

An Empirical Analysis of Scented Tea Market Based on Theory of Consumer Behavior

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Keywords: Scented tea, Theory of consumer behavior, Howard-sheth model, Logistic regression, Empirical analysis

Abstract: In order to investigate the behavioral characteristics of consumers in the scented tea market and the factors affecting purchasing decisions, 704 pieces of data were collected in Luoyang City by PPS sampling method for empirical analysis, and four binary logistic regression models were established based on Theory of Consumer Behavior. The results show that the three factors of consumer's gender, age and understanding of scented tea have a significant impact on the purchase intention; potential consumers have a relatively high willingness to purchase scented tea products through relatives and friends and WeChat; most potential consumers purchase scented tea products for the purpose of giving gifts, so there are higher requirements for product packaging. There is a positive correlation between the income level of potential consumers and their purchase intention. Based on the results of the above model, suggestions are made in the direction of innovating advertising channels, reasonably dividing product lines, combining tourism, and creating well-known scented tea brands.

1. Introduction

The tea beverage industry is one of the fastest growing industries in the beverage industry. In the survey results of Chinese consumers' preference for various types of beverages, tea beverages accounted for 16%, second only to packaged water and plant protein beverages, making it the third largest beverage category in China. It is estimated that by 2021, the global tea beverage market is estimated to be worth approximately US\$44.3 billion. The scented tea industry is an emerging industry that has developed in recent years, and is a hot spot and new growth point in China's tea drinks. At the present stage, economically developed areas such as Beijing, Tianjin, and Shanghai are the main sales areas for scented tea in my country, mainly high-end scented tea. For more than 30 years, the scented tea industry has continued to develop and mature, which has gradually changed the situation of small scale and single product structure in the past. The scale and intensification of enterprises have continued to increase, and the product structure has become more and more reasonable. It has become a new market for drinking tea products growth point.

2. Model Selection and Data Sources

2.1 Theoretical Analysis

At present, the research on consumer behavior is very mature. The academic community has built a variety of behavior models to illustrate the various factors that affect consumer decision-making and the logical transmission chain. A representative one is the Howard-Sheth Model. The Howard-Sheth model combines a variety of consumer purchase behavior patterns, has a strong logic, and can better convey the impact of different factors in the consumer decision-making process from multiple dimensions. This model divides the consumer behavior decision-making process into three links: input, perception and learning construction, and consumer behavior output. "Investment" is a stimulus from the outside world that consumers are exposed to. "Construction of perception and learning" is the desire for consumption generated by consumer subjects who combine the stimulus they touch with their personal wishes. "Output" is the consumer's behavior in

purchasing goods. This model believes that potential consumers are stimulated by stimuli to arouse demand to generate purchase motives, and then have emotional reactions and attitude changes, combined with other limiting factors to weigh their relative ability to satisfy motives, and finally appear public purchase behaviors, which turns into Real consumers. Therefore, the influencing factors of consumer buying behavior are external, stimulating, internal and reactive. In summary, we create the questionnaire theoretical model based on the Howard-Sheth Model.

Research Design. This study is based on a questionnaire survey. The first part of the questionnaire is the input variable part. After previous interviews and literature research, we decided to set the popularity of scented tea in the product stimulus factor;; set the understanding scented tea in the symbolic stimulus factor the channel of the product is a measurable variable; shopping habits and shopping goals are set as measurable variables in the social stimulus factors. The second part is the external variable part, and the consumer group part is the demographic variable information of the surveyor. Demographic characteristics mainly include age, gender, family structure, ethnicity, income, education level, and geographic location to reflect the relevant information structure of the population. We set four measurable variables in the questionnaire: gender, age, education, and income level.

The subjects of investigation are all residents of Luoyang City. According to Veal's research, if the studied population is more than 100,000 and the confidence interval is 95%, the effective sample size should be no less than 384. This study was conducted in 12 streets in six districts of Luoyang from May 20, 2019 to June 3, 2019. A total of 704 questionnaires were collected. After excluding invalid questionnaires, with an effective rate of 97.30%. Reliability test Cronbach α value analysis results, the dimensional internal consistency coefficient is close to 0.667; the KMO value of Bartlett spheroid test in the validity test is close to 0.779, indicating that it is suitable for factor analysis.

2.2 Data Quantification Processing

Based on the surveyed data, in order to quantify the impact of various stimulus factors on consumers' purchase intentions, by assigning values to different indicators, and taking the potential consumer's willingness to purchase as the dependent variable. Logistic regression analysis was used to explore the influence of different factors on the potential demand of scented tea. In order to more clearly and intuitively explore the impact of each item included in the above four factors on potential demand, four binary Logistic regression models were constructed respectively.

