

The Relationship among Community Social Capital, Perceived Value and Community Loyalty

Gong Shuhui

Guangzhou College of Technology and Business, Guangzhou, China

Abstract: The research focus on the relationship among community social capital, perceived value and community loyalty with taking alumni community as an object. The partial least squares structural equation modeling (PLS-SEM) is adopted to analyze data by using SmartPLS 3.2.9. The results show that social capital has contribution on perceived informational value and perceived social value, perceived informational value significantly affect community loyalty, while perceived social value has insignificant impact on community loyalty.

Keywords: Community Social Capital, Perceived Value, Community Loyalty

1. Introduction

The research on the relationship among community social capital, perceived value and community loyalty is still in a relatively blank field. Scholars have focused more on brand community and brand loyalty, while community has various types with different characteristics. This research takes alumni community as an object. There are many features in alumni community, including simple structure, profound emotion; similar study experience. It is possibility to propose that the members in alumni community is easily to form community loyalty, in which the relationship among them will be analyzed and examined in this research. The potential contributions on this study refer to three main aspects: a new research area will be created by integrating the theories on social science and marketing; there will be positive instructions to community loyalty by conducting social capital research; finally, this study will be valuable to promote the operation of non-commercial communities research.

2. Literature Review

2.1 Social Capital

There has been many literature in droves on social capital, Lyda hanifan (1916) stated that social capital is a kind of social relationship naturally established by individuals or groups; it can be an asset individuals or organization through daily interaction^[1]. Coleman(1988), a contemporary American sociologist, explained social capital in the perspective of human capital that ,as a kind of capital, social relation provides a shortcut for people to achieve specific goals. The intangible social capital can be formed by relationships^[2].

Nahapiet and Ghoshal (1998) elaborated an view the most widely accepted on social capital. They introduced social capital into three main dimensions, including structure, relationship and cognition^[3]. Granovetter (1992) supplemented that, structural dimension as the attribute of social system and the whole relationship network, refers to the overall models of connection between individuals and groups; as it were, who and how you are able to reach. The relational dimension mainly focuses on members exchanging and collecting explicit and tacit information in the social network, and strengthening the cooperation and relationship management with others. Cognitive dimension relates to the shared beliefs, rules and languages among social relations^[4].

2.2 Community

The research about community usually referred to the brand community that initially proposed by Muniz and Guinn (2001), which means a series of social relations formed by the consumers of the without limitation in time and location^[5]. This research proposes community whose schooling as the tie is composed by alumni of the university.

2.3 Community Loyalty

James and Cropanzano (1994) defined that, loyalty is as the adherence to the goals, beliefs and symbols of the social institutions to which they belong^[6]. Scott (1965) described in-group loyalty meaning, it is impossible to have any derogatory evaluation of the organization to the out-group by members, and they would devote a lot of energy, capital and source into development of the group^[7].

Inderpal, Anand and Subhankar (2019) analyzed customer loyalty in the banking and insurance industry, and indicated that the variables of customer loyalty are customer satisfaction, commitment, trust and image^[8].

Scholars have studied brand loyalty from the perspective of social capital. Wang Xinxin (2010) stated the mechanism of community social capital on brand loyalty^[9]. The research provides important theoretical value for the introduction of community social capital into the field of consumer behaviours, and practical guiding significance for developing the brand community. Based on research results above, this research put relevant theories into analyzing the relationship between community social capital and community loyalty, taking the alumni community as the research subject.

Alumni community similar to other communities is established by some commonalities among members. As a social group gathered by interest or purchase tendency of customers, brand community demonstrates more diversified structure in social network. In the contrast, the alumni social network is more unitary in structural dimension. Take universities as an example, universities have different majors cultivating a variety of training levels, such as bachelor, master, doctorate and further study. Although almost without limitation in geographic location, interests and background, it is undoubted that they share common degrees in the same training level. What is more, it is easy to show that the similar views on things and trust among them by sharing analogous study experience.

