

Research on the Influencing Factors of User Consumption in E-commerce Webcast Mode

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Abstract

Combining the characteristics of the e-commerce live broadcast mode, this paper classifies the influencing factors into four categories: product factors, environmental factors, purchase sentiment, and perceived risk. It deeply analyzes the consumer purchasing decision-making process and explores various influencing factors of consumer purchase decision-making. Through questionnaires designed to conduct a descriptive analysis of the collected questionnaires, the relationship between product factors, environmental factors, purchase sentiment, perceived risk and willingness to consume was studied. Finally, the research results show that: in the e-commerce live broadcast mode, product factors, environmental factors and purchase sentiment have a strong correlation with the user's willingness to consume, and the greater the perceived risk, the less willingness of users to consume.

Keywords

E-commerce webcast, consumption decision, influencing factors.

1. Introduction

2016 was a year in which the live broadcast grew rapidly, and it was also the first year of the live broadcast of e-commerce. In this year, the live broadcast and other industries had a just right combination. The so-called “webcast+” economy emerged, especially “webcast+ e-commerce”. This combination has enabled domestic famous e-commerce platforms to smell business opportunities and scramble to apply this new mode. The e-commerce live broadcast mode has become an emerging form of e-commerce that has attracted a lot of attention. The emergence of live e-commerce is a new source of energy for the e-commerce industry.

At present, many scholars have conducted respectively research on e-commerce live broadcast and consumer shopping decisions. However, few literatures have combined the two to study the factors that influence consumers' consumption under the e-commerce live broadcast mode. And most of the research on the influencing factors of consumers' decision on e-commerce live consumption is still at the theoretical level. This paper intends to conduct an empirical study from the perspective of consumer behavior, hoping to compensate for the previous literature gap in the field of live e-commerce to a certain extent, and it can have a certain theoretical value in the consumer consumption decision theory under this mode.

Furthermore, while the live broadcast brings new opportunities to traditional e-commerce companies, it also faces the challenge of how to use live elements to attract consumers' consumption to increase sales. How the major live e-commerce platforms conform to the development trend of the e-commerce live mode and grasp this golden opportunity deserves our attention and thinking. The e-commerce live connects consumers and products to enhance consumers' trust, explode traffic and increase conversion rate. During the entire e-commerce live process, it is very necessary to grasp the consumers' behavioral characteristics, which will help the success of live marketing. Therefore, this paper studies the consumer's influencing factors of consumption under the e-commerce live mode, in

order to provide reference for the development of marketing strategies for the live e-commerce industry.

2. Analysis of Influencing Factors of Consumer Consumption

According to the statistical survey results of the “2015 China Online Shopping Market Research Report” published by CNNIC [1], the main considerations for online shopping users when purchasing products are: word of mouth on the Internet, product price, website/business reputation, brand reputation, website promotion, website user experience, express delivery speed, express company’s reputation, etc. Word of mouth on the Internet, product price, and website/business reputation are the most concerned factors in consumer decision-making, with the degrees of concern being 77.5%, 72.2%, and 68.7%, respectively.

This paper combines the above-mentioned research report with the listed related literature on consumers’ purchase behavior to construct a consumer purchasing decision model under the e-commerce live mode. This paper will study the impact of the four factors on output factors from product factors [2], environmental factors [3], purchase sentiment [4], and perceived risk [4].

(1) Product factors: Product features such as product style, price, quality, function or utility, and Internet word of mouth have different degrees of influence on consumers' online purchasing decisions for familiar or unfamiliar products.

(2) Environmental factors: The live broadcast link is a special and important link in the e-commerce live mode. The anchor or the merchant conducts two-way exchanges with consumers to introduce and sell products.

(3) Purchase sentiment: Purchase sentiment refers to the emotional reactions made by consumers during the purchase process. It affects consumers' purchase intention and purchase behavior to some extent.

(4) Perceived risk: In online shopping, there are many information that consumers cannot control. For example, consumers cannot perceive the quality of products and whether personal information will be leaked. New technologies will increase consumers' perceived risk and affect their willingness to buy [5].

Combining the above research results of consumer purchase decision made by scholars at home and abroad, a questionnaire was designed to measure relevant factors. The questionnaire uses the common Likert 5 scale, and the problem options “very disagree” to “very agree” are set to 1-5. The lower the score, the lower the degree of consent of the survey respondents to the description of the item. On the contrary, the higher the score, the higher the degree of consent of the respondents to the item.

The questionnaire is mainly targeted at consumer groups who have contacted or learned about the e-commerce live broadcast mode. It was put into all kinds of social applications. Subsequently, a total of 186 questionnaires were received. After screening, 11 invalid questionnaires were filled out and 175 questionnaires with research value were finally obtained. The effective recovery rate of the questionnaire was 94%. The number of people in the survey was 175, and the number of men was 93, the number of women was 82. The proportion of 18-25 years old was the largest with a percentage of 80%, accounting for more than half of all surveyed people. This group of young people has more contact with live e-commerce platforms and had a certain degree of economic ability, which is also the main force of consumption. The proportion of "undergraduates and above" is 82%, and the number of people with income of 1001-3000 yuan accounted for 32%. The categories that the surveyed group is willing to consume under the e-commerce live broadcast mode are clothes, shoes, daily necessities, foods, cosmetics, books, and digital appliances. The live e-commerce providers should select products or services which are suitable for live broadcasting. The surveyed group expects that the modules added by the e-commerce live broadcast mode are, in turn, trials, welfare activities, professional product guidance, shopping links, introduction of product production process, inviting star stars, and others. Consumers are more concerned with purchasing benefits, anchors’ professional product guidance, and the convenience of buying while watching the broadcast. The live

contents of businesses or companies should start with the potential needs or actual needs of consumers. From the survey results of the demographic basic conditions and consumption habits of the sample, the survey results are basically consistent with the online survey results, and the sampling is reasonable.

