

Factors affecting the consumption behavior towards Tam Dat Joint Stock Company's organic food

Nguyen Thi Phi Nga, University of Economics and Business, Vietnam National University, Hanoi
Le Thanh Huong, University of Economics and Business, Vietnam National University, Hanoi

ABSTRACT

Vietnamese people are increasingly concerned about health issues, especially in the context of the rapidly spreading and complicated Covid-19 epidemic. Consumers' demand for consumption of healthful products is increasing day by day. Organic food is also one of the product lines can meet that expectation. In the market, there are many businesses involved in the production and supply of organic food, including Tam Dat Joint Stock Company. Established in 2009, Tam Dat is one of the prestigious addresses in providing organic food with 6 units in Hanoi. Organic food is still the new field in the Vietnamese market, but competition is increasingly fierce due to the emergence of new food brands, and the Covid-19 pandemic has made consumer behavior changing quickly, so it is important to understand customer's consumption behavior. Based on the this situation, the authors decided to carry out the research "Factors affecting the consumption behavior towards Tam Dat Joint Stock Company's organic food" to help Tam Dat in particular, and organic food businesses in general have the facilities and information to make decisions on how to produce, distribute, and sell organic food more effectively. The current research selected and analyzed the impact of 5 factors on the organic food consumption behavior of Hanoi people: Vietnamese culture, family habits, consumption motives, normative values and word of mouth. The research results show that there are 4 factors which have positive impact on organic food consumption behavior but with different levels of impact, while the word-of-mouth factor has no relationship with the dependent variable.

Keywords: *organic food, Vietnamese culture, family habits, consumption motives, normative values, word of mouth.*

1. INTRODUCTION

Vietnamese people are increasingly concerned about health issues, especially in the context of the Covid-19 epidemic. Consumers' demand to search and consume healthy products is increasing remarkably. Organic food is also one of the product lines that is beneficial to consumers' health.

Currently, in the market, there are many businesses involved in the production and supply of organic food, including Tam Dat Investment Joint Stock Company. Established in 2009, Tam Dat Investment Joint Stock Company is well-known for providing organic food under the brand name Tam Dat Organic with 6 branches in Hanoi. However, there have been many competitors in the organic food field so Tam Dat need to satisfy their consumers better through understanding the factors affecting consumption behavior towards Tam Dat's products to make decisions of production, distribution, selling and marketing more efficiently.

Based on these facts, the authors decided to research on the factors affecting the consumption behavior towards Tam Dat Joint Stock Company's organic food.

2. LITERATURE REVIEW

2.1. The environmental factors affecting consumption behavior towards organic food

- *The cultural factor* has been studied by First and Brozina (2009), surveying 120 people from 8 European countries including England, France, Italy, Germany, Denmark, Switzerland, Austria, Finland. The results show that different cultures have different influences on the motivation to consume organic food. Countries that value individuality and assertiveness are motivated to consume organic food for health reasons. Countries that promote sociality and have a human development orientation are motivated to consume organic food for the environment. The authors however admit the limitation of the study is that the results are not based on

absolute values and affects the accuracy; the data set is small but the variables are discrete that leads to high variances. The sample is heterogeneous and the survey questions are deeply expertised so it requires highly educated participants to grasp the question, therefore the results are not uniform. It can only be ascertained that different cultures have different effects on organic food consumption motivation from this study.

- **The reference group factor** was studied by Thompson and Kidwell (1998) and concluded that people who shop at convenience stores or supermarkets are more likely to buy, and those who have family members under the age of 18 have much higher purchasing power. In addition, the appearance of organic products negatively affects those who intend to consume due to concerns about internal quality issues, and those who buy organic food at specialty stores are affected by price than those who buy organic food at supermarkets or convenience stores.

2.2. The personal factors affecting consumption behavior towards organic food

- **The demographic factors**, perception, attitude, lifestyle, motivation, and normative values have been argued by Krishna and Balasubramanian (2018) that although customers are aware of organic food, but the consumption is relatively low because of high price, lack of varieties, lack of trust and little information about the product quality. The demographic factors have also been studied by Chouicho et al. (2013) and concluded that the demand for organic products increases with the raise of age, education, and income. The authors further discovered that the motivations of consumers in Bangkok to use organic food are health benefits, taste, and appearance. In addition, the study conducted by Vijayalakshmi and Kennedy (2020) shows that the frequency and amount of organic food consumption is directly proportional to the age, education, and income of customers. Consumption of organic food is also easier for customers who are married or stay with families.