Alumni community loyalty and brand loyalty have some similarities, but their purposes of loyalty are different. The goal of brand loyalty is to transform individual loyalty into business value. Yet alumni community loyalty aims to improve the cohesion of the whole community relationship network, and enhance the influence and reputation of the association, which will be greatly beneficial to individuals and community, even university.

The brand community theory is partly applicable in this research. Yet the features in alumni community, such as values, common language, trust and other initial variables, are more profound than other commercial communities, and the core community loyalty will provide wider application. This research conducts the theoretical model of social capital and brand loyalty to empirically analyze the mechanism of community social capital on community loyalty, and stave to conclude the relationship between the two.

3. Research Hypothesis

Since the social capital model created by Nahapiet and Ghoshal^[3] has been widely accepted, this research conducts it as the independent variable, the brand loyalty as the dependent variable, taking the alumni community as the research object.

3.1 Structural dimension of community social capital

After graduating from the university, the tie of students to the university is to join the alumni community. The commonality shared by alumni shows similar experience of campus life whatever any degree levels they at in universities, thus alumni community is comparatively simple in community structure. Considering various motivations to join community, alumni still have some common topics based on study life, for example, study experience, social cooperation, career and job vocation. The social activities take their university as a link, and provide the possibility for members to obtain diverse social capital. Therefore, the capacity of social capital is able to show on community.

H1: the obtainable social capital can be perceived by individuals in the community.

3.2 Cognitive dimension of community social capital

Alumni community shares internal languages and minority cultures. For example, an alumni community entitles a nickname for their university called "village"; "DDL" means deadline of

assignment; A British alumni community is seeking for the best “Blunch” outside UK. These cases show the cognitive dimension of community social capital. Moreover, shared languages and narratives tend to trigger some positive and spontaneous interactive behaviours within the community as well, such as group chat, demand-exchanging, courtship, reunion and donation, demonstrating the stickiness and positive affirmation of members to community, which is largely possible to develop and establish further contacts within the community.

Social identity was first proposed by Tajfel (2011), referring to "knowledge, which have significant feelings and value to social members, is about their subordination to a community"^[10]. Through this cognition, individuals attach themselves to the specific social groups to which they belong. For example, when some unreal accusations are against the reputation of a particular university, there would be a common voice of opposition among alumni, which reflects the social identity in community. Identity increases the similarity in behaviour and opinion between members, and the stickiness to the community (Brewer and Brown, 1998)^[11].

H2 Shared language and narrative are positively correlated with community social capital;

H3 There is a positive correlation between social identity and community social capital

3.3 Relational dimension of community social capital

How does trust exist in the alumni community? First of all, the alumni community maintains the culture and value faithfully observed by students of a certain university, which enables the trust and tolerance to formed easily. Compared with the brand community, individuals are more likely to have trust within alumni community. Secondly, the increase of trust leads to a series of positive interactive behaviours, such as group chat, information sharing and so forth. These behaviours have impact on individuals to hold a higher degree of tolerance for the multidimensional nature of community social relations, so that the stability and attraction of community will be more stronger^[12].

Krackhardt (1992) conceptually and empirically unlocked the driving factors of relationship enhancement: emotional influence, intimacy, interaction frequency and trust^[13]. Paxton and Moody (2009) believed that the structure of social network affects the strength of individual relationship. Members of the alumni community join the community based on their positive recognition of the University^[14]. Given that the orientation is non-commercial, alumni community shows more intimate relations among members than other kinds of communities. The content of interaction has a clear direction, such as around the university, subject, work, etc. These common interests are more likely to create topics and frequent interactions, as a result, intimacy relations can be build readily. In addition, Lee, Noh and Koo (2013) indicated interaction on social platform is conducive to increase social support of the community and enhance the intimacy and satisfaction of social members^[15].

