items based on Dabholkar et al. [21] and Ivens and Pardo [37]. Social satisfaction was assessed with three items adapted from Dabholkar et al. [21]. Relational capital was measured with a three-item scale based on Sun et al. [65]. Finally, the dependent variable, repurchase intentions, was measured with three items adapted from Ou et al. [57].

Additionally, following Chiu et al. [19], four control variables (i.e., gender, age, online shopping frequency and internet experience) that may affect repurchase intentions were included in our research model.

Research Design and Data Collection

TaoBao was chosen as our research context because TaoBao is the largest C2C online shopping platform in China and buyers are familiar with it [76]. While TaoBao and eBay are similar in terms of functionality, there are some notable differences [56]. For example, TaoBao offers a variety of product listings in the homepage of the platform. When buyers transact with a seller at TaoBao platform, they need to visit TaoBao platform first, and then visit the specific seller's website according to the product listings provided by the platform. Nevertheless, in case of eBay, the entire transaction is done in eBay platform without visiting the seller's website. In addition, TaoBao platform allows sellers to design their own web pages [76], so sellers have different information and system quality at TaoBao platform. Moreover, sellers can provide different degrees of services to buyers' inquiries through using WangWang, an instant communication tool embedded in TaoBao [56].

We conducted the survey by publishing a banner with a hyperlink to our web survey on a number of popular social network sites in China. Individuals with prior online shopping experience at TaoBao were invited to complete the questionnaire. We offered RMB 50 (approximately US\$ 7.66) as an incentive to fifty randomly selected respondents. The respondents were asked to reflect on their most recent online shopping experience with a seller at TaoBao, and complete the questionnaire about that focal seller. Altogether, 334 questionnaires were received over a six-week period. Among them, 23 were dropped from the pool due to

excessive missing data, resulting in a total of 311 valid responses (26.8% response rate). Table 1 shows the demographic information of the respondents.

-----**Insert Table 1 about here**-----

We further assessed nonresponse bias by using the approach suggested by Armstrong and Overton [3]. For all of the constructs, the early respondents and late respondents were compared. The tests showed that none of the t-statistics for difference in construct means were significant, indicating that response bias was likely not a serious a concern for this study.

Common Method Bias

Given that the data in this study were collected from a single source at the same time, we further examined common method bias. First, we used Harmon's single-factor method [60] to evaluate the seven conceptual variables in the research model. The results showed that six constructs had eigenvalues higher than 1.0, accounting for 65.48% of the total variance. Besides, the first factor accounted for 15.86% of the variance. Thus, the test demonstrated that the threat of common method bias is minimal.

Second, following Podsakoff et al. [59] and Liang et al. [46], a common method factor associated with all the principal constructs' indicators was included in the partial least squares (PLS) model. We then calculated how each indicator's variances were substantively explained by the principal constructs and the method factor. As Appendix B shows that the average substantively explained variance was 0.672, whereas the average method-based variance of the indicators was 0.013. Besides, the ratio of the average substantive explained variance to the

average method-based variance was very large. Furthermore, most method factor loadings were insignificant, suggesting that common method bias is not a serious concern.

Data Analysis and Results

Data Analysis Technique

We used PLS to test the research model. PLS was regarded as a preferred statistical tool for several reasons. First, PLS can calculate the loadings of indicators on constructs (hence, construct validity can be evaluated) and estimate the causal relationships among those constructs [65]. Second, PLS can offer a good approximation of covariance-based (CB) SEM in terms of final estimates, while CB-SEM is better suitable for theory development [34]. Third, PLS is robust with fewer issues like statistical identification over CB SEM [34].

Measurement Model

To test the construct validity and reliability, we used confirmatory factor analysis (CFA). As shown in Appendix A, the loadings of all the retained items were greater than the recommended level 0.7 except for one item in system quality (SQ4) [8]. However, the value of this item's loading was still greater than the 0.6 cutoff [4]. In addition, the values of AVE ranged from 0.583 to 0.802, all exceeded the threshold of 0.5 [28]. Thus, these results implied that our measurement model had good convergent validity. Furthermore, to assess construct reliability, we followed Fornell and Larcker's [28] suggestion to test Cronbach's alpha and composite reliability. Table 2 shows that Cronbach's alpha ranged from 0.704 to 0.877, and composite

reliability ranged from 0.839 to 0.924. Both were greater than the recommended 0.7 cutoff.

These results demonstrated good reliability of the measurement model.

-----**Insert Table 2 about here**-----

Moreover, to assess discriminant validity, we compared the square root of AVE for each construct and the correlations among constructs [15]. As shown in Table 3, the largest correlation between constructs was 0.662, less than the recommended level 0.71 [50]. In addition, the square roots of AVEs of all constructs on the diagonal were higher than these construct correlations [28]. Therefore, these test results demonstrated good discriminant validity.

-----**Insert Table 3 about here**-----

Given that several construct correlations exceeded 0.6, we thus tested the potential multicollinearity issue. Following Mason and Perreault [51], we analyzed the Variance Inflation Factors (VIF). The results indicated that the highest VIF was 2.388, less than the benchmark value of 10. Hence, multicollinearity is not a serious issue in this research.

Structural Model

We used PLS Graph version 3.00 to test the structural model. We evaluated the path significance through using bootstrap statistics with 500 resamples and 311 cases per sample. Figure 2 presents the results of PLS analysis. The R^2 values indicated that information, system and service quality accounted for 45.2% of variance of economic satisfaction and 31.9% of

variance of social satisfaction. In addition, economic and social satisfaction accounted for 29.3% of variance of repurchase intentions. Hence, the fit of the overall model is good.

-----**Insert Figure 2 about here**-----

First, we tested the relationship among three dimensions of website quality and satisfaction. The results showed that both information quality ($\beta=0.368$, $p<0.001$) and service quality ($\beta=0.299$, $p<0.001$) exerted positive and significant impacts on economic satisfaction, while system quality had no significant effect on economic satisfaction. Thus, H1 and H4 were supported, while H3 was not. In addition, information quality ($\beta=0.238$, $p<0.001$) and service quality ($\beta=0.327$, $p<0.001$) had positive and significant effects on social satisfaction. Consequently, H2 and H5 were supported. Moreover, we followed the suggestions by Pavlou and Dimoka [58] to compare the PLS path coefficients between the effects of information and service quality on two types of satisfaction. Our data indicated that information quality had a stronger effect on economic satisfaction compared with service quality ($t=12.407$, $p<0.001$). Service quality exerted a stronger influence on social satisfaction compared with information quality ($t=16.667$, $p<0.001$).

