Perceived Value of Online Services: Scale Validation and Managerial Implications

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Abstract

Marketing literature states perceived value is crucial in predicting customer choice in marketing literature. However, perceived value of online services can be different from its offline counterpart due to its temporal and spatial nature, which has been relatively under-researched, where a lacuna of theoretical frameworks and well-accepted measurement scales exists. This paper addresses the above research gap by developing a 19-item measurement scale that can be used to assess perceived value of online services. Data collected from a questionnaire survey of 147 customers of hotels in Sri Lanka were used to assess the reliability and validity of the proposed scale in a post-purchase situation, using exploratory and confirmatory factor analyses. The findings produce six value dimensions (conditional, epistemic, social, monetary, convenience and emotional value) all of which were found to demonstrate acceptable psychometric properties based on a variety of reliability and validity tests. Managerial and theoretical implications stemming from the empirical findings are also discussed.

Keywords: Perceived Value, Online Services, Measurement Scale, Value Dimensions, Reliability, Validity

1. Introduction

The concept of “perceived value” emerged as the central focus of the marketing concept as it addresses “what they (customers) want and believe they get from buying and using a seller’s product/service” (Woodruff, 1997 p. 140). As this clause indicates, creation of customer value has become a precondition for organizations to survive in today’s fiercely competitive marketplace, and has continued to receive extensive research interest among marketing scholars in the last few decades (Khalifa, 2004; Sánchez-Fernández & Iniesta-Bonillo, 2007). The Marketing Science Institute has included the definition of perceived value in its list of research priorities for 2012–2014.

Despite this wide interest, however, the concept of perceived value has often not been clearly conceptualized in the context of online services (Chang & Wang, 2011; Gummerus & Pihlström,
2011; Pura & Gummerus, 2007). Nevertheless, the concept and determinants of perceived value are believed to have changed with the rapid emergence of internet in the contemporary business arena (Pura & Gummerus, 2007). Perceived value of online services can be different from its offline counterpart mainly because of its temporal and spatial dimensions, that is, customers are liberated in perceiving value due to freedom of time and space offered by online services (Heinoen, 2004; Overby & Lee, 2006; Pura & Gummerus, 2007). In the context of online services, in addition to the product/service itself, context-specific and time-space conditions of service use contribute value to customers (Gummerus & Pihlstrom, 2011). The context may change due to external or internal influences such as network availability, accessibility issues or lack of time. While recent multidimensional scales have been created for measuring perceived value of tangible products (Sánchez-Fernández & Iniesta-Bonillo, 2007), a well-defined measurement scale to capture the essence of perceived value of online services does not exist in literature (Gummerus & Pihlstrom, 2011). This paper fills this research gap by developing a 19-item measurement scale that can be used to assess perceived value of online services, recognizing the contextual elements that influence the use of the service.

This paper is structured as follows. A synopsis of extant literature on perceived value is presented followed by a detailed discussion on the theoretical framework of this paper. This is followed by a discussion of the research setting and chosen research methodology. Then the analysis of empirical findings are presented and discussed in relation to prior literature followed by managerial and theoretical implications and suggestions for future research.

2. Literature Review

The concept of perceived value has found its roots in marketing theory (Kainth & Verma, 2011) and now has become an integral part of marketing literature in the present century. This interest stems mostly from the importance given by organizations to the creation of value for their different target markets. For an example, Slater (1997, p.166) emphasize that creation of customer value must be the reason for an organization’s existence and certainly for its success. As these words indicate, creation of perceived value has become a strategic imperative in building and sustaining a competitive advantage (Woodruff, 1997). More importantly, in marketing literature, the notion that loyalty and profits are strongly linked to perceived value is well established (Pura & Gummerus, 2007), and thus the concept of perceived value has become the fundamental basis for all activities of an organization (Holbrook, 1994; Sánchez-Fernández & Iniesta-Bonillo, 2007).

Given the importance of perceived value, it is not surprising that there is an abundance of definitions and conceptualizations of perceived value that have been developed during last two decades. A common aspect in most definitions of perceived value in extant literature is that value is perceived by the customer based on his/her experience with, or knowledge about a product/service which usually results in an evaluation of the desirability of use. As such, the term perceived value used in this paper is defined broadly to encompass customer’s evaluation of online service based on his/her experience in using the service: customer’s assessment of the benefits of using a product/service based on perceptions and experiences of use that facilitate achieving the customer’s purpose in a specific use situation compared to other alternatives.