H4 There is a positive correlation between trust and community social capital

H5 There is a positive correlation between intimacy and community social capital

3.4 The influence of community social capital on the perceived value of members

The motivation of individuals to join the community is various. For example, the motivation of a part of alumni is to memorize campus life together, they are interested in the current changes and features of the campus, and hope young members readily share the campus information; alumni confused by the career direction want supports of information by members in relevant majors; alumni interested in alumni network resources strive to generate commercial cooperation in group interaction. Hogg and Williams (2000) stated the formation of the group comes from the bond of interpersonal attraction on the perspective of social cohesion, the expansion of interpersonal relations promote external information spreading to individuals^[16]. Although the aim of the alumni community is indirectly related to the commerciality, yet the goal of majority members is to obtain and collect information from the social network. The sharing and creation of information is the result of the individual interaction in community, as a result, a more stable relationship is showed within community, because the existence of information value can be perceivable.

H6 community social capital has a positive impact on individual information perceived value;

3.5 The influence of community social capital on the social value of members

With the steady development of the alumni community, the increase in emotional investment of members manifests a stronger connection in social network. Move in endless cycles, strong connection brings more cooperative and reciprocal behaviours. Reciprocity refers to that individuals provide services or helps to others without charge, and expect to return in a favorable way at a certain time. Given that the expectation of return, it is easy to show a sense of moral responsibility among members, driving individual obligations to provide services and helps for interaction within community. The cooperative and reciprocal behaviours within the community enable individual members to obtain some social supports and resources at low cost.

H7 community social capital is positively correlated with perceived social value of individuals;

3.6 The relationship between individual information value and social value and community loyalty

Bozena and John (2001) pointed out that community loyalty means actual or intentional pro-group behaviour^[17]. With the increase of trust and intimacy, the accumulation of voluntary contributions made by members gradually reflect in the information sharing and creation within the community, which greatly facilitates a small-scale mutually beneficial cooperation. Therefore, individual members can perceive information value and social value within the community, which positively enhances their satisfaction to the community, and promote them to contribute more pro-group behaviours.

In addition, in the study of loyalty, there have been many studies on its variables. Alex (2020) shared that perceived value has a positive impact on customer satisfaction, while customer satisfaction has a positive impact on loyalty^[18].

H8 there is a positive correlation between individual perceived information value and community loyalty;

H9 there is a positive correlation between individual perceived social value and community loyalty;

Figure 1 is the Initial Conceptual Model showed below.

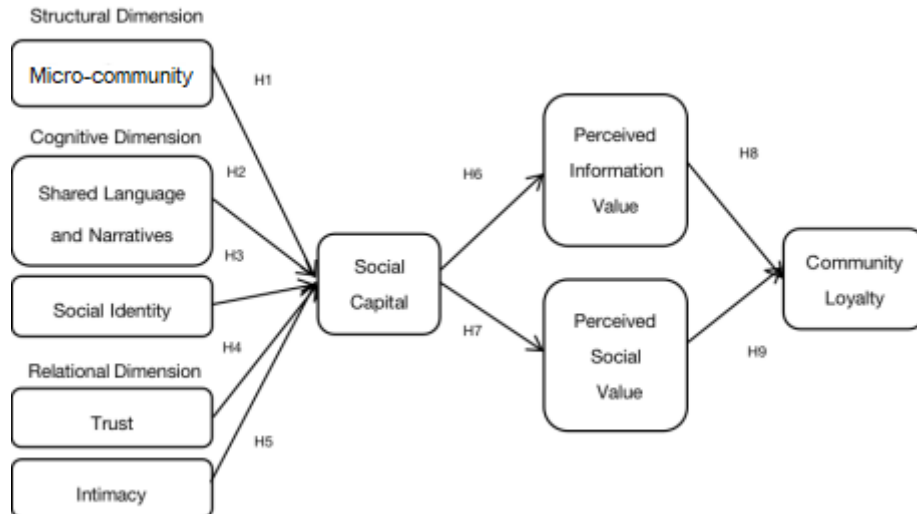


Figure 1: Initial Conceptual Model

4. Methodology

4.1 Sample and data collection

An empirical study was conducted to examine the conceptual framework of the relationships among social capital, perceived value and community loyalty, as the previous study pointed out that perceived value is a powerful predictors of customer loyalty (Yang & Peterson, 2004)^[19]. This research targeted alumni communities actively operating on social networks mainly involving Wechat and Facebook. The participants were required to show one of alumni to which they belong. Data were collected by the questionnaire through social websites in two months. There were totally 196 effective data.