Second, we examined how economic and social satisfaction influenced repurchase intentions. The path from economic satisfaction ($\beta=0.402$, $p<0.001$) to repurchase intentions was positive and significant, supporting H6. However, the path from social satisfaction to repurchase intentions was not significant, thus H7 was not supported. Furthermore, we found that two

control variables, gender and online shopping frequency, had significant effects on repurchase intentions.

Third, our data revealed that relational capital had no moderating effect on the relationship between economic satisfaction and repurchase intentions, rejecting H8. H9, which stated that relational capital positively moderated the relationship between social satisfaction and repurchase intentions, was supported ($\beta=0.159$, $p<0.05$). This moderating effect was delineated in Figure 3. As predicted, at high strengths of relational capital, repurchase intentions increased rapidly as social satisfaction increased. Nevertheless, at low strengths of relational capital, repurchase intentions decreased as social satisfaction increased.

-----Insert Figure 3 about here-----

To determine whether the significant moderating effect of relational capital is substantive, we further examined the R^2 changes resulting from the interaction effects [9]. As shown in Appendix C, social satisfaction significantly increased the R^2 of repurchase intentions by 28.5 percent ($F = 16.729$, $p < 0.001$), indicating a large effect size ($f^2 = 0.299$)¹. The interaction effect of relational capital with social satisfaction significantly increased the R^2 of repurchase intentions by 1.5 percent ($F = 15.992$, $p < 0.001$), indicating a small effect size ($f^2 = 0.022$). Thus, the F-test results showed the significantly increased R^2 of the interaction effects, confirming the significance of the moderating effect [9].

Discussion and Implications

Effect size $f^2 = [R^2 \text{ of interaction effect model} - R^2 \text{ of main effect model}] / [1 - R^2 \text{ of main effect model}]$. Following Cohen (1988), f^2 of 0.02–0.14, 0.15–0.34, and above 0.35 are termed small-, medium-, and large-effect sizes, respectively

Summary of Results

This study includes several key findings. First, the results indicate that both information and service quality have positive effects on economic and social satisfaction, while the effect of system quality is not significant. This finding is also consistent with previous research that demonstrated that the effect of system quality is significant for initial purchase intention yet insignificant for repeat purchase intention [11, 73]. This is because compared with potential buyers, experienced (i.e., repeat) buyers can better comprehend and evaluate the attributes of a sellers' store due to their past experience with the seller [19]. Buyers update the importance of criteria and the appraisals through sequential purchases [19]. Therefore, buyers may pay relatively more attention to the information and service quality provided by the seller rather than the system quality.

Second, the findings reveal that economic satisfaction exerts a significant impact on repurchase intentions. However, the effect of social satisfaction on repurchase intentions is not significant. The moderating role of relational capital may provide a way to explain this insignificant effect. Specifically, we found that relational capital positively moderates the relationship between social satisfaction and repurchase intentions. Our findings suggest that cementing buyers' social satisfaction might not be as important as we once believed it to be if there is no relational capital between buyers and sellers. In other words, social satisfaction can be an important source of repurchase intentions only under the condition of strong relational capital.

Limitations and Future Research

This study has several limitations that open up research opportunities for future research. First, whether the Internet can be regarded as a suitable shopping medium depends on the product characteristics. Some products are more easily bought online, while others are convenient to buy offline. Therefore, future research should also include product category as a moderating variable.

Second, this study does not hypothesize and measure how information, system and service quality are related to each other, despite the focus on elaborating the necessary division of satisfaction into economic and social aspects when applying the IS success model to C2C online shopping contexts. System quality may influence information and service quality, and information quality may influence service quality [72]. Therefore, future research should empirically test the relationships among three types of quality constructs in C2C contexts.

Third, this study used repurchase intentions as the dependent variable instead of the actual repurchases. This is not uncommon in e-commerce-based studies of buyer behavior [19, 27]. Prior researchers have demonstrated a strong correlation between behavior intentions and actual behavior (e.g., [57]). However, additional research efforts are needed to assess the validity of the investigated model. Future researchers should pursue opportunities to replicate this research model with actual repurchases as the dependent variable. Such longitudinal evidence could enrich our understanding of the causality between those variables in the model. In addition, our

survey used the recall method, which may induce respondents' memory recall bias. Future research should replicate the study with alternative methods, such as experiments. In addition,

Furthermore, the moderating roles of relational capital advanced in this study yield a significant, albeit limited, increase in explained variance. Although even small interaction effects can suggest important moderating relationships through using the product-indicator approach [16, 33], we should still be cautious when interpreting these results. Since the significant moderation effects of relational capital have gained credible empirical support in this research, future researchers should examine these effects of relational capital under other conditions.

Finally, our study chose a Chinese online shopping platform as our research context. However, online buyers' behavior may vary across cultures. Future research could undertake a cross-culture comparison between the Chinese online shopping platform and other online shopping platforms in other countries. Such cross-culture comparisons may offer additional insights for international and local businesses to gain competitive advantages in online marketplaces across the globe.

Theoretical Implications

This study provides several significant implications for theory. First, our study offers a more nuanced insight into the IS success model in C2C e-commerce contexts. Existing e-commerce studies have investigated the impact of website design and content on the success of e-commerce (see Table 4). For example, Chen et al. [13] studied the effect of information, system and service quality on user satisfaction and attitude toward the site through a comparison

study in two countries. Yoo et al. [75] investigated the effect of the interactivity of website quality and electronic word-of-mouth on decision support satisfaction. These previous studies in e-commerce have provided much insight into the IS success model. However, prior studies have major limitations when applied to the C2C e-commerce context because buyer-seller relationship constructs, a key dimension in the C2C e-commerce [12], are not considered in their research. Chiu et al. [18] indicated that the mere existence of a website with good technological attributes cannot guarantee the success of online shopping. Economic and social satisfaction focus on buyers' evaluations of the economic and social outcomes of the relationships with sellers [36], whereas relational capital emphasizes the particular relationships people have developed with each other [54]. Thus, by clarifying the crossover relationships from website quality dimensions (i.e., information, system and service quality) to economic and social aspects of evaluation of buyer-seller relationships and investigating the role of relational capital between buyers and sellers, our study extends understanding of the IS success model in the C2C context.

