

Research on Community Fresh O2O Purchase Intention Based on Customer Perceived Value

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Abstract : Based on the theory of customer perceived value, this paper makes an empirical analysis on the purchase intention of community fresh O2O, and proposes the customer perceived value concept including result, program, service, social and emotional value. At the same time, the intermediary variable of consumption attitude is put forward and the theoretical model constructed. It is verified that perceived value significantly influences purchase intention and consumption attitude, and plays an intermediary role between them by regression analysis method. This detailed study on the mechanism of perceived value influencing purchase intention through consumption attitude is of great guidance value.

Key words : Customer perceived value; Community fresh O2O; Purchase intention; Attitude

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1 Introduction

According to the cognitive-emotional-behavior paradigm, only by truly improving the perceived value of customers can they win the positive attitude of customers, thereby enhancing customers’ purchasing intentions, and ultimately gaining the company’s

sustainable competitive advantage. Therefore, based on the theory of customer perceived value, studying the influencing factors of consumers’ purchase intention in the O2O e-commerce model of fresh food communities has very important theoretical and practical value.

2 Research on the relationship between perceived value and purchase intention

Customer purchase intention is the customer’s purchase possibility after weighing the perceived gains and losses, which is deeply affected by the perceived value. In the research on the influence of online shopping intentions, insufficient attention has been paid to some important components of emotion and social value in the Internet age^[1]. Therefore, this article will use multi-dimensional research methods to conduct a comprehensive analysis of customers’ perceived value and purchase intention to reveal the influence mechanism of consumers’ purchases under the community fresh O2O.

3 Model construction and research assumptions

3.1 The direct effect of perceived value on purchase intention

Customer perceived value includes five dimensions which are: results, procedures, services, society and emotions. This study defines the value of the result as the customer’s preference for the products provided

by the community's fresh O2O platform to meet their needs and desires. The program value is the customer's perception of the simplicity and convenience of the operation. Emotional value is the preference and evaluation of the degree of emotional demand that customers obtain in the shopping experience. Social value comes from the social recognition and promotion of self-image. Service value is the value of various additional services that customers enjoy from the merchant before and after the product is sold^[2-3]. They all have a positive effect on purchase intention.

H1: In community fresh O2O e-commerce, customer perceived value has a positive effect on purchase intention.

H1a: In the community fresh O2O e-commerce, the customer's perceived result value has a positive effect on the purchase intention.

H1b: In the community fresh O2O e-commerce, customer perception of program value has a positive effect on purchase intention.

H1c: In the community fresh O2O e-commerce, customers' perceived emotional value has a positive effect on purchase intention.

H1d: In the community fresh O2O e-commerce, customers' perceived social value has a positive effect on purchase intention.

H1e: In the community fresh O2O e-commerce, the customer's perceived service value has a positive effect on the purchase intention.

3.2 The mediating effect of attitude

This study introduces attitude as an intermediary variable between perceived value and purchase intention. Consumers' positive buying attitude has a positive effect on purchase intention, and a negative attitude has a negative effect on purchase intention.

H2: In the community fresh O2O e-commerce, attitude has an intermediary effect between the customer's perceived value and purchase intention.

The conceptual model and assumptions of this research are shown in Figure 1.

4 Data sources and empirical analysis

The questionnaire is divided into two parts. The first part is the basic profile of consumers, and the second part is the use of the Likert five-point scale to design consumer shopping experience items on the community fresh O2O platform. Only 391 used questionnaires are selected as valid analysis data.

4.1 Regression analysis

4.1.1 Pearson correlation analysis

Table 1 is a Pearson correlation analysis of perceived value and purchase intention. According to the analysis data, it can be concluded that the customer's purchase intention has the greatest correlation with service value.

Table 1. Pearson correlation coefficient

	PeV	RV	PV	EV	SoV	SeV
PI	0.859**	0.749**	0.737**	0.759**	0.679**	0.821**

Note: ** Significant at the 0.01 level (two-sided test).

4.1.2 H1 inspection

In order to test Hypothesis 1, that is, in the community fresh O2O, customer perceived value has a positive effect on purchase intention, firstly, a multiple regression model needs to be established, in which the dependent variable is purchase intention and the predictor variable is perceived value. In addition, gender (represented by gen), age (represented by age), occupation (represented by car), and city (represented by cit) are used as control variables to establish a regression model 1.1 for testing hypothesis 1. The test results are shown in Table 2.