- **The cognitive and need factors** have been studied by Soler et al. (2008) and showed that organic food consumption occurs more often from participants who shows awareness and need for organic food. Participants with higher awareness of organic food have a higher demand for organic food.

- **The lifestyle factors** have been studied by Soroka and Wojciechowska-Solis (2019) on 3,436 consumers in

Poland and showed that lifestyle has an influence on organic food consumption behavior, and it is more evident in those who regularly engage in outdoor activities because they consider health as the selection criterion, while those who do not have outdoor activities consume organic food because of its attractive taste.

- **The normative values and attitude factors** have been studied by Sundqvist (2005) on 200 customers in Finland and concluded that normative values and attitudes can be used to predict customers' organic food consumption behavior. **The attitude, perception, lifestyle, and normative values** have been studied by Bagher et al. (2018) and concluded that knowledge, attitudes, health awareness, environmental concerns, standards, behavioral control positively affects the intention to buy organic food, while lifestyle does not have a significant impact on the intention to purchase organic food.

2.3. The overall personal and environmental factors affecting the consumption behavior towards organic food

- **Factors of information, reference groups, lifestyle, normative values, and beliefs** have been analyzed by many researchers. Jyoti Ranaa and Justin Paul (2017) show that organic food consumption behavior is positively impacted by consumers' health awareness, product quality and safety, awareness of protecting the environment, trends, social awareness, and certifications. Le Thi Thuy Dung (2017) states that attitudes, subjective standards, concern for health, concern for the environment, trust, availability, price, and mass communication affect the purchase intention towards organic food in Danang. Hoang Thi Bao Thoa et al. (2019) point out the factors affecting the intention to buy organic food of consumers in Hanoi including attitude, subjective standards, beliefs, and information have a positive impact on consumers' purchase intention. Nguyen Thao Nguyen and Le Thi Trang (2020) state that the factors affecting the consumption behavior towards organic food include food safety, health, environment, quality, and price.

- **Cultural factors, perception, attitude, and motivation** were studied by Effendi et al. (2015); Yadav and Pathak (2017); Pacho (2020). The research of Ihsan Effendi et al (2015) was carried out using the Theory of Reasoned Action (TRA) of Fishbein and Ajzen (1975). The research conducted by Yadav and Pathak (2017) uses

the Theory of Planned Behavior of Ajzen (1991) to study the factors affecting consumer intention to buy organic food of 630 customers in India. Frida Pacho's study (2020) used Ajzen's (1991) Theory of Planned Behavior to study the factors affecting the decision to buy organic food in Tanzania and acknowledged that culture has an influence on the decision to buy organic food.

- *Factors of information, attitude, perception, and normative values* were studied by Huynh Dinh Le Thu et al. (2021). The study surveyed 238 consumers in Long Xuyen city, aged 18 years or older and had heard of organic food. The results show that beliefs and attitudes are the two biggest influencing factors on purchase intention and mediate the relationship between information and perception in the intention to buy organic food.

- *Motivational, cognitive, informational, and lifestyle factors* were studied by Zepeda and Deal (2009) and concluded that all four factors mentioned above have an influence on consumption behavior towards organic food. The author also mentioned that the limitation of the study is that the author only focuses on organic bread and organic flour products at specialized organic food stores, so the research results may not be true for a broader scale.

In general, there is much literature on the factors affecting organic food consumption behavior. However, studies have not clearly studied the influence of culture. Culture is a unique characteristic of each region and country, and is an environmental factor that directly affects the style, personality, and trends of each person in that culture. Different cultures have different impacts on consumers' organic food consumption behavior. Vietnamese culture is a gap in current research. Researches on factors affecting organic food consumption behavior have not paid attention on Vietnamese culture. Vietnam is a country with a diverse, rich, and distinct culture; Vietnamese customs and habits are completely different from those of other countries. Therefore, it can be affirmed that Vietnamese culture is a new factor in research.

3. THEORETICAL FOUNDATION

3.1. The definition of organic food

Organic food is defined as food produced without herbicides, pesticides, antibiotics, inorganic fertilizers and growth hormones (Honkanen et al., 2006). Different

sources give different definitions of organic food but nearly all definitions are based on attributes such as safety, nutrition, criticality, and naturalness (Kahl et al. al., 2012).