Second, our findings advance the scholarly understanding of the antecedents and outcomes of each type of satisfaction in the C2C online shopping context. Our study empirically demonstrates the validity of treating satisfaction as both economic and social satisfaction given that these two types of satisfaction behave differently in terms of the links with their antecedents and consequences. Specifically, the results suggest a dominant role for information quality in driving buyers' economic satisfaction with sellers, while social satisfaction is influenced more by service quality than by information quality. Moreover, each type of satisfaction has different

effects on repurchase intentions. Prior research has found some confounding results with respect to the impact of website quality dimensions on satisfaction [11, 13, 44, 45, 78] and the effect of buyer satisfaction on repurchase intentions [38, 43]. For instance, the relationships between information, system and service quality and satisfaction are positively significant in some studies [11, 45] while insignificant in other studies [13, 44, 78]. In addition, some studies found the impact of satisfaction on repurchase intentions to be positively significant [43], but others indicated that satisfaction has no effect on repurchase intentions [38]. Differentiating satisfaction as economic and social aspects in the context of C2C e-commerce can provide plausible explanations for these discrepancies in the extant literature.

Third, this study presents a research opportunity to explore how economic and social satisfaction operate under boundary conditions. Geyskens and Steenkamp [31] found that economic satisfaction had a positive impact on repurchase intentions, while the influence of social satisfaction was negative. Dabholkar et al. [21] indicated that both economic and social satisfaction positively affect the important relationship consequences (e.g., commitment). Nevertheless, to the best of our knowledge, the extant literature has largely overlooked the boundary conditions under which economic and social satisfaction have various effects on behavioral intentions, which represents an oversimplification of the conditions in which economic and social satisfaction are evaluated in C2C environments. By drawing on the social capital theory, our findings advance the understanding of the conditional effects of social

satisfaction by explicitly specifying the relational capital as a significant boundary condition to assess how social satisfaction influences online repurchase intentions.

-----**Insert Table 4 about here**-----

Practical Implications

Our study makes some valuable guidelines for online sellers. First, our findings imply that economic satisfaction is the primary factor stimulating buyers' repurchase intentions. Therefore, how to build and enhance buyers' economic satisfaction is still a high priority goal for online sellers. In order to increase buyers' economic satisfaction, sellers should try to improve the price-quality ratio of products, while also providing efficient and effective online advisory services. Meanwhile, online sellers should realize that only focus on improving buyers' social satisfaction cannot directly lead to their repurchase intentions. However, relational capital between buyers and sellers is found to strengthen the relationship between social satisfaction and repurchase intentions. Hence, sellers can build relational capital with buyers by developing mutual trust, reciprocity and respect with buyers. For example, in order to build trust with buyers, sellers can provide fair transactions by keeping their promises and fulfilling their obligations in terms of the qualities of product and service throughout the whole transaction process. In addition, providing a small gift or a warm e-greeting card to buyers is a fundamental component of mutual reciprocity and respect. Although enhancing economic satisfaction is a basic requirement, sellers should be aware that investing in the economic aspect can be easily imitated by other competitors in an online context; however, leveraging the power of relational capital is a

much more useful form of customer service. Online sellers should pay sufficient attention to the management of relational capital between buyers and sellers to accumulate buyers' loyalty.

Second, our study recommends to online sellers that they should more strategically improve website quality according to their different focus on economic or social satisfaction. Given that system quality has no effect on economic or social satisfaction, sellers may save system quality maintenance cost for repeat buyers. If sellers aim to facilitate buyers' repurchase intentions through economic satisfaction, sellers should improve information quality by providing relevant, sufficient, accurate and up-to-date information to buyers. They have to provide critical product information to help buyers find their desired products efficiently and effectively. Sellers can also proactively provide buyers with pop-up discount information and FAQs on their websites. If sellers focus more on social satisfaction, they need to focus on improving service quality by offering on-time, prompt, professional and personalized services to enhance buyers' social satisfaction. For instance, sellers should effectively handle problems and returns, and offer easily available assistance to buyers. More importantly, sellers should provide good services to buyers throughout pre-sales, online-sales and post-sales stages.

Conclusion

Retaining buyers and facilitating their repurchase intentions are crucial for online sellers in C2C e-commerce contexts. Previous research on the IS success model indicated that website quality dimensions can affect buyers' satisfaction, which in turn helps build buyers' repurchase intentions. However, previous e-commerce research that adopts the IS success model has mainly

focused on the Business-to-Consumer (B2C) and Business-to-Business (B2B) contexts. In addition, satisfaction has been regarded as a unidimensional construct and no studies test the crossover relationships from different dimensions of website quality to different types of satisfaction in C2C e-commerce contexts. This research identifies two types of satisfaction (i.e., economic and social satisfaction) in the C2C e-commerce context. We highlight the important role of sellers' information, system and service quality in shaping buyers' economic and social satisfaction, which in turn influence buyers' repurchase intentions. In addition, we explore the moderating effects of relational capital on the relationships between these two types of satisfaction and repurchase intentions. In particular, relational capital is shown to positively moderate the relationship between social satisfaction and repurchase intentions, but it does not moderate the relationship between economic satisfaction and repurchase intentions. In conclusion, the findings of this research provide guidance for online sellers on how to strategically facilitate buyers' repurchase intentions.