However, Sanchez-Fernandez and Iniesta-Bonillo (2007) stress that operationalization of perceived value is quite fragmented with the emergence of different research approaches. In extant literature, it is common to measure perceived value as a uni-dimensional construct that traditionally has emphasized price perceptions (Dodds, Monroe, & Grewal, 1991; Monroe, 1990; Monroe & Chapman, 1987). Monroe (1990) further emphasizes that the perceived overall value is a weighted
sum of acquisition and transaction value. Thus, one approach to investigate perceived value is to divide it into acquisition, transaction, in-use and redemption value (Monroe & Chapman, 1987). Acquisition value emphasizes the net gain associated with the benefits and the money given up by acquiring and using a product or service. Transaction value refers to the psychological satisfaction or pleasure obtained by purchasing the product at a reasonable price compared to the customer’s internal reference price (Monroe & Chapman, 1987). In-use value means utility derived from using the product and redemption value relates to benefits obtained from service termination (Parasuraman & Grewal, 2000). In the context of online services, acquisition and in-use value are believed to dominate, as transaction value emphasizes price and sees customers as rational beings that are aware of current price level and consider the benefits and sacrifices needed to obtain the product or service. Further, the redemption value, which becomes a salient feature in the latter stages of product or service usage, is hardly relevant if the service use is not invoiced as a continuous subscription. Hence, a broader view on perceived value which also takes into account other aspects of consumption which are more relevant in the context of online services is needed.

Zeithmal (1988) provides a general view on perceived value as “perceived value is the consumer’s overall assessment of the utility of a product based on what is received and what is given” (p.14) that depicts perceived value independent of when the assessment is made during consumption. Thus, perceived value is constituted as a trade-off between benefits and sacrifices. The perceived sacrifices include non-financial aspects such as time, search costs, and physical and mental efforts (Dodds et al., 1991). Customer has to invest money and/or time in order to receive the service. Most importantly, he suggests that situational or contextual factors can affect the formation of value perceptions, and hence perceived value is subject to the influence of the frame of reference of the customer.

Other complementary views of perceived value, which further differentiates people based on their consumption motives are the definitions proposed by Holbrook (1994) and Hirschman and Holbrook (1982). Hirschman and Holbrook (1982) describe customers as either problem solvers or seekers of fun and enjoyment, and thus refer to a utilitarian versus hedonic consumption. The hedonic view highlights the importance of a fun experience in contrast to the effective achievement of a utilitarian goal. Holbrook (1994) further postulates that the consumption experiences most likely involve more than one type of value simultaneously. However, differentiating between hedonic and utilitarian might be difficult in the context of online services where people are actively taking part in service process and enjoying fun experience while achieving a goal (Chang & Wang, 2011; Mathwick, Malhotra, & Ridgon, 2001; Overby & Lee, 2006). Thus, consumption motives in the context of online services should be measured using a broader framework.

An extensive framework of consumption related values, which incorporates literature from several fields, is offered by the consumption-values theory by Sheth, Newman and Gross (1991). The five value dimensions identified by Sheth et al. (1991) are functional, social, emotional, epistemic and conditional value where any or all of the five value dimensions may influence the customer choice behavior, that is, to buy or not to buy, to choose one type of product or service over another, and to choose one brand over another. Each value dimension in the theory is consistent with various components of models advanced by Maslow (1970) and Katz (1960).
3. Theoretical Framework

Out of the previously mentioned conceptualizations of perceived value, the consumption-values theory proposed by Sheth et al. (1991) was used as the theoretical foundation of this paper, as it contains both utilitarian and hedonic view of consumption by including goal-oriented consumption in functional value as well as the emotional aspects of hedonic consumption. More importantly, the theory takes into account context dependency. In addition, the recent developments on the work of Sheth et al. (1991) (Gummerus & Pihlström, 2011; Pura, 2005; Pura & Gummerus, 2007) in the context of mobile services was used in conceptualizing the key theoretical dimensions of perceived value of online services. Accordingly, six dimensions were identified as conditional, epistemic, social, monetary, convenience and emotional value.

