



AgEcon SEARCH
RESEARCH IN AGRICULTURAL & APPLIED ECONOMICS

The World's Largest Open Access Agricultural & Applied Economics Digital Library

This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

AgEcon Search

<http://ageconsearch.umn.edu>

aesearch@umn.edu

*Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.*

Strategies for Promoting Brand Image of Tianmu Lei Bamboo Shoots Based on Industrial Cluster

Yuan TIAN, Yueli ZHANG*

School of Economics and Management, Zhejiang A&F University, Lin'an 311300, China

Abstract With the continuous development of agricultural industry cluster, agricultural regional brand plays a significant role in the sustainable development of the region, and it is urgent to build the agricultural cluster brand. Based on the background of industrial cluster, this paper firstly introduced the brand of Tianmu Lei bamboo shoots. Using the method of questionnaire survey, it made SPSS analysis of the acquired data. From the five factors influencing the brand image, namely, brand awareness, brand value, brand association, product attribute awareness, and brand loyalty, and then came up with strategies for improving the brand image of Tianmu Lei bamboo shoots.

Key words Industrial cluster, Brand image, Tianmu Lei bamboo shoots

1 Introduction

With the transformation of the agricultural growth mode and the upgrading of agriculture, developing the agricultural industrial cluster has become an important way to realize agricultural industrialization, rural urbanization and enhance agricultural competitiveness^[1]. In the process of the development of agricultural industrial cluster, appearance of a number of agricultural cluster brands with geographical indicator (GI) has become a recognition mark of certain agricultural products, such as Shouguang vegetables, West Lake Longjing, and Fuling Zhacai. These cluster brands promote the integration of agricultural industry, drive local economic development, attract more customers, talents, and funds, promote the industrial development, and have become an important approach for realizing the agricultural industrialization and rural urbanization, and lifting the agricultural competitiveness of China. At present, Zhejiang Province has 82 counties (cities, districts) and has formed a belt of economic industrial cluster with prominent leading industries and integrated production, supply and marketing^[2]. Lin'an known as the "hometown of Chinese bamboo" is rich in bamboo shoots. In the whole city, there is one hundred million mu bamboo grove, with vegetable bamboo grove 0.452 million mu, Lei bamboo grove 0.300 million mu. In the whole city, there are 12800 bamboo shoot farmers with income higher than 10000 yuan, 871 bamboo shoot farmers with income higher than 50000 yuan, and 136 bamboo shoot farmers with income higher than 100000 yuan. In 2014, the output value of Lin'an bamboo shoots firstly exceeded one billion yuan, in which the 0.3 million mu of Lei bamboo shoots had yield of 0.17 million t and the output value of 885.9 million yuan. In main production area of bamboo shoots, 60% income of bamboo shoot farmers came

from bamboo shoots, and Lei bamboo shoots remained in the leading position of rural economy of the production area. In recent years, with the strong promotion of government departments, Tianmu Lei bamboo shoots gradually formed a large-scale industrial cluster effect and successfully registered "Tianmu Lei bamboo shoots" trademark. In the *Billboard of Regional Public Brand Value of Agricultural Products (2005)* issued by CARD China Agricultural Brand Research Center of Zhejiang University, the brand value of Tianmu Lei Bamboo Shoots was 2.198 billion yuan. However, there are still serious problems and challenges for Tianmu Lei bamboo shoots.

2 Problems and challenges for Tianmu Lei bamboo shoots

2.1 Unclear brand operation subject In the existing marketing model of Tianmu Lei bamboo shoots, we can find that the brand operation subject is unclear. The authorized enterprises of brand are incapable of undertaking the overall operation of Tianmu Lei bamboo shoot independently due to influence of their development conditions, strength, funds, and sub-brand positioning. Industrial associations are incapable of undertaking the brand operation due to their special composition and status and limited work functions. Although Lin'an municipal government attaches great importance to agricultural cluster brand, due to their special administrative status, they have to promote the brand in the form of exhibition. Government department directly participating in brand marketing brings too deep administrative color, and the effect is very limited and not favorable for healthy and sustainable development of brand, so government is not suitable for the overall brand operation.

2.2 Insignificant brand protection effect Bamboo shoots with "Tianmu Lei" trademark do not appeal to consumers and consumers will not deliberately buy bamboo shoots with "Tianmu Lei" trademark. According to the overall sales over the years, the sales of bamboo shoots with "Tianmu Lei" trademark were slightly bet-

Received: March 14, 2017 Accepted: April 10, 2017

Supported by Student Science and Technology Innovation Program of Zhejiang University (New Talent Program) in 2015 (2015R412011); Project of National Social Science Foundation (15BGL088).