References

1. Ahn, T., Ryu, S., and Han, I. The impact of Web quality and playfulness on user acceptance of online retailing. *Information & Management*, 44, 3 (2007), 263-275.
2. Anderson, R.E., and Srinivasan, S.S. E-satisfaction and e-loyalty: A contingency framework. *Psychology & Marketing*, 20, 2 (2003), 123-138.
3. Armstrong, J., and Overton, T. Estimating nonresponse bias in mail surveys. *Journal of Marketing Research*, 14 (1977), 396-402.
4. Bagozzi, R.P., and Yi, Y. On the evaluation of structural equation models. *Journal of the Academy of Marketing Science*, 16, 1 (1988), 74-94.
5. Beatty, S.E., Mayer, M., Coleman, J.E., Reynolds, K.E., and Lee, J. Customer-sales associate retail relationships. *Journal of Retailing*, 72, 3 (1996), 223-247.
6. Bhattacherjee, A. Understanding information systems continuance: An expectation-confirmation model. *MIS Quarterly*, 25, 3 (2001), 351-370.
7. Briggs, E., and Grisaffe, D. Service performance - loyalty intentions link in a business-to-business context: The role of relational exchange outcomes and customer characteristics. *Journal of Service Research*, 13, 1 (2009), 37-51.
8. Carmines, E.G., and Zeller, R.A. Reliability and validity assessment. Beverly Hills, CA: Sage Publications, 1979.
9. Carte, T.A., and Russell, C.J. In pursuit of moderation: Nine common errors and their solutions. *MIS Quarterly*, 27, 3 (2003), 479-501.
10. Carter, M., Wright, R., Thatcher, J.B., and Klein, R. Understanding online customers' ties to merchants: The moderating influence of trust on the relationship between switching costs and e-loyalty. *European Journal of Information Systems*, 23, 2 (2014), 185-204.
11. Chen, C.W.D., and Cheng, C.Y.J. Understanding consumer intention in online shopping: A respecification and validation of the DeLone and McLean model. *Behaviour & Information Technology*, 28, 4 (2009), 335-345.
12. Chen, J., Zhang, C., and Xu, Y.J. The role of mutual trust in building members' loyalty to a C2C platform provider. *International Journal of Electronic Commerce*, 14, 1 (2009), 147-171.
13. Chen, J.V., Rungruengsamrit, D., Rajkumar, T., and Yen, D.C. Success of electronic commerce Web sites: A comparative study in two countries. *Information & Management*, 50, 6 (2013), 344-355.
14. Chen, R., and Sharma, S. Understanding user behavior at social networking sites: A relational capital perspective. *Journal of Global Information Technology Management*, 15, 2 (2012), 25-45.
15. Chin, W.W. The partial least squares approach for structural equation modeling. *Mahwah, NJ, US: Lawrence Erlbaum Associates* (1998), 295-336.
16. Chin, W.W., Marcolin, B.L., and Newsted, P.R. A partial least squares latent variable modeling approach for measuring interaction effects: Results from a Monte Carlo simulation study and an electronic-mail emotion/adoption study. *Information Systems Research*, 14, 2 (2003), 189-217.
17. Chiu, C.-M., Hsu, M.-H., Lai, H., and Chang, C.-M. Re-examining the influence of trust on online repeat purchase intention: The moderating role of habit and its antecedents. *Decision Support Systems*, 53, 4 (2012), 835-845.
18. Chiu, C.M., Lin, H.Y., Sun, S.Y., and Hsu, M.H. Understanding customers' loyalty intentions towards online shopping: An integration of technology acceptance model and fairness theory. *Behaviour & Information Technology*, 28, 4 (2009), 347-360.

19. Chiu, C.M., Wang, E.T.G., Fang, Y.-H., and Huang, H.-Y. Understanding customers' repeat purchase intentions in B2C e-commerce: The roles of utilitarian value, hedonic value and perceived risk. *Information Systems Journal*, 24, 1 (2014), 85-114.
20. Chiu, H.-C., Hsieh, Y.-C., and Kao, C.-Y. Website quality and customer's behavioural intention: An exploratory study of the role of information asymmetry. *Total Quality Management and Business Excellence*, 16, 2 (2005), 185-197.
21. Dabholkar, P.A., van Dolen, W.M., and de Ruyter, K. A dual-sequence framework for B2C relationship formation: Moderating effects of employee communication style in online group chat. *Psychology and Marketing*, 26, 2 (2009), 145-174.
22. Delerue-Vidot, H. Opportunism and unilateral commitment: The moderating effect of relational capital. *Management Decision*, 44, 6 (2006), 737-751.
23. DeLone, W.H., and McLean, E.R. The DeLone and McLean model of information systems success: A ten-year update. *Journal of Management Information Systems*, 19, 4 (2003), 9-30.
24. DeLone, W.H., and McLean, E.R. Information systems success: The quest for the dependent variable. *Information Systems Research*, 3, 1 (1992), 60-95.
25. DeLone, W.H., and McLean, E.R. Measuring e-commerce success: Applying the DeLone & McLean information systems success model. *International Journal of Electronic Commerce*, 9, 1 (2004), 31-47.
26. Fang, Y.-H., Chiu, C.-M., and Wang, E.T. Understanding customers' satisfaction and repurchase intentions: An integration of IS success model, trust, and justice. *Internet Research*, 21, 4 (2011), 479-503.
27. Fang, Y., Qureshi, I., Sun, H., Mccole, P., Ramsey, E., and Lim, K.H. Trust, satisfaction and online repurchase intention: The moderating role of perceived effectiveness of e-commerce institutional mechanisms. *MIS Quarterly*, 38, 2 (2014), 407-427.
28. Fornell, C., and Larcker, D.F. Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18, 1 (1981), 39-50.
29. Futrell, D. When quality is a matter of taste, use reliability indexes. *Quality Progress*, 28, 5 (1995), 81-88.
30. Geyskens, I., Steenkamp, J.-B.E., and Kumar, N. A meta-analysis of satisfaction in marketing channel relationships. *Journal of Marketing Research*, 36, 2 (1999), 223-238.
31. Geyskens, I., and Steenkamp, J.-B.E.M. Economic and social satisfaction: Measurement and relevance to marketing channel relationships. *Journal of Retailing*, 76, 1 (2000), 11-32.
32. Gonçalves, H.M., and Sampaio, P. The customer satisfaction-customer loyalty relationship: Reassessing customer and relational characteristics moderating effects. *Management Decision*, 50, 9 (2012), 1509-1526.
33. Guthrie, R.W., Jenkins, J.L., Romano, N.C., and Lowry, P.B. The CMC interactivity model: How interactivity enhances communication quality and process satisfaction in lean-media groups. *Journal of Management Information Systems*, 26, 1 (2009), 155-196.
34. Hair, J.F., Ringle, C.M., and Sarstedt, M. PLS-SEM: Indeed a silver bullet. *The Journal of Marketing Theory and Practice*, 19, 2 (2011), 139-152.
35. Hsu, M.-H., Chang, C.-M., Chu, K.-K., and Lee, Y.-J. Determinants of repurchase intention in online group-buying: The perspectives of DeLone & McLean IS success model and trust. *Computers in Human Behavior*, 36 (2014), 234-245.
36. Huang, Q., Chen, X., Ou, C.X., Davison, R.M., and Hua, Z. Understanding buyers' loyalty to a C2C platform: the roles of social capital, satisfaction and perceived effectiveness of e-commerce institutional mechanisms.

Information Systems Journal, (2015), doi: 10.1111/isj.12079..