This result means that in the field of community

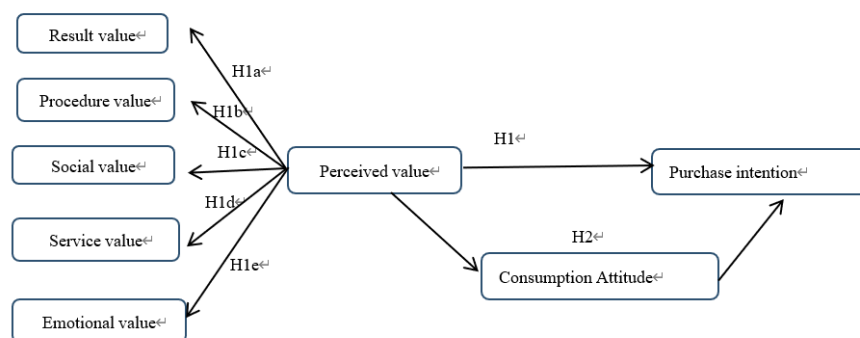


Figure 1. Purchase intention model of community fresh O2O

$$PI = \beta_0 + \beta_1 gen + \beta_2 age1 + \beta_3 age2 + \beta_4 car1 + \beta_5 car2 + \beta_6 car3 + \beta_7 car4 + \beta_8 cit1 + \beta_9 PeV + \mu \quad \text{model 1.1}$$

Table 2. Regression analysis of model 1.1

Model B	Non-standardized coefficient		Standard coefficient	t	Sig. Tolerance	Collinearity statistics		
	Standard error	trial version				VIF		
Dummy variable	Constant	.002	.062		.040	.968		
	gen2	.027	.062	.012	.441	.659	.927	1.079
	age1	-.007	.063	-.003	-.107	.915	.692	1.445
	age3	-.047	.091	-.014	-.514	.608	.889	1.125
	car1	-.032	.085	-.012	-.372	.710	.706	1.416
	car3	-.039	.103	-.010	-.379	.705	.963	1.038
	car4	.036	.108	.009	.334	.738	.946	1.057
	car5	.045	.112	.011	.401	.689	.951	1.051
Independent variable	Perceived value	.860	.026	.860	32.803	.000	.997	1.003

Table 3. Regression analysis of model 1.2

Model B	Non-standardized coefficient		Standard coefficient	t	Sig. Tolerance	Collinearity statistics		
	Standard error	trial version				VIF		
Dummy variable	Constant	-.002	.067		-.027	.978		
	gen2	.016	.061	.007	.262	.793	.909	1.100
	age2	.006	.062	.003	.089	.929	.679	1.472
	age3	-.055	.095	-.017	-.582	.561	.790	1.266
	car1	-.007	.084	-.002	-.078	.938	.699	1.430
	car3	-.047	.103	-.012	-.460	.646	.929	1.076
	car4	.063	.106	.016	.591	.555	.940	1.064
	car5	.065	.110	.016	.589	.556	.949	1.054
Independent variable	cit2	-.041	.059	-.018	-.684	.494	.969	1.032
	Result value	.094	.049	.094	1.917	.006	.276	3.623
	Program value	.158	.050	.158	3.156	.002	.263	3.804
	Emotional value	.129	.051	.129	2.547	.011	.256	3.901
	Social value	.207	.041	.207	5.066	.000	.396	2.525
	Service value	.396	.053	.396	7.465	.000	.234	4.276

R²=0.751 F=87.628 Sig. F=0.000 dependent variable: purchase intention

R²=0.739 F=119.908 Sig.=0.000 Dependent variable: purchase intention;
Reference group: gen1, age2, car2, cit1

fresh O2O, consumers' perceived value significantly and positively affects their purchase intention, so Hypothesis 1 has been verified.

4.1.3 Inspection of H1a, H1b, H1c, H1d, H1e

Establishing regression model 1.2 to verify the sub-hypotheses in Hypothesis 1, the model regression

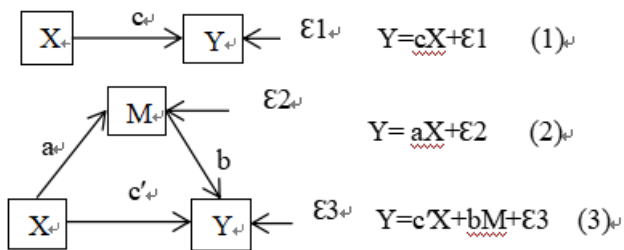
$$PI = \beta_0 + \beta_1 gen + \beta_2 age1 + \beta_3 age2 + \beta_4 car1 + \beta_5 car2 + \beta_6 car3 + \beta_7 car4 + \beta_8 cit1 + \beta_9 RV + \beta_{10} PV + \beta_{11} EV + \beta_{12} SoV + \beta_{13} SeV + \mu \quad \text{model 1.2}$$

analysis formula is:

From Table 3, the R² and Sig. values are better. The result value, program value, social value and service value in the model are significant at the 0.01 level, and the regression coefficients are 0.094, 0.158, 0.207, 0.396 respectively, and the emotional value of regression coefficient is significant at the 0.05 level, which is 0.129. Sub-hypotheses H1a, H1b, H1c, H1d, and H1e have all

been empirically tested.

4.2 The mediating effect test of attitude



The next step is to test the mediating effect of attitude. The dependent variable is purchase intention and the independent variable is perceived value, which contains five observation indicators, namely, result value, program value, service value, emotional value, and social value. The mediating variable is attitude.