3.2. The definition of the consumption behavior

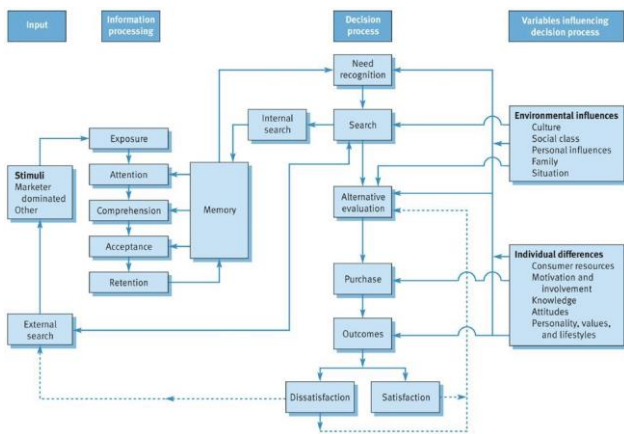
Loudon & Bitta (1984) state that the consumption behavior is the decision-making process and actual human action when evaluating, purchasing, using or rejecting goods and services. Bennet (1988) argues that the consumption behavior is the behavior that consumers show in finding, purchasing, using, and evaluating products and services that they expect to satisfy their individual needs. Schiffman & Kanuk (1991) define the consumption behavior as the actions that people show in the process of investigating, purchasing, using, evaluating, and choosing or discarding products and services to satisfy their needs. According to another approach, Vu Huy Thong (2018) identifies the consumption behavior as the process by which individuals form responses to their own needs, and this process includes awareness and action.

3.3. Factors affecting the consumption behavior

There are many factors that influence the consumption behavior. According to the full model of consumer behavior by Engel et al. (1993), factors affecting the consumption behavior are divided into two categories including environmental factors and personal factors. Environmental factors include culture, social class, reference groups, family, situation, and information environment. Personal factors include demographic characteristics, motivations/needs, knowledge/perceptions, attitudes, personality/lifestyle, normative values, and word of mouth (WOM) information. The consumption behavior in the model is understood as the stage from the purchase decision to the customer's response including satisfaction/dissatisfaction after purchase. These stages are all influenced by environmental factors and consumers' personal factors at the same time.

Figure 3.1. The Full Model of Consumer Behavior

by Engel et al. (1993)



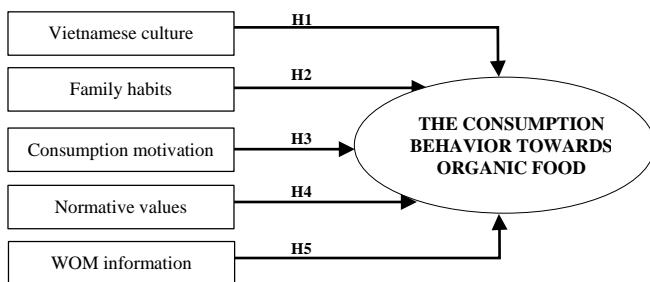
Source: Vu Huy Thong (2018), text book: *Consumer Behavior*, p.51

4. THE RESEARCH MODEL AND HYPOTHESES

4.1. The proposed research model and hypotheses

The authors based the consumer behavior model of Engel et al. (1993) as a basis for research. The factors in the proposed research model include: Vietnamese culture, family habits, consumption motivation, normative values, and WOM information. The factors act as independent variables, the consumption behavior towards organic food is the dependent variable. The authors study the influence of the independent variables on the dependent variable in a positive direction. **H1, H2, H3, H4, H5** are research hypotheses corresponding to independent variables.

Figure 4.1. The proposed research model



Source: Suggestions by the authors

Hypothesis **H1**: Vietnamese culture has a positive influence on organic food consumption behavior of Tam Dat’s customers.

Hypothesis **H2**: Family habits have a positive influence on the organic food consumption behavior of Tam Dat Investment Joint Stock Company’s customers.

Hypothesis **H3**: Consumption motivation has a positive influence on organic food consumption behavior of Tam Dat’s customers.

Hypothesis **H4**: Normative values has a positive influence on organic food consumption behavior of Tam Dat’s customers.

Hypothesis **H5**: WOM information has a positive influence on organic food consumption behavior of Tam Dat’s customers.