Functional value represents value derived from effective task fulfillment (Sheth et al., 1991). In consumer behavior literature, effective task fulfillment has also been referred to as the input/output ratio, convenience, availability or ease of use (Holbrook, 1994). In online services, self-services are often perceived to be better than interpersonal service options, as they allow the saving of time and money (Mathwick et al., 2001). Moreover, convenience is a major attractor in online services in addition to effective task fulfillment (Overby & Lee, 2006). Based on the above arguments, Gummerus and Pihlström (2011) and Pura and Gummerus (2007) identify two value dimensions in functional value aspect namely, monetary value and convenience value, reflecting the nature of mobile services. Monetary value relates to monetary benefit or superiority compared with the alternatives whereas convenience value refers to ease and speed of achieving a task effectively and conveniently (Gummerus & Pihlström, 2011; Pura & Gummerus, 2007).

Social value relates to social approval and the enhancement of self-image among other individuals (Sheth et al., 1991). Support for the importance of social reputation in the form of esteem can be found in several scholars work (Sheth et al., 1991; Sweeney & Soutar, 2001). In their subsequent work on perceived value, Sweeney & Soutar (2001) define social value as “the utility derived from the product’s ability to enhance social self concept” (p. 211). Thus, social value derives mostly from product or service use shared with others (Sheth et al., 1991).

Emotional value is acquired when a product or service arouses feelings or affective states (Sheth et al., 1991; Sweeney & Soutar, 2001). Play or fun gained by using the service for its own sake is also related to emotional value (Holbrook, 1994). Enjoyment and fun seeking have been reported as customers’ motives to use online services (Sweeney & Soutar, 2001). In addition, use of technology often raises positive feelings, regardless of the service use (Overby & Lee, 2006).

Epistemic value relates to experienced curiosity, novelty or gained knowledge (Sheth et al., 1991). The primary reason for purchase may be curiosity about a new product/service. Novelty and variety seeking have also been suggested to trigger product search (Hirschman & Holbrook, 1982). However, online services are often used without a real functional need and therefore may be used rarely after the novelty effect wears out. Sheth et al. (1991) also claim that customers who are motivated by epistemic value often return to their regular consumption patterns after satisfying their need to change.

Conditional value refers originally to circumstances which impact choice. Such situations may be seasonal, once in a life time events, or emergency situations (Sheth et al., 1991). Holbrook (1994) postulates that conditional value depends on the context in which the value judgment occurs and exists only within a specific situation. Previous research on perceived value by Rescher (1969)
defines perceived value as the outcome of an evaluation made by a single customer of the object in a certain context based on his/her underlying values. However, the previous conceptualizations of conditional or situational use often relates to traditional consumption experiences of certain goods in certain events (e.g., at Christmas). Therefore the concept of conditional value needs to be updated to depict the real situational nature of online services on the move, independent of time and place but dependent on the social and emotional context, technology and network availability. Thus, conditional value relates to the concept of context which is based on the time, location, social environment, infrastructure availability, the technology environment, and user specific criteria (e.g., mood, work or free time) (Mathwick et al., 2001). Hence, conditional value in online services context should reflect a situation related to the interaction between humans, applications, and the surrounding environment results in customized information according to the current location of the customer.

4. Methodology

Following the positivistic research tradition and the quantitative research approach, in this paper survey research strategy was adopted.

4.1 Measures

In line with Gummerus and Pihlström (2011), this paper defined perceived value as a reflective second-order construct with six first-order constructs (dimensions). Self-administered questionnaire consists of a five-point Likert scale (ranging from 1= “strongly disagree” to 5= “strongly agree”) was used to collect data. The questionnaire included items that were derived from the extant literature. Since, there is a limited number of scholarly articles that deal directly with perceived value of online services, appropriate scales were not available. Thus, the definition of value dimensions proposed by Sheth et al. (1991), and wording of questions to measure perceived value of mobile services highlighted in the work of Gummerus and Pihlström (2011) and Pura and Gummerus (2007) was used as a reference to develop measurement items. Most of the items were modified and reworded to reflect the research setting of this paper. All measurement items used are presented in Table 1 as follows.