4.2 Measurements

Items initially developed by Nahapiet and Ghoshal(1998)^[3], Wang xinxin and Xue haibo(2010)^[9], were modified to adopt to this research: Micro-community(5 items), shared language and narratives(3 items), social identity(3 items), trust(4 items), imitation(7 items), perceived information value(3 items), perceived social value(4 items), community loyalty(9 items). A five-point Likert scale from 1 “strongly disagree” to 5 “strongly agree” was used to measure the variables.

4.3 Data Analysis

This study employed partial least squares structural equation modeling (PLS-SEM) to analyze data by using SmartPLS 3.2.9. The descriptive statistical analysis and correlation analysis were showed in the first part, followed by the structural model with a hierarchical component method. Based on the two-step method recommended by Hair et al. (2017)^[20], the reliability and validity of the measurement model were evaluatedⁱ.

4.4 Analysis and results

In this investigation, as can be seen in table 1, the number of female participants were little more than male, the age group 26 to 35 were the majority. Bachelor occupied the preponderance, office staffs were the major proportion, and monthly income showed 5001-15000 were the significant contribution in this study.

Table 1: Characteristics of Demography Variables (N = 196)

Sample Characteristics			Sample Characteristics		
		%			%
Age	18-25	14.8%	Occupation	Students	9.2%
	26-35	50.0%		Office Staffs	41.8%
	36-45	20.9%		public worker	37.8%
	46-55	10.2%		Self-employed	6.1%
	55+	4.1%		Others	5.1%
Gender	Male	51.5%	Income (Monthly)	0-5000	17.3%
	Female	48.5%		5001-15000	60.7%
Educational background	Diploma	19.9%		15001-25000	19.4%
	Bachelor	52.6%		25000+	2.6%
	Master	21.9%			
	Ph.D	5.6%			

This research adopted Cronbach's α , outer loading, composite reliability (CR), average variance extracted (AVE) and Rho_A to support the assessment of the reliability and validity of the constructs. Hair, Risher, Sarstedt, and Ringle(2019) pointed out for achieving the internal consistency, 0.70 is the enough level towards Cronbach's α coefficients, Rho_A, and CR, what is more, AVE surpassed 0.5^[20]. In addition, factor loadings should be greater than 0.5 for better results (Truong & McColl, 2011; Hulland, 1999) ^{[21][22]}. According to table 2, the coefficients in this study is of this kind, which confirms internal consistency, reliability, and convergent validity. Based on table 3, the Fornell-Larcker criterion was conducted to evaluate discriminant validity through comparing the square roots of AVE and correlations in the constructs ^[23]. The results demonstrated that all square roots of AVE were higher than correlations, which constructed the discriminant validity.