37. Ivens, B.S., and Pardo, C. Are key account relationships different? Empirical results on supplier strategies and customer reactions. *Industrial Marketing Management*, 36, 4 (2007), 470-482.
38. Janita, M.S., and Miranda, F.J. The antecedents of client loyalty in business-to-business (B2B) electronic marketplaces. *Industrial Marketing Management*, 42, 5 (2013), 814-823.
39. Jones, K., and Leonard, L.N. Consumer-to-consumer electronic commerce: A distinct research stream. *Journal of Electronic Commerce in Organizations*, 5, 4 (2007), 39-54.
40. Jones, K., and Leonard, L.N. Trust in consumer-to-consumer electronic commerce. *Information & Management*, 45, 2 (2008), 88-95.
41. Kale, P., Singh, H., and Perlmutter, H. Learning and protection of proprietary assets in strategic alliances: Building relational capital. *Strategic Management Journal*, 21, 3 (2000), 217-237.
42. Kankanhalli, A., Tan, B.C.Y., and Wei, K.K. Contributing knowledge to electronic knowledge repositories: An empirical investigation. *MIS Quarterly*, 29, 1 (2005), 113-143.
43. Kim, D.J., Ferrin, D.L., and Rao, H.R. Trust and Satisfaction, Two Stepping Stones for Successful E-Commerce Relationships: A Longitudinal Exploration. *Information Systems Research*, 20, 2 (2009), 237-257.
44. Kim, H.-W., Xu, Y., and Koh, J. A comparison of online trust building factors between potential customers and repeat customers. *Journal of the Association for Information Systems*, 5, 10 (2004), 392-420.
45. Liang, C., and Chen, H. A study of the impacts of website quality on customer relationship performance. *Total Quality Management & Business Excellence*, 20, 9 (2009), 971-988.
46. Liang, H., Saraf, N., Hu, Q., and Xue, Y. Assimilation of enterprise systems: The effect of institutional pressures and the mediating role of top management. *MIS Quarterly*, 31, 1 (2007), 59-87.
47. Liang, T.-P., Ho, Y.-T., Li, Y.-W., and Turban, E. What drives social commerce: The role of social support and relationship quality. *International Journal of Electronic Commerce*, 16, 2 (2011), 69-90.
48. Lin, H.F. The impact of website quality dimensions on customer satisfaction in the B2C e-commerce context. *Total Quality Management & Business Excellence*, 18, 3-4 (2007), 363-378.
49. Lu, Y., Lu, Y., and Wang, B. Effects of dissatisfaction on customer repurchase decisions in e-commerce-an emotion-based perspective. *Journal of Electronic Commerce Research*, 13, 3 (2012), 224.
50. MacKenzie, S.B., Podsakoff, P.M., and Podsakoff, N.P. Construct measurement and validation procedures in MIS and behavioral research: Integrating new and existing techniques. *MIS Quarterly*, 35, 2 (2011), 293-334.
51. Mason, C.H., and Perreault, W.D. Collinearity, power, and interpretation of multiple regression analysis. *Journal of Marketing Research*, 28, 3 (1991), 268-280.
52. Mayer, R.C., Davis, J.H., and Schoorman, F.D. An integrative model of organizational trust. *Academy of Management Review*, 20, 3 (1995), 709-734.
53. McKinney, V., and Yoon, K. The measurement of web-customer satisfaction: An expectation and disconfirmation approach. *Information Systems Research*, 13, 3 (2002), 296-315.
54. Nahapiet, J., and Ghoshal, S. Social capital, intellectual capital, and the organizational advantage. *Academy of Management Review*, 23, 2 (1998), 242-266.
55. Nelson, R.R., Todd, P.A., and Wixom, B.H. Antecedents of information and system quality: An empirical examination within the context of data warehousing. *Journal of Management Information Systems*, 21, 4 (2005), 199-235.
56. Ou, C.X., and Davison, R.M. Why eBay lost to TaoBao in China: The glocal advantage. *Communications of the*

ACM, 52, 1 (2009), 145-148.

57. Ou, C.X., Pavlou, P.A., and Davison, R.M. Swift guanxi in online marketplaces: The role of computer-mediated-communication technologies. *MIS Quarterly*, 38, 1 (2014), 209-230.

58. Pavlou, P.A., and Dimoka, A. The nature and role of feedback text comments in online marketplaces: Implications for trust building, price premiums, and seller differentiation. *Information Systems Research*, 17, 4 (2006), 392-414.

59. Podsakoff, P.M., MacKenzie, S.B., Lee, J.-Y., and Podsakoff, N.P. Common method biases in behavioral research: A critical review of the literature and recommended remedies. *Journal of Applied Psychology*, 88, 5 (2003), 879-903.

60. Podsakoff, P.M., and Organ, D.W. Self-reports in organizational research: Problems and prospects. *Journal of Management*, 12, 4 (1986), 531-544.

61. Rai, A., Lang, S.S., and Welker, R.B. Assessing the validity of IS success models: An empirical test and theoretical analysis. *Information Systems Research*, 13, 1 (2002), 50-69.

62. Rodríguez del Bosque, I.R., J. Collado, and Martín, H.S. Determinants of economic and social satisfaction in manufacturer–distributor relationships. *Industrial Marketing Management*, 35, 6 (2006), 666-675.

63. Seddon, P.B. A respecification and extension of the DeLone and McLean model of IS success. *Information Systems Research*, 8, 3 (1997), 240-253.

64. Srinivasan, S.S., Anderson, R., and Ponnarolu, K. Customer loyalty in e-commerce: An exploration of its antecedents and consequences. *Journal of Retailing*, 78, 1 (2002), 41-50.

65. Sun, Y., Fang, Y., Lim, K.H., and Straub, D.W. User satisfaction with information technology service delivery: A social capital perspective. *Information Systems Research*, 23, 4 (2012), 1195-1211.

66. Tsai, W., and Ghoshal, S. Social capital and value creation: The role of intrafirm networks. *The Academy of Management Journal*, 41, 4 (1998), 464-476.

67. Van de Vijver, F.J. *Methods and data analysis for cross-cultural research*. CA: Sage, Thousand Oaks, 1997.

68. Victor Chen, J., Chen, Y., and Capistrano, E.P.S. Process quality and collaboration quality on B2B e-commerce. *Industrial Management & Data Systems*, 113, 6 (2013), 908-926.

69. Wang, W.-T., Wang, Y.-S., and Liu, E.-R. The stickiness intention of group-buying websites: The integration of the commitment–trust theory and e-commerce success model. *Information & Management* (2016).