3. Data Analysis

Through the reliability and validity analysis of the questionnaire, the reliability coefficient of Cronbach's α is greater than 0.7, which indicates that the reliability of the research data is very good and all the contents of the questionnaire are reliable. The validity test firstly uses the KMO and Bartlett sphere tests. It is generally believed that when the KMO is greater than 0.7, it has good structural validity. After analysis, the KMO test values of all variables are all greater than 0.7, which has a good validity. And there are significant differences in the significance of the Bartlett sphere test, indicating that the correlation between variables is significant and the quality of the questionnaire data is good. After analyzing the reliability and validity, conduct correlation analysis between each pair of dimensions to be explored, and the correlation coefficient is used to indicate the strength of the correlation.

3.1 Correlation Analysis of Product Factors and Consumption Willingness

The correlation coefficient between the consumption willingness and the product factor dimension is 0.713, and it presents a 0.01 level of significance, which shows that there is a significant positive correlation between the consumption willingness and the product factor, and the correlation is strong. Consumers have always paid great attention to product characteristics when purchasing products and the analysis results are consistent with the actual situation.

Table 1 Correlation of Product Factors and Consumption Willingness

	Average Value	Standard Deviation	Consumption Willingness Dimension	Product Factor Dimension
Consumption Willingness Dimension	3.63	0.94	1	
Product Factor Dimension	3.61	0.93	0.713**	1
* p<0.05 ** p<0.01				

3.2 Correlation Analysis of Environmental Factors and Consumer Willingness

The correlation coefficient between the consumption willingness and the environmental factor dimension is 0.549, and it presents a 0.01 level of significance, indicating that there is a significant positive correlation between the consumer willingness and the service of anchor merchants, and the correlation is general. It shows that environmental factors, although affecting consumers' willingness to consume to a certain extent, are not the main factors affecting consumers' purchase decisions.

Table 2 Correlation of Environmental Factors and Consumption Willingness

	Average Value	Standard Deviation	Consumption Willingness Dimension	Environmental Factor Dimension
Consumption Willingness Dimension	3.63	0.94	1	
Environmental Factor Dimension	3.51	0.96	0.549**	1
* p<0.05 ** p<0.01				

3.3 Correlation Analysis of Purchase Sentiment and Consumption Willingness

The correlation coefficient between the consumption willingness and the purchase sentiment dimension is 0.616, and it presents a 0.01 level of significance, which shows that there is a significant positive correlation between consumer willingness and purchase sentiment, and the correlation is strong. In the e-commerce live mode, purchase sentiment has a greater impact on consumers' willingness to consume.

Table 3 Correlation of Purchase Sentiment and Consumption Willingness

	Average Value	Standard Deviation	Consumption Willingness Dimension	Purchase Sentiment Dimension
Consumption Willingness Dimension	3.63	0.94	1	
Purchase Sentiment Dimension	3.31	0.95	0.616**	1
* p<0.05 ** p<0.01				

3.4 Correlation Analysis of Perceived Risk and Consumption Willingness

The correlation coefficient between the consumption willingness and the perceived risk dimension is -0.430, and it presents a 0.01 level of significance, indicating that there is a significant negative correlation between consumer willingness and perceived risk, and the correlation is general. Perceived risk is a factor that consumers often consider when purchasing. Perceived risk will reduce consumer's willingness to consume, but it has little impact, and it also shows that consumer's perception of shopping risk is slow.

Table 4 Correlation between perceived risk and consumption willingness

	Average Value	Standard Deviation	Consumption Willingness Dimension	Perceived Risk Dimension
Consumption Willingness Dimension	3.63	0.94	1	
Perceived Risk Dimension	3.88	0.87	-0.430**	1
* p<0.05 ** p<0.01				

4. Conclusion

Through investigation and study, this paper combines with the characteristics of e-commerce webcast mode, and divides the influencing factors into four categories: product factors, environmental factors, purchase sentiment, and perceived risk. Then this paper deeply analyzes the process of consumers' purchase decision and explores various factors affecting consumers' purchase decision. Finally, according to the analysis results, we come up with solutions for how the merchants and online shop operators operate based on the influencing factors. Product factors have always been the most important factor for consumers to make purchase decisions. The quality, price, and performance of products have the most direct impact on consumers. Environmental factors are mainly reflected in the perspectives of products' display methods, service attitudes, whether it can capture the appetite of the audience and create a buying atmosphere, and grasp the level of knowledge related to products. Therefore, live e-commerce should focus on improving service capabilities in their live broadcasting, which can effectively increase the conversion rate and cultivate loyal customers. For consumers' purchase sentiment, live business should try to direct consumers' purchase sentiment to the positive side as much as possible. When it comes to live broadcasting, we must take into account the psychology of consumers and replace the live broadcast method according to the needs of consumers

to eliminate consumers' negative emotions. The risk perceived by consumers will restrain consumers' willingness to consume to a certain extent, making consumers hesitant to purchase products. Live business should establish a positive image, create a good reputation, and guarantee product quality and service, so that consumers have a sense of trust.

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