Table 2: Cronbach's α , CR, AVE and Rho_A

	Construct (Cronbach's α)	Outer Loading	CR	AVE	Rho_A
Micro-community (0.818)	There were some friend circles existed in alumni community.	0.730	0.873	0.579	0.824
	I was attracted by the friend circles of alumni community.	0.743			
	I felt that I belong to one of friend circles of alumni community.	0.787			
	There were communications between the friend circles in alumni community.	0.818			
Shared Language and Narratives (0.708)	It was easily distinguish members of the alumni community	0.721	0.835	0.629	0.729
	There were some common languages and signals existed in alumni community.	0.813			
	There were a unique existed in alumni community.	0.837			
Social Identity (0.710)	It was easily to generate commons among alumni community.	0.725	0.838	0.633	0.713
	Members of alumni community tended to share similar opinions.	0.810			
	Members tended to accept the views of others in alumni community.	0.789			
Trust (0.798)	It was easily to generate the mutual recognition among members of alumni community.	0.787	0.869	0.623	0.799
	I believed that members have more abundant social resources than me in alumni community.	0.804			
	I believed that members have more abundant informational resources than me in alumni community.	0.818			
	I believed that alumni is positive towards my existence in alumni community.	0.756			
Intimacy (0.887)	I believed that members will response to my opinions in alumni community.	0.779	0.912	0.596	0.889
	I have gained friendship in alumni community.	0.748			
	The alumni community showed a harmonious atmosphere.	0.760			
	Members were willingly to share information in alumni community.	0.786			
	I had a very tolerant attitude towards others in alumni community.	0.783			
	I was willingly to provide help to alumni.	0.757			
Perceived Information Value (0.707)	I was willingly to share information in alumni community.	0.782	0.836	0.630	0.718
	I was willingly to share personal information in alumni community.	0.787			
	The information I got from the alumni community was valuable.	0.743			
	The alumni community was one of important information resource for me.	0.824			
Perceived Social Value (0.728)	The alumni community had an unique value for me.	0.811	0.828	0.547	0.733
	I solicited opinions from members in the alumni community.	0.736			
	I would give suggestions to members of alumni community.	0.718			
	I known the personal information of members of alumni community.	0.761			
Community Loyalty (0.915)	I was getting supports from members in alumni community.	0.742	0.930	0.597	0.919
	I would like to tell others that I am one of members of the alumni community.	0.786			
	I would like to recommend others to join the alumni community.	0.817			
	I would like to stay in the alumni community.	0.771			
	I would like to abide by the rules of the alumni community.	0.809			
	I would like to repay the alumni community with material resource.	0.674			
	I would like to repay the alumni community with spiritual resource.	0.698			
	I would like to repay the alumni community with intellectual resource.	0.812			
	I would like to repay the alumni community with informational resource.	0.788	0.785		
	I would like to repay the alumni community with resource of social relationship.	0.785			

Table 3: Correlation Coefficient of Variables

	MC	SLAN	SI	T	I	PIV	PSV	CL
MC	0.76							
SLAN	0.346**	0.79						
SI	0.358**	0.430**	0.80					
T	0.316**	0.348**	0.461**	0.79				
I	0.307**	0.215**	0.386**	0.433**	0.77			
PIV	0.309**	0.203**	0.420**	0.401**	0.454**	0.79		
PSV	0.089	0.153*	0.309**	0.206**	0.371**	0.289**	0.74	
CL	0.396**	0.328**	0.478**	0.477**	0.487**	0.545**	0.269**	0.77

Note. The bold letters on the diagonal and construct correlations below the diagonal are the square roots of AVE.

Table 4: Hypothesis testing

Hypothesized Path	Path Coefficient	T-Value	Result
Micro community→ social capital	0.312	18.211**	Supported
shared language and narratives→ social capital	0.192	14.910**	Supported
social identity→ social capital	0.198	15.563**	Supported
Trust→ social capital	0.258	17.799**	Supported
Intimacy→ social capital	0.453	20.298**	Supported
Social capital→perceived information value	0.532	7.377**	Supported
Social capital→perceived social value	0.348	4.424**	Supported
perceived information value→community loyalty	0.511	6.683**	Supported
perceived social value→community loyalty	0.139	1.731(n.s.)	Not Supported