Table 1 Coding of Regression Model Variables

factor	project	coding	factor	project	coding
Characteristic factor	Understanding of scented teagender	X1	Channel factor	Weibo	Y1
	Sex	X2		WeChat	Y2
	Age	X3		Electronic business platform	Y3
	Education	X4		Relatives and friends	Y4
				TV	Y5
				Other channels	Y6
Product factor	package	Z1	social factor	Household income	U1
	culture	Z2		Monthly willingness to spend on tea products	U2
	Craft	Z3		Expected price of scented tea gift	U3
	Taste	Z4		Expected price of scented tea for self-use	U4
	Brand	Z5			
	effect	Z6			

There are only two result assignments for consumers' purchase intention: with purchase intention (Y=1) or without purchase intention (Y=0). We use the binary Logistic regression analysis function in SPSS17.0 to perform regression analysis on characteristic factors, channel factors, product factors, and social factors. Since the number of independent variables in the regression model is small, the direct entry method is adopted to incorporate all independent variables into the regression model to obtain the result.

The logistic regression equation model is:

$$\ln\left(\frac{P}{1-P}\right) = \sum_{i=1}^k \beta_i X_i + \varepsilon$$

$$P = P(Y) \begin{cases} Y=1, \text{Willing} \\ Y=0, \text{Non-voluntary} \end{cases}$$

Where: P is the probability of potential consumer for buying scented tea products; k is the number of Explained variable; β_i is the regression coefficient of influence factor; k is the number of question; X_i is the factor affecting the purchase intentions of potential consumer; ε is the constant.

3. Results and Analysis

3.1 Individual Characteristics of Potential Consumer Groups

Among the investigators of potential consumers of scented tea, the female group accounted for 44.96% and the male group accounted for 55.04%, and the ratio of men to women was basically balanced. Among the surveyed respondents, 25.26% are under 22 years old, 25.26% are 22-35 years old, 41.31% are 35-50 years old, 10.07% are over 50 years old, and 35-50 years old are the most. Respondents have a high school degree or below accounting for 19.42%, college degree or college degree accounted for 75.47%, and master degree or above accounted for 5.11%. The average monthly income of the surveyed households is below 3,000 yuan accounted for 14.16%, 3,000 yuan to 7,000 yuan accounted for 47.15%, 7,000 yuan to 12,000 yuan accounted for 21.61%, and 12,000 yuan or more accounted for 17.08%, most of the surveyed the monthly income of each person is in the range of 3,000 yuan to 7,000 yuan. Only 25.11% of the respondents purchase tea products purely for their own consumption.

3.2 Model Checking

Using SPSS software to carry out Hosme-Lemeshow test on the dimensioned data, the test results can be seen from Table 1. The significance of the four models is all > 0.05, which can fit the data well.

Table 2 Hosmer-Lemeshow Test Results

Factor equation	Bangla	df	Sig.
Characteristic factor	10.332	8	0.242
Product factor	11.408	8	0.180
Channel factor	14.236	8	0.076
social factor	4.639	8	0.795

3.3 Analysis of Characteristic Factor

In terms of characteristic factors, among the four independent variables, the test value of understanding of scented tea (X1), gender (X2), and age (X3) reached a significant level of 0.05, which are variables that affect potential demand. The surveyed age, degree of understanding of scented tea, and gender will affect their willingness to buy scented tea. The other variables have no significant effect on the purchase intention of scented tea. The coefficients corresponding to the independent variables X1 and X3 are positive, and the corresponding odds ratios are 1.600 and 1.423, respectively, indicating that the respondents' understanding of scented tea and age are positively correlated with purchase intention. The coefficient corresponding to the independent variable X2 is negative, indicating that men have a lower acceptance of scented tea products than women. Compared with traditional tea, scented tea has a lack of promotion, and relevant companies should increase promotion and expand the target market.

Table 3 Estimation Results of Characteristic Factors

Variable	B	S.E	Wals	df	Sig.	Exp (B)	EXP(B) 95% C.I.	
							Lower limit	Upper limit
X1	.470	.182	6.650	1	.010	1.600	1.119	2.287
X2	-.512	.232	4.867	1	.027	.599	.380	.944
X3	.352	.123	8.159	1	.004	1.423	1.117	1.812
X4	.017	.263	.004	1	.948	1.017	.607	1.703
constant	.947	.768	1.518	1	.218	2.577		

3.4 Analysis of Channel Factor

In terms of channel factors, among the six independent variables, the test values of WeChat (Y2) and relatives and friends (Y4) reached a significant level of 0.05, which are variables that affect potential demand. The coefficients corresponding to the independent variables Y2 and Y4 are positive, indicating that potential consumers have a higher desire to buy scented tea from WeChat (public account, Moments of Friends) and relatives and friends, which provides a direction for related companies to promote products.