70. Wang, Y.S. Assessing e - commerce systems success: A respecification and validation of the DeLone and McLean model of IS success. *Information Systems Journal*, 18, 5 (2008), 529-557.

71. Xu, B., Lin, Z., and Shao, B. Factors affecting consumer behaviors in online buy-it-now auctions. *Internet Research*, 20, 5 (2010), 509-526.

72. Xu, J.D., Benbasat, I., and Cenfetelli, R.T. Integrating service quality with system and information quality: An empirical test in the e-service context. *MIS Quarterly*, 37, 3 (2013), 777-794.

73. Yang, H.E. Assessing the effects of e-quality and e-satisfaction on website loyalty. *International Journal of Mathematics and Computers in Simulation*, 3, 1 (2007), 288-294.

74. Yang, Z.L., Cai, S.H., Zhou, Z., and Zhou, N. Development and validation of an instrument to measure user perceived service quality of information presenting Web portals. *Information & Management*, 42, 4 (2005), 575-589.

75. Yoo, C.W., Kim, Y.J., and Sanders, G.L. The impact of interactivity of electronic word of mouth systems and E-Quality on decision support in the context of the e-marketplace. *Information & Management*, 52, 4 (2015), 496-505.

76. Zhang, H., Lu, Y., Shi, X., Tang, Z., and Zhao, Z. Mood and social presence on consumer purchase behaviour in C2C e-commerce in Chinese culture. *Electronic Markets*, 22, 3 (2012), 143-154.
77. Zheng, Y., Zhao, K., and Stylianou, A. The Impacts of information quality and system quality on users' continuance intention in information-exchange virtual communities: An empirical investigation. *Decision Support Systems*, 56, 1 (2013), 513-524.
78. Zhou, T. An empirical examination of continuance intention of mobile payment services. *Decision Support Systems*, 54, 2 (2012), 1085-1091.
79. Zhou, T., Lu, Y., and Wang, B. The relative importance of website design quality and service quality in determining consumers' online repurchase behavior. *Information Systems Management*, 26, 4 (2009), 327-337.
80. Zhou, Z., Fang, Y., Vogel, D.R., Jin, X.-L., and Zhang, X. Attracted to or locked in? Predicting continuance intention in social virtual world services. *Journal of Management Information Systems*, 29, 1 (2012), 273-306.