* Corresponding author. E-mail: 760046832@qq.com

ter than bamboo shoots without trademark. From the perspective of competitors, including Lei bamboo shoots from Tonglu and Deqing, Tianmu Lei bamboo shoots did not have special advantage in the overall market share. As the parent brand, Tianmu Lei bamboo shoot did not exert a great protection effect on its sub-brands.

2.3 Lack of cultural construction Tianmu Lei bamboo shoots have a planting history of thousands of years, while Lin'an has a long history of unique bamboo culture, but Tianmu Lei bamboo shoots have not made significant achievements in the cultural construction. The brand promotion often relies on cultural festivals, fairs and other ordinary channels, there is no real characteristic culture that can affect consumers. The program *A Bite of China* broadcasted by CCTV once mentioned Tianmu Lei bamboo shoots. No doubt, this was a great opportunity for promoting Tianmu Lei bamboo shoots, but it did not generate the corresponding food culture. In addition, Tianmu Lei bamboo shoot has not formed wide brand culture construction and dissemination system in brand cultural construction.

2.4 Chaotic market channel, indefinite target market and non-prominent brand image In the current model, every enterprise implements different marketing strategies according to its own conditions, leading to disorderly competition between different sub-brands, and disorderly market and channel. Inconsistent market supervision causes unique quality of Tianmu Lei bamboo shoots fail to display in the front of consumers. There are problems of lack of contact with consumers, no overall brand planning and strategic positioning, unclear target market, difficult implementation of marketing strategy, and no prominent brand image in the eyes of consumers.

2.5 Brand image elements of Tianmu Lei bamboo shoots to be further explored Brand image is the overall perception of certain brand. As a cognitive concept, the brand image is an essential part of consumer information processing^[3]. The initial understanding of consumers about the brand image is usually based on the elements of brand image, such as brand attributes, name, packaging, price, reputation and so on. The brand image is a collection of images and concepts that exist in the mind of the people about the elements of the brand, mainly the brand knowledge and the people's main attitudes towards the brand. At present, most researches about the brand image are based on the consumers' psychological cognition. In other words, the brand image reflects the consumers' overall view of the brand, feeling and attitude. As the brand image is complex, multidimensional, and contextual, in different time, places and situation of use, consumers will show their different meaning and content. Many researchers put forward different brand image measurement models from a multidimensional perspective on the basis of different definitions of brand image. Domestic scholar Luo Ziming stated that the brand image consists of the brand awareness, product attribute, brand association, brand value, and brand loyalty^[4]. Aaker believed that the brand image consists of the brand association and quality perception^[5]; Keller believed that the brand image included attribute (related

and nonrelated to products), benefits (function, emotion, and benefit), and attitude^[6]; Biel reflected the brand image model through three sub-images, namely, product/service image, company image, and user image^[7].

In the above theoretical models, Luo Ziming, a domestic scholar, made a standardized division of the brand image model through image design and consumer behavior. His demonstration is complete, idea is clear, and structure of factors is clear. Taking Tianmu Lei bamboo shoots as research object, based on unique attributes of agricultural product industrial cluster, we analyzed the brand image from the perspective of consumer perception. Therefore, taking this theory and measurement method of brand image, we measured the brand image from the brand awareness, brand attribute awareness, brand association, brand value, and brand loyalty, and designed measurement indicators. The above models about the brand awareness are based on advertisement awareness, advertisement reputation, and cognitive channel; the product attribute awareness is measured from grade awareness, characteristics awareness, quality awareness, and functional awareness; the brand association is analyzed from word association, quality association, grade association, ideal image association, and function association; the brand value is measured from value evaluation, price evaluation, and price demand curve; the brand loyalty is measured from loyalty rate, satisfaction rate, recommended ratio, and utilization rate, and purchase intention. On the basis of consulting the relevant research literature, we established the theoretical framework for evaluating the brand image, analyzed the variables to be measured from every angle and level, analyzed and designed the existing brand image measurement scale, and designed the questionnaire. The questionnaire mainly includes 4 items of brand awareness, 6 items of product attribute awareness, 5 items of brand association, and 6 items of brand loyalty. We designed the questionnaire using the five-point Likert Scale. The questionnaire was distributed during January 7, 2017 and February 15, 2017. We selected citizens of Hangzhou and Lin'an and consumers of some cities as research objects. To make the samples have certain representativeness, we distributed and collected questionnaire in network, farmers' market, communities, and streets by the interception method. We distributed 200 copies of questionnaire, collected 183 copies of questionnaire, the response rate was 91.5%, and the effective questionnaire was 164 copies, so the response rate was 82%.