| Construct/Concept | Dimension       | Indicators/Items                                      |
|-------------------|----------------|-------------------------------------------------------|
| Customer Perceived Value | Emotional value | Provide personalized products/services                 |
|                   |                | Less risky                                            |
|                   |                | Give enough privacy                                   |
|                   |                | Increases confidence                                  |
|                   |                | Lessen anxiety                                        |
|                   | Social value   | Feel accepted by others                               |
|                   |                | Make a good impression by others                      |
|                   |                | Give social approval                                  |
|                   |                | Personalized products/services                         |

(Contd.)
4.2 Research Setting, Sample and Data Collection Method

Hotel industry in Sri Lanka was used as the research setting of this paper due to its concrete effort to strategically position the country as the number one tourist destination in Asia through its online initiatives. The list of hotels in Sri Lanka was obtained from the Accommodation Guide published by Sri Lanka Tourism Development Authority in 2012. Hotels from the Western and Southern regions were abstracted from the list. A Google search was done for all star-class hotels in the abstracted list and the hotels having a Website were short listed. Fifty hotels were then selected from the above list and stratified under two independent variables; star category of the hotel and resort region as follows (see Table 2). The chosen sample represents the entire hotels in Sri Lanka.

| Construct/Concept | Dimension | Indicators/Items |
|-------------------|-----------|------------------|
| Monetary value    |           | Reasonably priced products/services |
|                   |           | Offer better value for money |
|                   |           | No need of additional service charges |
|                   |           | Provide discounts/ special offers |
| Convenience value |           | Make life easier |
|                   |           | Save time |
|                   |           | Get faster services than using other channels |
|                   |           | An efficient way to manage time |
| Epistemic value   |           | Experiment with new ways of doing things |
|                   |           | Test new technologies |
|                   |           | Arouse curiosity |
| Conditional value |           | Time and place independency |
|                   |           | Real time information and interaction |
|                   |           | Access products/ services instantly |

Table 2: The Sample of Hotels

| Star Category | Number of Hotels | Western Region | Southern Region |
|---------------|------------------|----------------|-----------------|
| 5-Star        | 6                | 2              |
| 4-Star        | 4                | 2              |
| 3-Star        | 5                | 3              |
| 2-Star        | 6                | 4              |
| 1-Star        | 12               | 6              |
| Total         | 33               | 17             |

A convenience sample of 300 customers those who have experienced the selected hotels’ Internet practices at least once was used to assess reliability and validity of the proposed measurement scale. The survey generated 178 responses, out of which 21 were unusable as the respondents had not
previously used online services of the respective hotels. Additionally, 10 responses including over 10% missing values were excluded from further analysis. The final sample analyzed consisted of 147 responses. Sample demographics are presented in Table 3.

Table 3: Sample Characteristics

| Characteristics               | Frequency | Percentage (%) |
|------------------------------|-----------|----------------|
| Type of the Customer         |           |                |
| International                | 78        | 53.06          |
| Domestic                     | 69        | 46.94          |
| Gender                       |           |                |
| Male                         | 77        | 52.4           |
| Female                       | 70        | 47.6           |
| Age                          |           |                |
| Under 19                     | 8         | 5.4            |
| 20 - 29                      | 25        | 17.0           |
| 30 - 39                      | 59        | 40.1           |
| 40 - 49                      | 21        | 14.3           |
| 50 – 59                      | 19        | 13.0           |
| 60 & Over                    | 15        | 10.2           |
| Education (highest level completed) |   |                |
| Primary                      | 7         | 4.8            |
| Secondary                    | 19        | 12.9           |
| University                   | 71        | 48.3           |
| Postgraduate                 | 22        | 15.0           |
| Professional/Vocational Qualifications |   |                |
| Purpose of Visit             |           |                |
| Pleasure                     | 81        | 55.0           |
| Business                     | 22        | 15.0           |
| Visiting Friends & Relatives | 12        | 8.2            |
| Conventions & Meetings       | 14        | 9.5            |
| Religious & Cultural         | 11        | 7.5            |
| Others                       | 7         | 4.8            |