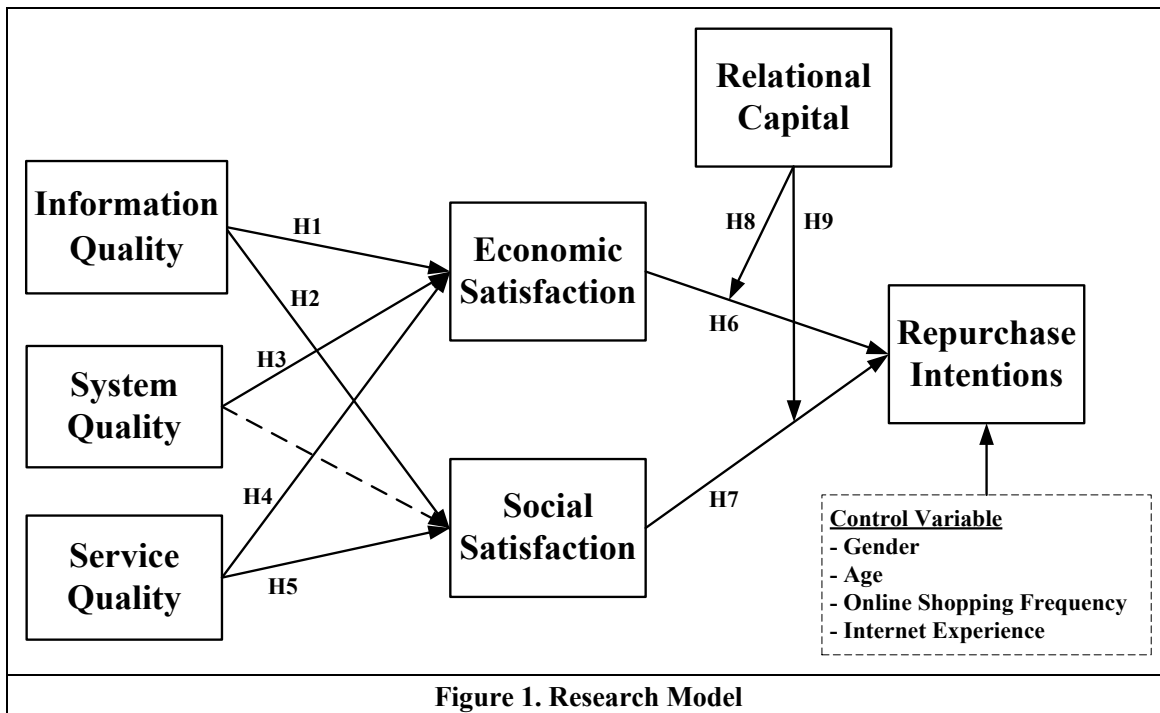


Figure 1. Research Model

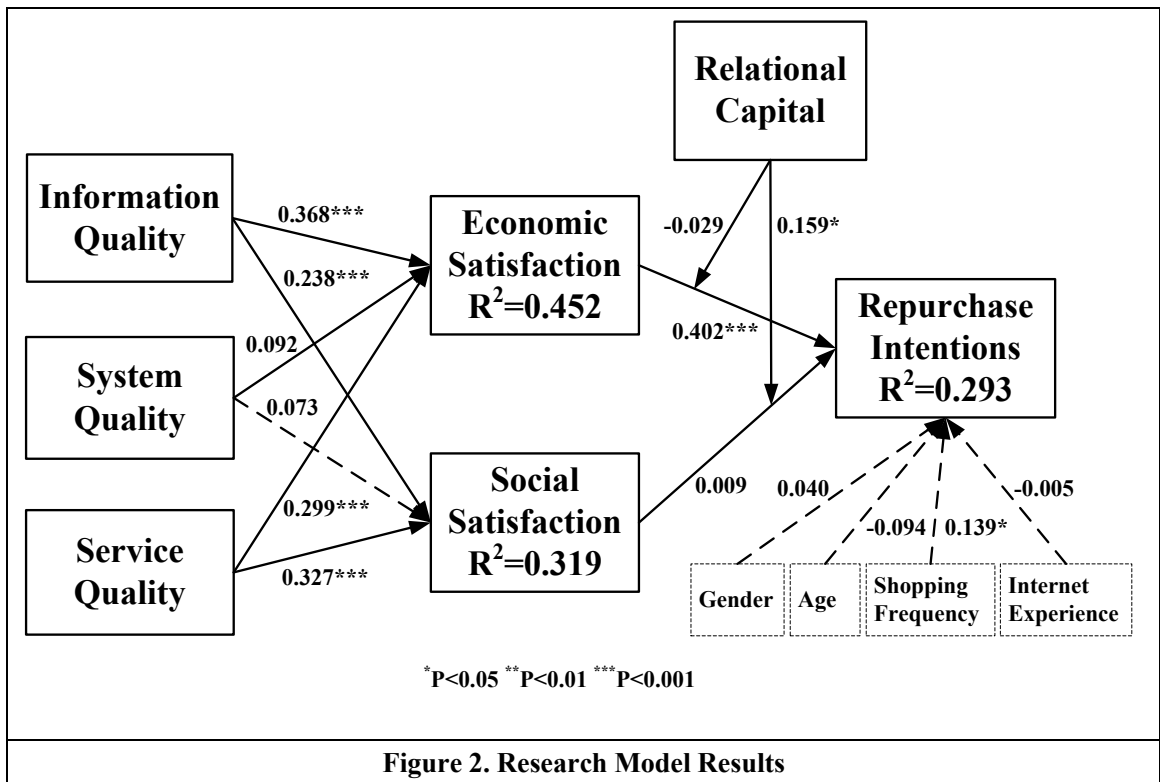


Figure 2. Research Model Results

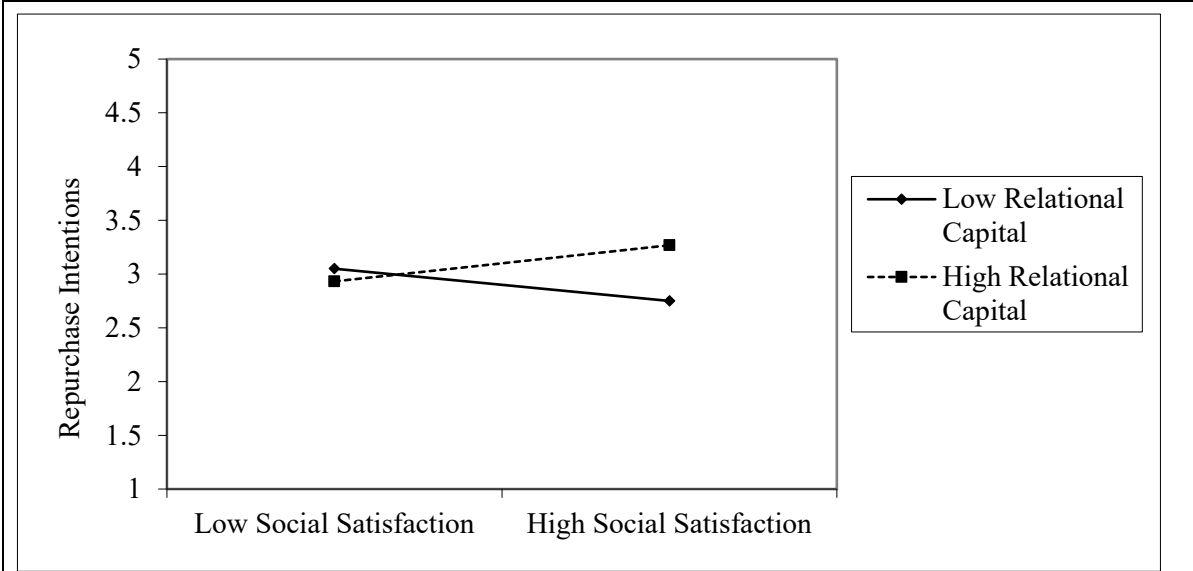


Figure 3. The Moderating Effect of Relational Capital on the Relationship between Social Satisfaction and Repurchase Intentions

Table 1. Demographics of Respondents (the Number of Subjects=311).

	<i>Percentage</i>
Gender	
Male	54.3%
Female	45.7%
Age	
18-20	5.8%
21-30	83.0%
31-40	10.9%
41 and above	0.3%
Education	
High school or below	2.6%
College	3.9%
University	47.5%
Graduate school or above	46.0%
Online shopping frequency (times in a month)	
1-3	62.7%
4-6	25.7%
7 or above	11.6%
Internet experience (in years)	
1-3	50.8%
4-6	38.9%
7 or above	10.3%
The expenditure on a recently purchased product (RMB)	
Below 10	2.9%
10–50	11.9%
51–100	25.1%
101–300	37.3%
301–500	9.0%
501–1000	7.7%
1001 or above	6.1%

Table 2. Results of Confirmatory Factor Analysis.

Construct	Items	Cronbach's Alpha	Composite Reliability	AVE
Information Quality (IQ)	4	0.798	0.869	0.625
System Quality (SQ)	4	0.815	0.880	0.649
Service Quality (SerQ)	4	0.793	0.868	0.623
Economic Satisfaction (CC)	4	0.764	0.848	0.583
Social Satisfaction (SC)	3	0.877	0.924	0.802
Relational Capital (RC)	3	0.704	0.839	0.634
Repurchase Intentions (RI)	3	0.861	0.915	0.783

Table 3. Means, Standard Deviation and Correlation.

Variable	Mean	S.D.	1	2	3	4	5	6	7	8	9	10	11
1. IQ	3.504	0.655	0.791										
2. SQ	3.594	0.675	0.662	0.806									
3. SerQ	3.537	0.690	0.636	0.601	0.789								
4. ES	3.623	0.662	0.620	0.516	0.589	0.764							
5. SS	3.364	0.791	0.494	0.427	0.522	0.610	0.896						
6. RC	3.585	0.720	0.465	0.384	0.481	0.559	0.541	0.796					
7. RI	3.868	0.753	0.506	0.467	0.462	0.479	0.321	0.366	0.885				
8. Gender	NA	NA	-0.061	-0.069	-0.060	-0.132	-0.018	0.043	0.012	NA			
9. Age	NA	NA	-0.047	-0.035	-0.002	0.031	-0.016	-0.049	-0.098	-0.050	NA		
10. Online Shopping Frequency in a Month	NA	NA	0.109	0.049	0.122	0.120	0.037	0.110	0.178	0.194	0.132	NA	
11. Internet Experience	NA	NA	0.047	-0.062	0.012	0.112	0.025	0.038	0.067	0.073	0.232	0.431	NA

Note: 1. Square root of AVE is the shaded numbers in the diagonal row.