*** p < 0.001, * p < 0.05, n.s. not significant.

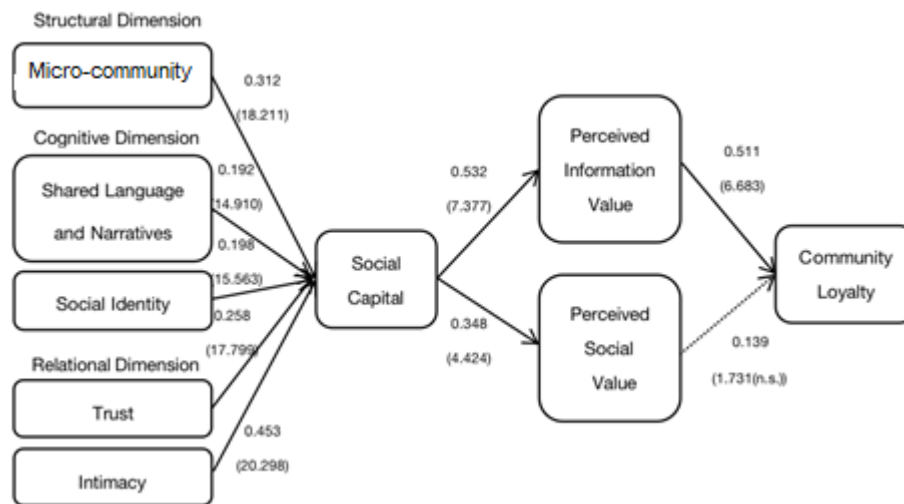


Figure 2: Structural Model and Correlation of Variables

5. Discussion

Previous studies have proved the importance of social capital for brand loyalty in the marketing context. Yet there is no existed studies focused on the small communities. This study aims to examine the relationship among social capital, perceived value and community loyalty, with the results as follow:

Table 4 showed the path coefficient between the variables in the mechanism and its corresponding T value, except for the positive relationship between perceived social value and community loyalty, other assumptions are well supported.

Figure 2 presented the test results of structural equation model. The successful extracting of the factors from structural, cognitive and relational dimensions of social capital means the community members able to perceive the existence of social networks around them, shared language and narratives, social identity, trust and intimacy. Hence, H1, H2, H3, H4 and H5 are supported by the findings, for which reflected the dimensions of social capital. What is more, the path coefficients and relevant T value shown Micro-Community 0.312(T=18.211), Shared Language and Narratives 0.192 (T=14.910), Social Identity 0.198(T=15.563), Trust 0.258(T=17.799) and Intimacy 0.453(T=20.298), was demonstrated positive relationships with social capital. Similarly, the positive relationships between social capital and perceived value including Perceived Information Value 0.532(T=7.377) and Perceived Social Value 0.348(T=4.424), was seen in table 4 as well, which indicated the social capital gradually accumulated in alumni community has a positive effect on perceived information value and

perceived social value. In addition, perceived information value positively affected on community loyalty through readings 0.511($T=6.683$). However, H9 was rejected for the reason of that the path coefficients and relevant T value of perceived social value 0.139 ($T=1.731(n.s.)$) to community loyalty showed insignificant.

6. Conclusion

This study conducted the empirical analysis on the real community through model construction adopted social capital theory, to explore the dimensional characteristics and impact of social capital of alumni community, which revealed the mechanism of the influence of alumni community on brand loyalty. The findings pointed out social capital has contribution on perceived informational value and perceived social value, those of which have different effects on community members. In the hypothesis of the relationship between both perceived value and community loyalty, perceived informational value is supported, but perceived social value is not supported. Thus, it can be deduced that, receiving information is the motivation for alumni, which builds the community loyalty as well.

However, there are some shortages in this study. Firstly, the sample size limits further sufficient research, thereby, the conclusion can be achieved only based on this investigation. Secondly, due to alumni community is relatively special and non-commercial compared to other kinds, those who participated in this kind of community initially for the reason of the past study experience in the university, which means the motivation of alumni partly possibility for individual feelings rather than resource reception or exchange. It may well to design another study to know the truth in the future. Lastly, this study is cross-sectional, data should be followed for longitudinal research in next research.

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