5. Data Analysis

Since the purpose of this paper is to produce a general scale that would be appropriate for assessing perceived value of online services, the survey data were subjected to various scale reduction/refinement analyses consistent with standard procedures for developing and refining better measurement scales (Churchill 1979; Anderson & Gerbing, 1982). First reliability analysis was conducted using SPSS version 21.0 by grouping the items according to the six a priori conceptual dimensions from which they were derived (See Table 1). Then the list of items within each dimension
was pruned by examining corrected item-to-total correlations and deleting items whose elimination improved internal consistency reliability measured in terms of coefficient alpha (Cronbach, 1951). The statistical criteria for item retention were (1) a corrected item-to-total correlation above 0.4 (Churchill, 1979; Saxe & Weitz, 1982) and (2) a coefficient alpha above 0.7 (Churchill, 1979; Nunnally, 1978). Four items (one item each from social, emotional, convenience and epistemic value dimension) were dropped as their item-to-total correlations were below the threshold limit. Remaining items confirmed high reliabilities (coefficient alpha above 0.7).

Next exploratory factor analysis (EFA) with principal component extraction and varimax rotation was conducted to uncover the underlying patterns of each and every a priori dimension. To assess the factorability of items, three indicators were examined, namely, (1) Kaiser-Meyer-Olkin (KMO) measure of sampling adequacy, (2) Barlett’s test of sphericity and (3) communalities. EFA results revealed KMO measures of sampling adequacy of 0.824, which is well above the conventional threshold of 0.6 (Kaiser, 1974), as well as chi-square value and p-values for Barlett’s test of sphericity equals to 1041.084 and 0.000 respectively. Communalities were also found well above 0.5 suggesting satisfactory factorability for all items.

In addition, the factorial solutions obtained from EFA were further evaluated as the number of factors that exist in a dataset is determined by its Eigenvalues and percentage of variance (Malhotra & Peterson, 2001). Eigenvalues indicate the number of factors to be extracted for which the sum of Eigenvalues is equal to the number of variables (Malhotra & Peterson, 2001). Many scholars (Hair, Tatham, & Black., 2006; Malhotra & Peterson, 2001) suggest that if the Eigenvalue of factors exceeds 1, they should be classified as significant and useful as unique to factors; otherwise they should not be further analyzed. Even though, there are no strict guidelines the larger the percentage of variance extracted is better, thus 60% could serve as a minimum acceptable target (Hinkin, 1998).

This iterative process resulted in the final measurement scale consisting of 19-items on 6 dimensions with Eigenvalues greater than 1 (See Table 4), later labeled and defined as:
1. Emotional value: Product/ service generates feelings or affective states
2. Social value: The utility derived from the product/ service ability to enhance social-self concept
3. Monetary value: Value derived from task fulfillment. Monetary benefit or superiority compared with the alternatives
4. Convenience value: Ease and speed of achieving a task effectively and conveniently
5. Epistemic value: Experienced curiosity, novelty or gained knowledge
6. Conditional value: Depends on the context and exists only in a specific situation. Context includes any information that characterizes a situation related to the interaction between humans, applications and the surrounding environment

The resulting factor structure explained 89.468 % of the total variance where factor loading of the items were clear on 6 factors ranged from 0.839 to 0.992 (See Table 4). As an additional verification of the reliabilities and factor structure of the 19-item measurement scale, confirmatory factor analysis (CFA) was then conducted using SmartPLS 2.0. Hair, Ringle and Sarstedt (2013) suggest that item loadings should be at least 0.7 or more in order to achieve item reliability of approximately 0.5. All measurement items loaded significantly and highly (between 0.704 and 0.976) on their intended constructs achieving unidimensionality as reported in Table 4.
Table 4: CFA and EFA Results of the Proposed Measurement Scale of Perceived Value on Online Retailing