3 Extraction of the brand image factors of Tianmu Lei bamboo shoots

After rejecting the invalid data, we carried out the reliability analysis and validity analysis. We obtained that Cronbach α is higher than 0.6, KMO is 0.881, partial correlation is high. According to the value of this statistic, it is close to the ideal status. In Bartlett's sphericity test, $P < 0.001$. The data came from normal distribution, suitable for factor analysis. Using the principal component extraction method in SPSS software, we orthogonal Varimax

rotation method to make the rotation, extracted 5 principal components, the accumulative contribution rate was 63.09%. The load of other factors was too low, thus we rejected them, as listed in Table 1.

Through analyzing the composition and load of each factor,

we found that results are consistent with five factors influencing the brand image, namely, the brand awareness, brand value, brand association, brand attribute awareness, and brand loyalty. Through rearranging question items, we obtained results as listed in Table 2.

Table 1 Total variance of 5 factors

Component/factor	Initial characteristic value			Loading the extracted sum of squares		
	Total	Variance//%	Accumulative contribution rate//%	Total	Variance//%	Accumulative contribution rate//%
1	8.656	36.068	36.068	8.656	36.068	36.068
2	2.371	9.880	45.948	2.371	9.880	45.948
3	1.634	6.810	52.759	1.634	6.810	52.759
4	1.318	5.490	58.249	1.318	5.490	58.249
5	1.162	4.843	63.091	1.162	4.843	63.091

Table 2 Analysis on factor load of brand image of Tianmu Lei bamboo shoots

1. Brand loyalty		2. Brand awareness	
Measurement item	Factor load	Measurement item	Factor load
Purchase Tianmu Lei bamboo shoots again	0.620	Various advertisements are common	0.846
Quality and taste are satisfactory	0.606	Advertisement can better display the brand characteristics	0.854
Recommend Tianmu Lei bamboo shoots if friends or relatives buy characteristic products of Lin'an	0.750	It has high reputation and has become a nationwide brand	0.622
Support and buy Tianmu Lei bamboo shoots	0.756	Name card of Lin'an City	0.683
Buy Tianmu Lei bamboo shoots when buying characteristic products of Lin'an City	0.792		
3. Brand attribute awareness		4. Brand association	
Measurement item	Factor load	Measurement item	Factor load
Packaging is beautiful and proper	0.635	The quality is constantly improved and brand awareness is strengthened	0.669
The overall quality is stable, and few are fake and forged	0.723	Lin'an City has gathered some famous Tianmu Lei bamboo shoot production enterprises	0.673
As a regional agricultural product brand, it has influence power	0.534	The industry has established complete and normalized market order	0.599
The quality is high and the taste is good	0.558	Excellent gift and daily consumer goods	0.657
Every factor produces and packages the products in strict accordance with the standard quality procedure	0.509		
The planting and production history is long	0.599		
5. Brand value			
Measurement item	Factor load		
The price is affordable to many consumers	0.633		
The price change exerts no big influence on the purchase	0.722		

4 Strategies

4.1 Improving the brand image by advertising and marketing

The first factor "brand loyalty" has contribution rate up to 36.07%, so it is the primary factor for enhancing the brand image of Tianmu Lei bamboo shoots. The brand loyalty includes the loyalty ratio, satisfaction rate, recommended ratio, utilization rate, and purchase intention. In the research process, we found that consumers are not highly loyal to Tianmu Lei bamboo shoots and they will not buy Tianmu Lei bamboo shoots consciously. In this situation, enterprises should strengthen the use of experience marketing strategy, so that consumers get an unforgettable experience memory and feel the charm of the brand. Besides, it is recommended to strengthen the training of quality of employees, to achieve a comprehensive service, so as to quickly enhance the intimacy of

brand image and the consumer loyalty to the brand. The second factor is the "brand awareness". In the interview, we found that Tianmu Lei bamboo shoots did not have too many advertisements or impressive advertisements. The cost of advertising is undoubtedly huge. In addition, celebrity endorsement has many problems. It will cause the brand image is closely related to the celebrity, and authorized enterprises of the brand do not have sufficient fund to bear. Based on the background of Tianmu Lei bamboo shoot industry cluster, enhancing the brand awareness can work in concert with the cultural ecological tourism, to make the regional image complement the brand image and promote the development of each other mutually. Enterprises should change high advertising costs to social media and terminal sales, such as WeChat marketing, microblogging marketing, shopping mall promotions and other activi-

ties, so that consumers get more benefits and enterprises can rapidly raise the brand awareness in the consumer group.

