Re-examine the measure of values Cross-culturally: the case of recreation visitors in Hong Kong and Taiwan

Chieh-Lu Li, Yi-Chung Hsu, Chi-Chuan Lue, and James D. Absher

Abstract — Parks and recreation areas around the world increasingly serve as international visitor attractions and play an important role in the international tourism industry. Given the increasingly diverse visitors, changes in racial and ethnic composition have confronted the management of parks and recreation areas. Since values presumably influence perceptions and behaviors among members of different cultures, studying values among culturally diverse visitors are important if we are to understand their influence on perceptions as well as parks and recreation behavior. We are not aware of any measure of recreation or leisure values that has been validated cross-culturally. In order to better understand this issue, the purposes of this study are to examine two different types of broad values measures (i.e., Hofstede's measures of values and Kahle's List of Values [LOV]) that have been validated cross-culturally, and test values' utility to predict service quality, satisfaction, and behavioral intentions, both in Hong Kong and Taiwan. In 2005-2008, the visitors to Pokfulam Country Park in Hong Kong and Taroko National Park in Taiwan were surveyed. Using a convenient purposive on-site sampling approach, at sites known to be heavily used by visitors with diverse ethnic backgrounds, we obtained a sample combining the Hong Kong and Taiwan recreation visitors. The results from data analyses showed that Hofstede's measure of values, as employed in the park and recreation context, needs to be further elaborated and refined to provide acceptable validity and reliability. On the other hand, we found the LOV to be a meaningful and useful measure of values in both settings. The findings also showed LOV's four dimensions of values, i.e., Respect, Harmony, Achievement, and Hedonism, predicted visitors' perceptions of service quality, satisfaction, and behavioral intentions. Discussion of the findings and implications are provided.

Index Terms — Hofstede's measure of values, Kahle's List of Values, customer service, parks and recreation

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1 INTRODUCTION

Parks and recreation areas around the world increasingly serve as international tourist attractions and play an important role in the international tourism industry.

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The diverse visitors also bring various values visiting parks and recreation settings. Since cultural values are presumably central to cultural differences that may exist among ethnic and national groups [1], [2], [3], [5], [7], and allegedly influence perceptions and behaviors, we assume that this is true with respect to park visitation behavior and engaging in recreation. Research on factors contributing to a better understanding of values among diverse clienteles will help improve park management on the one hand and promote a positive cultural understanding on the other [4], [6], [8]. Taking from the perspectives of cultural anthropology and service marketing, the purposes of this study are two folds, first, to examine two different types of broad values measures (i.e., Hofstede's measures

of values and Kahle's List of Values [LOV]) that have been validated cross-culturally, and second, test values' utility to predict service quality, satisfaction, and behavioral intentions, both in Hong Kong and Taiwan [9].

2 METHODS

In 2005-2008, the visitors to Pokfulam Country Park in Hong Kong and Taroko National Park in Taiwan were surveyed. Using a convenient purposive on-site sampling approach, at sites known to be heavily used by visitors with diverse ethnic backgrounds, we obtained a sample including the Hong Kong and Taiwan recreation visitors (N=1782). In the Hong Kong sample (n=702), we mainly focused on three cultural groups, i.e., Hong Kong residents, Mainland China visitors, and Westerns; whereas, we focused on Taiwan residents, Japanese visitors, and Westerns in the Taiwan sample (n=1080).

3 RESULTS

We used reliability analysis to test Hofstede's measure of values and LOV. The results showed that Hofstede's four dimensions of values, either following the theoretical patterns (i.e., reversely coding the latter two items in each dimension) or the initial response styles (i.e., data without reversely coding the items), were not reliable according to their Cronbach's alpha values of dimensions (the rule of thumb for acceptable alpha values is 0.70). On the other hand, LOV four dimensions showed acceptable alpha values in the parks and recreation context (Table 1). We then used multiple regression analysis to test the predictive power of LOV's four dimensions of values on service quality, satisfaction, and behavioral intentions indices. The results showed all the multiple regression models were significant at the 0.001 level, but the R-square values ranged from 0.07 to 0.33 (Table 2). Lastly, when service quality and satisfaction indices joining LOV dimensions to predict behavioral intentions, the R-square value reached 0.52 (Table 3). In other words, the combined effects of LOV dimensions, service quality and satisfaction indices accounted for 52 percent of variance in explaining behavioral intentions.

4 DISCUSSION

The testing of Hofstede's measure of values and the List of Values suggests that values, as measured in the parks and recreation context, need to be further refined to be more meaningful and useful. If, for example, we consider criterion-related validity, with predicting service quality, satisfaction, and behavioral intentions as the criterion, then Hofstede's measure fails. On the other hand, the combined effects of LOV dimensions of values predicting service quality, satisfaction and behavioral intentions ranged from 7% to 33% (R-square) of the variance suggested that there was, in fact, something there but the measurement method of values dimensions was simply not accounting for it very well. The measurement of values in parks and recreation must be improved for greater variance to be explained.