The independent variables are described as follows:

4.2. The independent variables

Vietnamese culture

According to Linton (1945), culture is the totality of behavioral structures expressed directly or indirectly that each individual in a society conveys through values, symbols, beliefs, traditions, and norms. In addition, President Ho Chi Minh mentioned that “Culture is the synthesis of all modes of living and its manifestations that mankind has produced to adapt to the needs of life and the demands of survival” [4, p. 458]. In addition, UNESCO wrote “culture should be regarded as the set of distinctive spiritual, material, intellectual, and emotional features of society or a social group, and that it relevant, in addition to art and literature, lifestyles, ways of living together, value systems, traditions, and beliefs” [39, p. 62]. In this study, Vietnamese culture is discussed including traditional lifestyles and traditional values of the Vietnam. Vietnam has a traditional rice culture and special farming techniques due to the tropical monsoon climate. Tran Ngoc Them (1999) found that rice farming is highly seasonal, so Vietnamese people live in close association with each other into clans, guilds, and villages. This creates community, collectivism, solidarity.

Family habits

According to Tran Quoc Vuong et al. (2006), the family is a miniature society in which the members have a very close relationship based on the principles of affection, blood, morals, economics, and so on. From the perspective of consumer behavior, Vu Huy Thong (2018) believes that the family is the ultimate consumer unit with the participation of more than one individual in the buying decision process. This study refers to the family as a collection of people with the same blood, marriage relationship, nurturing relationship in which the relationship between individuals is a relationship of affection and responsibility. Vietnam is featured with family culture throughout the process of living and working, and different from the independence of capitalist countries in Europe or America.

Consumption motivation

According to Dang Phuung Kiet (2002), motivation is the process of motivating behavior, helping people to orient and maintain physical and psychological activities. According to Vu Huy Thong (2018), motivation is a need with a higher level of satisfaction, it is the internal motivation that promotes human behavior and directs people to achieve goals. Schiffman and Kanuk (1991) wrote “*Motivation is the driving force within individuals that instigate them to action*” [31, p. 69]. This study refers to motivation as what customers need, motivating customers to act as soon as possible.

Normative values

Macionis (2011) defines values as follows: “*Values are broad principles that support beliefs, specific thoughts or ideas that people hold to be true. In other words, values are abstract standards of goodness, and beliefs are particular matters that individuals consider true or false*” [28, p.61]. Macionis (2011) also mentions normative values as follows: “*Values and norms do not describe actual behavior so much as they suggest how we should behave. We must remember that ideal culture always from real culture, which is what actually occurs in everyday life*” [28, p.63]. This study refers to normative values as conventions and concepts that are recognized, endorsed, shared and supported by a group of people or the whole community, manifest through behaviour. It is not mandatory but on a voluntary basis.

WOM information

Arndt (1967) defines WOM as information that is transmitted orally between people in relation to a certain brand, product or service but not for commercial purposes. Ngoc Linh and Quang Truc (2015) define WOM as a form of person-to-person communication directly or indirectly by means of oral transmission through which information is spread quickly in the community. It can be understood that WOM is the sharing of information between individuals through direct and indirect forms without commercial purposes.

5. OPERATIONALIZATION

Table 5.1. The scale of Vietnamese culture

Variable	Encryption	Question
Vietnamese culture	VH1	I use organic food because it carries Vietnamese identity of traditional manual farming
	VH2	I use organic food because it shows the solidarity and sense of community of Vietnamese people

	VH3	I consume organic food because it is the source for Vietnam economic development
--	-----	--

Source: Suggestions by the authors

Table 5.2. The scale of Family habits

Variable	Encryption	Question
Family habits	GD1	My family has a habit of shopping at supermarkets and organic food stores
	GD2	My family often uses organic food
	GD3	The decision maker in my family wants to use the highest quality food

Source: Suggestions by the authors

Table 5.3. The scale of Consumption behavior

Variable	Encryption	Question
Consumption behavior	DC1	I want to use clear originated products
	DC2	I want to use the safest products
	DC3	I want to use the most beneficial products for health

Source: Suggestions by the authors

Table 5.4. The scale of Normative values

Variable	Encryption	Question
Normative values	GT1	I use organic food because it is very friendly to the environment
	GT2	I consume organic food because it is good behavior that needs to be spread
	GT3	I use organic food because it helps improve public health

Source: Suggestions by the authors

Table 5.5. The scale of WOM information

Variable	Encryption	Question
WOM information	TT1	I use organic food because I heard that organic food is the safest.
	TT2	I use organic food because I heard that organic food is the healthiest.
	TT3	I use organic food because I heard that the quality is the highest.