| Factor            | CFA Loadings | EFA Loadings |
|-------------------|--------------|--------------|
|                   | Loading      | t-value      | 1  | 2  | 3  | 4  | 5  | 6  |
| Monetary Value    |              |              |    |    |    |    |    |    |
| α = 0.947, CR = 0.9688, AVE = 0.8859 |              |              |    |    |    |    |    |    |
| MV1               | 0.938        | 65.424       | 0.841 |    |    |    |    |    |
| MV2               | 0.950        | 75.543       | 0.972 |    |    |    |    |    |
| MV3               | 0.953        | 62.580       | 0.948 |    |    |    |    |    |
| MV4               | 0.924        | 37.764       | 0.953 |    |    |    |    |    |
| Social Value      |              |              |    |    |    |    |    |    |
| α = 0.906, CR = 0.9453, AVE = 0.8525 |              |              |    |    |    |    |    |    |
| SV1               | 0.962        | 106.624      | 0.972 |    |    |    |    |    |
| SV2               | 0.848        | 26.178       | 0.839 |    |    |    |    |    |
| SV3               | 0.956        | 89.616       | 0.946 |    |    |    |    |    |
| Emotional Value   |              |              |    |    |    |    |    |    |
| α = 0.940, CR = 0.9587 , AVE = 0.8531 |              |              |    |    |    |    |    |    |
| EV1               | 0.955        | 135.002      | 0.902 |    |    |    |    |    |
| EV2               | 0.886        | 22.538       | 0.953 |    |    |    |    |    |
| EV3               | 0.955        | 139.320      | 0.914 |    |    |    |    |    |
| EV4               | 0.896        | 29.913       | 0.917 |    |    |    |    |    |
| Convenience Value |              |              |    |    |    |    |    |    |
| α = 0.980, CR = 0.9758 , AVE = 0.9307 |              |              |    |    |    |    |    |    |
| CV2               | 0.939        | 59.887       | 0.971 |    |    |    |    |    |
| CV3               | 0.971        | 114.943      | 0.992 |    |    |    |    |    |
| CV4               | 0.974        | 156.610      | 0.973 |    |    |    |    |    |
| Epistemic Value   |              |              |    |    |    |    |    |    |
| Inter-item correlation = 0.886, CR = 0.9706, AVE = 0.9429 |              |              |    |    |    |    |    |    |
| EPV1              | 0.967        | 67.666       | 0.970 |    |    |    |    |    |
| EPV2              | 0.975        | 127.865      | 0.952 |    |    |    |    |    |
| Conditional Value |              |              |    |    |    |    |    |    |
| α = 0.943, CR = 0.9737, AVE = 0.9250 |              |              |    |    |    |    |    |    |
| CONV1             | 0.975        | 159.214      | 0.961 |    |    |    |    |    |
| CONV2             | 0.957        | 114.943      | 0.968 |    |    |    |    |    |
| CONV3             | 0.962        | 156.610      | 0.916 |    |    |    |    |    |

Note. CR = Composite Reliability
Next, the bootstrapping procedure was conducted to estimate the significance of each measurement item by examining the t-statistics. For this paper, bootstrap t-statistics were computed on 500 resamples with cases set at 147 which must be the same as the number of observations in the original data (Hair, Ringle & Sastedt, 2011). The critical t-statistic for a two-tailed test is 1.96 at 0.05 significance level (Hair et al., 2011). All the factors loadings were statistically significant at 0.05 significance level. CFA results (See Table 4) reconfirmed unidimensionality of the scale with satisfactory reliability.

Measurement scale’s high reliability and consistency factor structure provide support for its trait validity. However, high reliabilities and internal consistencies are not sufficient to ensure the scale’s construct validity (Churchill, 1979). The scale must satisfy certain other conceptual and empirical criteria to be considered as having acceptable construct validity (Churchill, 1979). Thus, two types of validity, namely convergent and discriminant validity were examined to further evaluate construct validity of the 19-item measurement scale.

Convergent validity is evident when each measurement item correlates strongly with its intended theoretical construct (Gefen & Straub, 2004). Sufficient convergent validity is achieved when average variance extracted (AVE) value of a construct is at least 0.5 (Fornell & Larcker, 1981). CFA results revealed that the AVE values of all six dimensions are well above 0.8, fulfilling the 0.5 threshold value demonstrating convergent validity. Discriminant validity indicates the extent to which each construct is more highly related to its own measurement items than with other constructs. Discriminant validity is achieved when two criteria are fulfilled. First, the measurement items should exhibit high loadings on their theoretically intended constructs and must not load highly on any other constructs (Gefen & Straub, 2004). Second, the constructs show satisfactory discriminant validity when the square root of the AVE is greater than the inter-construct correlations (Fornell & Larcker, 1981; Gefen & Straub, 2004). Discriminant validity was examined through the correlation matrix of the dimensions as presented in Table 5.