Table 4 Estimation Results of Channel Factor

Variable	B	S.E	Wals	df	Sig.	Exp (B)	EXP(B) 95% C.I.	
							Lower limit	Upper limit
Y1	.041	.293	.020	1	.887	1.042	.587	1.851
Y2	.679	.245	7.662	1	.006	1.972	1.219	3.188
Y3	.103	.262	.155	1	.694	1.109	.663	1.853
Y4	.524	.241	4.751	1	.029	1.689	1.054	2.707
Y5	.177	.263	.455	1	.500	1.194	.713	1.999
Y6	.003	.274	.000	1	.993	1.003	.586	1.716
constant	-.319	.826	.149	1	.699	.727		

3.5 Analysis of Product Factor

In terms of product factors, among the six independent variables, the test value of packaging (Z1) reached a significant level of 0.05, which is a variable that affects potential demand. And the coefficient is positive, indicating that potential consumers attach great importance to the outer packaging of the product. In the survey results, potential consumers buy scented tea for gifts accounted for a relatively high proportion, and the strong demand for gifts makes potential consumers have higher requirements for packaging

Table 5 Estimation Results of Product Factor

Variable	B	S.E	Wals	df	Sig.	Exp (B)	EXP(B) 95% C.I.	
							Lower limit	Upper limit
Z1	.606	.291	4.330	1	.037	1.834	1.036	3.247
Z2	.486	.288	2.848	1	.091	1.626	.925	2.858
Z3	.261	.273	.915	1	.339	1.298	.761	2.214
Z4	-.249	.284	.769	1	.380	.779	.447	1.360
Z5	.537	.279	3.695	1	.055	1.710	.990	2.956
Z6	.124	.245	.254	1	.615	1.132	.700	1.830
constant	-.599	.638	.882	1	.348	.550		

3.6 Analysis of Social Factor

In terms of social factors, among the four independent variables, the test value of income (U1) has reached a significant level of 0.05, which is a variable that affects potential demand. And the coefficient is positive, indicating that the purchase intention of potential consumers is positively related to their income, which is in line with our common sense and expectations. Companies

should make a distinction when pricing their products, and tiered product pricing based on the consumption level of potential consumers.

Table 6 Estimation Results of Social Factor

Variable	B	S.E	Wals	df	Sig.	Exp (B)	EXP(B) 95% C.I.	
							Lower limit	Upper limit
U1	.491	.176	7.745	1	.005	1.634	1.156	2.308
U2	.105	.144	.535	1	.464	1.111	.838	1.474
U3	.185	.146	1.600	1	.206	1.203	.903	1.602
U4	.013	.104	.015	1	.903	1.013	.826	1.242
constant	-.235	.564	.175	1	.676	.790		

4. Suggestions

Innovate publicity channels to promote scented tea culture. According to the results of the survey, consumers' degree of scented tea directly affects their willingness to buy. In the new media era, using short videos, live broadcasts and other methods to innovate publicity channels, and use traffic to promote scented tea culture, enhance people's awareness of scented tea, and effectively expand the group of potential consumers.

Good product classification. Different consumers have different demand directions for scented tea products, and companies should develop different products according to consumer needs. For consumers whose main needs are gift-giving, companies can launch more exquisite gift box products; for consumers who focus on drinking, they can launch more practical drinking products. Targeted development of different products can better attract consumers and enhance product competitiveness. At the same time, since most consumers tend to purchase tea beverages through physical store channels, companies can try to invest in scented tea stores to form a new model of offline experience and online purchase.

Combine scented tea with the tourism industry to create an industrial cluster with complementary advantages. Scented tea products have obvious local characteristics and can be combined with tourism and promoted as local specialties. The local government can strengthen the support for the local characteristic city flower industry and the creation of the "city flower" cultural atmosphere to increase people's sense of identity and pride in the local culture. At the same time, the tourism industry and scented tea cultural products are combined to promote the development of scented tea cultural products.

Create a well-known brand of scented tea and form a brand effect. A well-known brand can drive the development of an industry. Such as Pixian Doubanjiang, Longrun Group (Pu'er) and so on. There are many domestic scented tea brands, but they have no influence to radiate local brands. Related companies must increase brand building efforts to form a brand-driven effect.

The product design of scented tea can focus on women's needs and aesthetics. Under the current market background, scented tea products are more popular among female consumers. When developing scented tea products, enterprises should pay attention to the needs of women, and at the same time carry out more targeted advertising based on the psychological characteristics of female consumers.

5. Shortcomings and Prospects

This research is based on the Theory of Consumer Behavior Howard-Sheth model for experimental design, which has certain positive significance for the market research of the scented tea industry, but it has the following shortcomings: 1. The scented tea industry has obvious local characteristics and different acceptance levels inside and outside the region Products, this study has insufficient investigations on the part of local identity factors. 2. The Howard-Sheth model is relatively mature in the research field of Theory of Consumer Behavior, but due to its complex mechanism of action, this study still has certain limitations in variable selection. 3. In market

surveys and theoretical research on consumer behavior, the structural equation model and designing structural equation questionnaires for quantitative research has great value.

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