4.2 Improving the market supervision mechanism and strengthening the brand construction of Tianmu Lei bamboo shoots

Brand image construction is based on product quality. Brand is an essential factor in consumers' choosing goods, consumers are often more willing to trust well-known brands, but the quality is the fundamental point for the final purchase behavior^[8]. Especially for agricultural products and industrial products, it is particularly important to strengthen the quality construction for improving the brand image. In the composition factors of brand image, "brand attribute awareness" ranks the third place, including grade, characteristic, quality and function and other attribute awareness; "brand association" factor ranks the fourth place, including quality, grade, ideal image and function association. Therefore, it is imperative to improve the market mechanism, strengthen the quality construction. On the one hand, it is recommended to provide quality and technical specifications guidance and brand operation policy support for enterprises using regional brands, assist the industrial associations, farmers, and enterprises in jointly formulating the quality standard for Tianmu Lei bamboo shoots, regional brand use standard and regional brand anti-counterfeit system. On the other hand, it is recommended to strictly attack workshop production, production and sales of fake and forged Tianmu Lei bamboo shoots, implement GB/T19000 - ISO9000 series of standards, and safeguard market image of Tianmu Lei bamboo shoots. At the same time, it is necessary to make daily supervision and coordination, improve the market supervision mechanism, supervise the quality of Tianmu Lei bamboo shoots, and ensure the quality of directly sold and factory processed Tianmu Lei bamboo shoots.

4.3 Bringing into play functions of local government and industrial associations in the brand image construction

To improving the brand image of Tianmu Lei bamboo shoots, it is recommended to bring into full play the functions of local government and industrial associations, and make it become the leader of local bamboo shoot industry. Although the government departments are not suitable for the direct construction of the brand image, it is able to create favorable environment for Tianmu Lei bamboo shoots

through the infrastructure construction, improving and strengthening formulation of related legal system and administrative system, formulating preferential investment policies, cultivating leading enterprises, encouraging transformation and upgrading of enterprises, planning and undertaking market promotion activities. At the same time, the industrial associations should assume more coordination functions. In the regional cooperation, there are frequent conflicts of different stakeholders. Therefore, it is required to coordinate the relationship between farmers and enterprises. Furthermore, the industrial associations, as the owners of the regional brand, should strictly implement the authorization, so that the various stakeholders in the industry can take full communication, mutual cooperation and joint management to expand Tianmu Lei bamboo shoot market. Through industrial cluster and extension, it is expected to realize sustainable development of Tianmu Lei bamboo shoots, raise the value of Tianmu Lei bamboo shoots, and continuously enhance the competitiveness of the industry.

References

- [1] ZHANG YL. Study on the mechanism of regional brand equity in agricultural industry cluster area[J]. Journal of Anhui Agricultural Sciences, 2012,40(22): 11465 - 11467. (in Chinese).
- [2] YANG ZF. The construction strategy of Zhejiang regional brand based on industrial cluster[J]. Reformation & Strategy, 2011, 27(6): 135 - 138. (in Chinese).
- [3] BLAWATT, KEN. Imagery: An alternative approach to the attribute-image paradigm for shopping centres[J]. Journal of Retailing and Consumer Services, 1995, 2(2): 83 - 96.
- [4] LUO ZM. Composition and measurement of brand image[J]. Journal of Beijing Technology and Business University: Social Science, 2001, 16(4): 19 - 22. (in Chinese).
- [5] BERNARD C. The postmodern explained to managers: Implications for marketing[J]. Business Horizons, 1996(11/12): 15 - 23.
- [6] MICHAEL H, NICOLA D. Projecting the right image: Using projective techniques to measure brand image[J]. Qualitative Market Research, 1999, 2(1): 22 - 30.
- [7] LEON G, SCHIFFMAN, CHIFFMAN, *et al.* Consume behavior[M]. Prentice-Hall International, Inc, 1996.
- [8] LUO ZM. How to build brand images of the enterprises[J]. China Power Enterprise Management, 2012(11): 106 - 108. (in Chinese).