When comparing the square roots of the AVE for each dimension with the correlations among other dimensions, Table 5 reveals that the square root of the AVE as indicated in the diagonal elements are larger than the off-diagonal correlations in rows and columns. Hence, the discriminant validity is supported. These results are indicative of the validity of the proposed scale’s component dimensions.

**Table 5: Correlation Matrix and Square Roots of AVE**

| Construct            | 1   | 2   | 3   | 4   | 5   | 6   |
|----------------------|-----|-----|-----|-----|-----|-----|
| 1. Monetary Value    | 0.79|     |     |     |     |     |
| 2. Convenience Value | 0.408| 0.8 |     |     |     |     |
| 3. Social Value      | 0.294| 0.327| 0.88|     |     |     |
| 4. Emotional Value   | 0.378| 0.500| 0.636| 0.87|     |     |
| 5. Epistemic Value   | 0.230| 0.404| 0.205| 0.327| 0.99|     |
| 6. Conditional Value | 0.310| 0.709| 0.154| 0.453| 0.457| 0.86|

Note. Square roots of AVE are reported on the diagonal. All correlations are significant at the 0.01 level (2-tailed).
6. Conclusion

This paper employed a rigorous scale development procedure to conceptualize, construct, refine, and test a concise, 19-item scale for measuring perceived value of online services. Each of the six identified and verified factors (emotional, social, monetary, convenience, conditional and epistemic value) had a significant impact on perceived value of online services. The 19-item measurement scale became methodologically sound as it exhibits not only predictive validity but, equally importantly, convergent and discriminant validity as well as internal consistency reliability. Development of the measurement scale of perceived value has paved the way forward for hotels to better understand the value perceptions of its customers to improve service, thus competitively advantaged in the long run. For managers, the 19 items across six factors can serve a useful diagnostic purpose.

6.1 Theoretical & Managerial Implications

Prior literature has often used perceived value measures that estimate solely price perceptions (Monroe, 1990). Value for money or customer sacrifices appear not to dominate perceived value of online services to the same extent that they seem to be in the offline context, rather a multidimensional view that recognizes value dimensions related to both content and use, is necessary (Sweeney & Soutar, 2001). In this backdrop, this paper contributes to extant literature by conceptualizing and validating a 19-item scale for measuring perceived value of online services, reflecting its contextual nature. Moreover, the six-dimension measurement scale adds to extant literature by establishing a basis for further theoretical advances on the role of situation-specific factors and their influence on perceived value of online services derived from service use.

From a managerial perspective, the situation-specific factors are important for understanding under which conditions customers choose online service content over other possible media like catalogues, newspapers, and so forth. In other words, similar services can be obtained through many different channels/media that compete with each other and online services are used in some specific contexts in which they are perceived more valuable than the other alternatives. Although it is difficult to anticipate situations in which customers will use online services, the results of this paper provide some indications on the kind of conditions under which online services are preferred by customers. Thus, on a practical note, this paper increases understanding of managers on how context influences continuous service use. They may also provide ideas on how to target the services at those user segments that most likely end up in similar situations and would perceive the services especially valuable.

6.2 Limitations and Future Research Directions

Since this study was conducted in an Asian country with online services at a developing phase, the findings cannot be generalized as such but rather provide insights for future research. More importantly, customers’ value perceptions may differ in different cultures and the weight of the influence of different value dimensions should be interpreted cautiously with regard to Asian markets where social influence of the group tends to be higher than Europe, where the culture is considered to be more individualistic. The 19-item measurement scale, as such in general can be applied to assess services in different markets, but more research is needed in different types of online services that are at different phases of development, and different online user groups in different cultural and situational milieus with regard to online services. Furthermore, longitudinal studies on customers’ value perception changes are certainly a fruitful pursuit that will contribute towards understanding the dynamic nature of perceived value.
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