2. NA=not applicable.

Table 4. Literature on the IS Success Model in E-Commerce Contexts

Study	Research Context	Key Influencing Variable	Final Outcome Variable
DeLone & McLean 2004 [25]	E-commerce	Information quality, system quality, service quality, use, user satisfaction	Net benefits
Ahn et al. 2007 [1]	Online retailing	Information quality, system quality, service quality, playfulness, perceived ease of use, perceived usefulness, attitude	Behavioral intention to use
Wang et al. 2008 [70]	E-commerce	Information quality, system quality, service quality, perceived value, user satisfaction	Intention to reuse
Zhou et al., 2009 [79]	B2C e-commerce	Website design quality, service quality, trust, satisfaction	Repurchase intention
Fang et al. 2011 [26]	B2C e-commerce	Information quality, system quality, service quality, distributive justice, procedural justice, interactional justice, trust, satisfaction, net benefits	Repurchase intention
Zhou 2012 [78]	Mobile commerce	Information quality, system quality, service quality, trust, flow, satisfaction	Continuance intention
Xu et al. 2013 [72]	E-service	Information quality, system quality, service quality, information satisfaction, system satisfaction, service satisfaction, usefulness, ease of use, enjoyment, attitude	Intention
Yoo et al. 2015 [75]	E-commerce	Interactivity of EWOM systems, e-quality of the website, decision support satisfaction	E-loyalty

Appendix A. Measurement Items

Constructs and Measurement	Loading
<i>Information Quality</i>	
1. The website of this seller provides me with information relevant to my needs.	0.772
2. The website of this seller provides me with sufficient information.	0.818
3. The website of this seller provides me with accurate information.	0.817
4. The website of this seller provides me with up-to-date information.	0.753
<i>System Quality</i>	
1. The website of this seller quickly loads all the text and graphics.	0.817
2. The website of this seller is easy to use.	0.870
3. The website of this seller is easy to navigate.	0.854
4. The website of this seller is visually attractive.	0.668
<i>Service Quality</i>	
1. The website of this seller provides on-time services.	0.854
2. The website of this seller provides prompt responses.	0.814
3. The website of this seller provides professional services.	0.769
4. The website of this seller provides personalized services.	0.712
<i>Economic Satisfaction</i>	
1. I was satisfied with online interactive service because of all the relevant product information this seller gave me.	0.806
2. I was pleased that online purchase service from this seller will save me time.	0.753
3. I am satisfied that advisory service from this seller will help me purchase my product more efficiently.	0.789
4. I am satisfied with the price–quality–ratio of this seller’s products.	0.702
<i>Social Satisfaction</i>	
1. Chatting online with this seller was an enjoyable experience for me.	0.914
2. The social aspect of the online interactions between this seller and me was very pleasant for me.	0.869
3. This interaction between this seller and me was a pleasant way to exchange information.	0.902
<i>Relational Capital</i>	
1. The relationship between this seller and me was characterized by mutual respect.	0.823
2. The relationship between this seller and me was characterized by mutual trust.	0.826
3. The relationship between this seller and me was characterized by high reciprocity.	0.737
4. The relationship between this seller and me was characterized by personal friendship*	
<i>Repurchase Intentions</i>	
1. Given the chance, I predict that I would consider buying products from this seller on TaoBao in the near future.	0.903
2. Given the opportunity, I intend to place an order from this seller on TaoBao again.	0.923
3. I will buy similar products from this seller on TaoBao again.	0.827

*Items were removed from further analyses due to low loading.

Appendix B. Common Method Bias Analysis

Construct	Indicator	Substantive Factor Loading (R₁)	R₁²	Method Factor Loading (R₂)	R₂²
IQ	IQ1	0.728***	0.530	0.063	0.004
	IQ2	0.908***	0.824	-0.098	0.010
	IQ3	0.774***	0.599	0.054	0.003
	IQ4	0.749***	0.561	-0.017	0.000
SQ	SQ1	0.821***	0.674	-0.011	0.000
	SQ2	0.828***	0.686	0.050	0.003
	SQ3	0.835***	0.697	0.017	0.000
	SQ4	0.740***	0.548	-0.072	0.005
SerQ	SerQ1	0.842***	0.709	0.024	0.001
	SerQ2	0.815***	0.664	0.015	0.000
	SerQ3	0.732***	0.536	0.034	0.001
	SerQ4	0.767***	0.588	-0.085	0.007
ES	ES1	0.800***	0.640	0.019	0.000
	ES2	0.946***	0.895	-0.195**	0.038
	ES3	0.940***	0.884	-0.146*	0.021
	ES4	0.288*	0.083	0.417***	0.174
SS	SS1	0.810***	0.656	0.129**	0.017
	SS2	0.997***	0.994	-0.154**	0.024
	SS3	0.883***	0.780	0.023	0.001
RC	RC1	0.881***	0.776	-0.073	0.005
	RC2	0.834***	0.696	0.007	0.000
	RC3	0.662***	0.438	0.076	0.006
RI	RI1	0.880***	0.774	0.032	0.001
	RI2	0.968***	0.937	-0.061	0.004
	RI3	0.801***	0.642	0.033	0.001
Average		0.809	0.672	0.003	0.013

Note: *p<0.05, **p<0.01, ***p<0.001

Appendix C. Hierarchical Regression Results.

Variables	DV—Repurchase Intentions		
	Model 1	Model 2	Model 3
Control Variables			
Gender	-0.033	0.015	0.022
Age	-0.129*	-0.098*	-0.080
Online Shopping Frequency	0.195**	0.109*	0.114*
Internet Experience	0.015	0.038	0.048
Main Effects			
Information Quality		0.227**	0.218**
System Quality		0.187**	0.197**
Service Quality		0.140*	0.125
Social Satisfaction		-0.003	0.001
Relational Capital		0.105	0.097
Moderating Effects			
Social Satisfaction X Relational Capital			0.124*
R ²	4.8%	33.3%	34.8%
ΔR ²		28.5%	1.5%
F(p-value)	3.838**	16.729***	15.992***
Effect Size (f ²)		0.299	0.022

Note: The number of respondents=311

Reported values are standardized regression coefficients.

*p<0.05, **p<0.01, ***p<0.001