TABLE 1

THE RELIABILITY ANALYSIS OF HOFSTEDE'S MEASURE OF VALUES AND LIST OF VALUES

Hofstede's four dimensions of values[a]	Cronbach's alpha
Power distance	0.09
Individualism	0.01
Masculinity	0.13
Uncertainty avoidance	-0.42[b]
Hofstede's four dimensions of values[c]	**Cronbach's alpha**
Power distance	0.49
Individualism	0.55
Masculinity	0.61
Uncertainty avoidance	0.64
List of Values	**Cronbach's alpha**
Respect	0.87
Harmony	0.82
Achievement	0.80
Hedonism	0.88

Note:

[a] The latter two items in each dimension were reversely coded to keep the same directional measurement.

[b] When a negative Cronbach's value was derived, the reliability model assumption was violated.

[c] The analysis results without reversely coding of the latter two items in each dimension.

We found hedonism dimension repeatedly predicts perception of service quality and behavioral intentions. The values such as "fun and enjoyment" and "excitement" were important to predict service quality and behavioral intentions. In particular, we may conclude that combination of the values dimensions such as LOV along with perceptions of service quality and satisfaction were useful to predict visitors' behavioral intentions such as repeated visits. The findings have implications for management of diverse visitors in parks and recreation. The value dimensions found in this study were meaningful enough to offer managers, translating abstract values into actionable portraits on which to base service and product development, communication strategies, and other marketing actions to match different visitors' value orientations. We advocate future research continues to explore this line of investigation so as to provide niche services and maximize customer satisfaction.

TABLE 2

MULTIPLE REGRESSION OF SERVICE QUALITY, SATISFACTION, AND BEHAVIORAL INTENTION ON RESPECT, HARMONY, ACHIEVEMENT, AND HEDONISM DIMENSIONS OF VALUES

Dimensions of values [a]	Service quality index [bc]				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.13	0.002			
Harmony dimension	-0.09	0.027			
Achievement dimension	0.12	0.012	56.91	< 0.001	0.18
Hedonism dimension	0.28	< 0.001			
Dimensions of values	Facility index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.09	0.055			
Harmony dimension	0.02	0.634			
Achievement dimension	0.04	0.479	19.21	< 0.001	0.07
Hedonism dimension	0.17	< 0.001			
Dimensions of values	Service index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.10	0.027			
Harmony dimension	-0.04	0.339			
Achievement dimension	0.13	0.009	35.65	< 0.001	0.13
Hedonism dimension	0.20	< 0.001			
Dimensions of values	Information index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.14	0.001			
Harmony dimension	-0.11	0.007			
Achievement dimension	0.10	0.038	55.27	< 0.001	0.18
Hedonism dimension	0.30	< 0.001			
Dimensions of values	Management index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.11	0.010			
Harmony dimension	-0.12	0.006			
Achievement dimension	0.16	0.019	41.38	< 0.001	0.14
Hedonism dimension	0.26	< 0.001			
Dimensions of values	Satisfaction index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.05	0.180			
Harmony dimension	0.25	< 0.001			
Achievement dimension	0.14	< 0.001	56.35	< 0.001	0.13
Hedonism dimension	-0.05	0.108			
Dimensions of values	Behavioral intentions index				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	012	< 0.001			
Harmony dimension	-0.12	< 0.001			
Achievement dimension	0.14	< 0.001	192.76	< 0.001	0.33
Hedonism dimension	0.46	< 0.001			

Note: [a] Respect, harmony, achievement, and hedonism dimensions served as the independent variables.
[b] Service quality, facility, service, information, management, satisfaction, and behavioral intentions index served as the dependent variable, respectively.
[c] Service quality index was created by taking the mean of four service quality dimensions; facility, service, information, and management index created by taking the mean of service quality items within the same dimension; satisfaction index, created by taking the mean of three satisfaction items, and behavioral intentions index, created by taking the mean of five behavioral intentions items.

TABLE 3

Multiple regression of behavioral intentions on respect, harmony, achievement, and hedonism dimensions of values, and service quality and satisfaction indices [a]

Dimensions of values b	Behavioral intentions index c				
	Beta	P-value	F-value	Model P-value	R-square
Respect dimension	0.08	0.012			
Harmony dimension	-0.20	< 0.001			
Achievement dimension	0.16	< 0.001			
Hedonism dimension	0.47	< 0.001	180.60	< 0.001	0.52
Service quality index	0.22	< 0.001			
Satisfaction index	0.12	< 0.001			

Note:
[a] The same dimension and index construction as the note shown in Table 2.
[b] Respect, harmony, achievement, and hedonism dimensions, and service quality and satisfaction indices served as the independent variables.
[c] Behavioral intentions index served as the dependent variable.

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