Step 1: The regression of X (perceived value) to Y (purchase intention), test the significance of c in formula 1, the R^2 value of the model is 0.738, which means that the fitted equation can explain 73.8% of the change in the dependent variable, after standardization c the value is 0.859 and the significance is $P < .000$, as shown in Table 4 and Table 5.

Step 2: The regression of X (perceived value) to M (attitude), test the significance of a in formula 2, the R^2 value of the model is 0.820, which means that the model has 82% variance explanation which is good fit, the a value is 0.906 and the significance is $P < 0.000$.

Step 3: The regression of X (perceived value) and M (attitude) to Y (purchase intention), test the significance of b and c in formula 3, the R^2 value of the model is 0.816, which means the regression equation can explain 81.6% of the dependent variable. The b value is 0.660 and the significance is $P < .000$, while the c value is 0.261, and the P value is $< .000$.

Table 4. Model summary

Model	R	R square	Adjust R square	Standard estimated error
1	.859 ^a	.738	.737	.49224
2	.906 ^b	.820	.820	.40999
3	.903 ^c	.816	.815	.41281

- (1) Predictor variables: (constant), perceived value. Dependent variable: purchase intention
 - (2) Predictor variables: (constant), perceived value. Dependent variable: attitude
 - (3) Predictors variables: (constant), perceived value, attitude. Dependent variable: purchase intention
- In summary, perceived value affects purchase intention through the mediation of attitude, and Hypothesis 2 passes empirical test.

5 Research conclusions and inspiration

Based on the characteristics of Chinese community fresh O2O e-commerce, this paper adopts the five dimensions of customer perceived value constructs including results, procedures, services, society and emotions, and puts forward the hypothesis that perceived value positively affects purchase intention, and proposes consumption attitudes^[4]. The intermediary variables are verified through the data collected by questionnaires and SPSS statistical software data analysis, and the mechanism of perceived value acting on consumption attitudes and then influencing customers' purchase intention is studied in detail. Conclusion as follow:

First, the results of Pearson correlation analysis and regression analysis of perceived value and purchase

Table 5. Model coefficient

Model B	Non-standardized coefficient		Standard coefficient	t	Sig.	Dependent variable	
	Standard error	Trial version					
1	Constant	.049	.112	.434	.664	Purchase intention	
	Perceived value	1.003	.030	.859	33.083		.000
2	Constant	-.088	.093	-.950	.343	Attitude	
	Perceived value	1.064	.025	.906	42.150		.000
3	Constant	.107	.094	1.135	.257	Purchase intention	
	Perceived value	.305	.060	.261	5.081		.000
	Attitude	.656	.051	.660	12.849		.000

intention show that in the community fresh O2O context, perceived value and its five dimensions are significantly related to purchase intention at the $P < 0.05$ level. At the same time, from the regression coefficient, the customer's purchase intention has the greatest correlation with the service value, followed by emotional value, result value, program value and social value.

Second, the causal step test of the mediation effect shows that attitude plays a part of the mediating role between the customer's perceived value and purchase intention, and the mediation effect accounts for 69.6% of the total effect, thus constructing the perceived value-attitude-purchase intention theoretical model.

These research conclusions have important implications for O2O marketing management:

First, perceived value has a strong influence on purchase intention, especially service value has the largest influence. Under the normalization of the prevention and control of new Coronavirus disease, the O2O model can not only compete for consumers with price advantages, but also needs to give full play to the value-added role of online channels and increase the added value of services. Improving the service level and service capabilities of the entire chain is of great significance for winning customers and increasing customer stickiness; in addition, the importance of emotional value is also ranked before the result value. How to make customers feel happy and trusted during shopping, and relieving pressure during online and offline shopping situation has also become very important; the result value undoubtedly plays a fundamental and decisive role, and it is most basic achieving good quality and low price. Judging from the current situation, discounts are the most effective and fastest way, and there is room for further improvement for the "home economy" develop and "lazy people" more "lazy"; at the same time, in the process of fresh O2O consumption behavior in the community, the program value and social value are also highlighted.

Only when these two aspects are done, customer cohesion will be enhanced.

Second, the introduction of the intermediary variable, which means the attitude is helpful for in-depth study of the mechanism of value theory influencing customers' purchase intention. Consumers' attitudes refer to consumers' preferences or dislikes towards certain products, brands, companies, and stores. As people who have an emotional reaction, they often hold a certain attitude towards things and things around them. This attitude is gradually developed by people during understanding, observing, contacting and experiencing. Although people are not born with attitude towards something, once it is formed, it is difficult to change easily, and slowly internalize as a part of personality, so that the individual shows a certain regularity or repeatability and form a habit in the reaction mechanism. This means that merchants must implement precision marketing to actively influence consumers' attitudes and make them have a more lasting tendency of preference, thereby making online purchases a habit.

Further research can be extended to more dimensions, and how much weight the value factors of different dimensions affect customers' purchase intention is also a direction worthy of in-depth study.

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