Source: Suggestions by the authors

Table 5.6. The scale of Consumption behavior

Variable	Encryption	Question
Consumption behavior	HV1	I still continue to consume organic food in the future.
	HV2	I will consume more organic food in the future.
	HV3	I will recommend organic food to those around me.

Source: Suggestions by the authors

6. RESEARCH METHODOLOGY

Research methodology was conducted including qualitative research through face-to-face interviews and

quantitative research through the distribution of survey questionnaires.

6.1. Qualitative research

Direct interviews with typical customers of Tam Dat Organic based on the frequency of purchase to have an initial sensory assessment of the suitability of the factors in the research model. The results of the direct interviews show that Vietnamese culture, family habits, motivations, normative values, and WOM information have an influence on organic food consumption behavior. The observable variables of the above independent variables are also related to organic food consumption behavior.

6.2. Quantitative research

This study applies the convenience non-probability sampling method due to limited research time. The sample includes customers who have consumed Tam Dat's organic food. The larger the sample, the higher the reliability of the collected information. When analyzing EFA factors, the minimum sample size should be 5 times larger than the number of observed variables (Bollen, 1989). With 18 observed variables, the minimum sample size of the study is 90 samples. In order to meet the minimum sample size, the authors distributed 120 questionnaires. Invalid answers were removed and processed by SPSS software to analyze the influence of independent variables on dependent variables.

Data analysis is done through the following methods: Descriptive statistics; Cronbach Alpha reliability assessment; Exploratory factor analysis; Correlation analysis; and Regression analysis.

7. RESULTS AND DISCUSSION

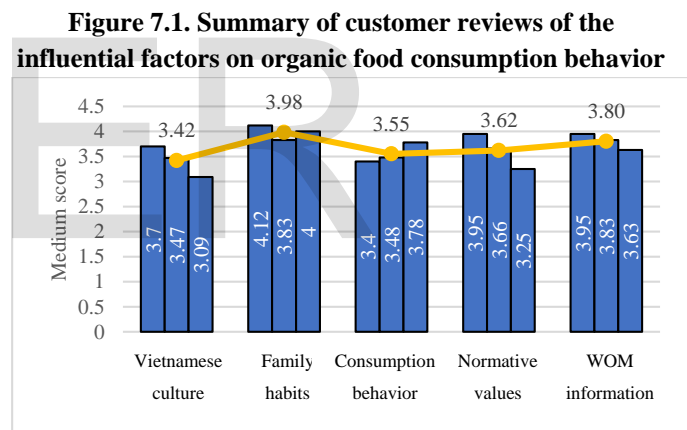
7.1. Demographic characteristics

Regarding *the gender*, the rate of female respondents is 91.92%, male gender is 8.08%. This is a food item so the majority of the sample is female. Regarding *the age*, the age group from 35 years old to 55 years old accounted for the highest proportion of 49.49%. The age group from 18 to 35 years old accounted for the second highest proportion at 35.35%. The rest is the 55-year-old age group, accounting for only 15.15%. The age group under 55 years old is often responsible for deciding and buying food for the family so it accounts for the highest proportion. Regarding *the education level*, the education level of the surveyed

people from College or higher accounted for 83.84%. This ratio is appropriate because all customers live in the city. Regarding *the income*, the household income level from 20 to 30 million accounts for the majority with the proportion of 46.46%. The household income level of over 30 million also accounts for 33.33%. The remaining income level below 20 million accounts for 20.20%. It can be seen that although the price of organic food is relatively high compared to other food, the income of customers is not too high to be able to consume them.

7.2. Descriptive statistics of the variables in the research model

The descriptive statistics of the variables in the research model are shown in Figure 7.1. The descriptive statistics also show that customers will still consume organic food and will recommend organic food to others. It can be seen that the demand for organic food of customers is still there, and they still want to use more organic food. This is a very important point for Tam Dat Organic to have business orientations in the near future.



Source: Data analysis by the authors

Table 7.1. Evaluation of Tam Dat Organic's customers about organic food consumption behavior

Evaluation criteria	Number of answers				
	1	2	3	4	5
I will continue to consume organic food in the future.	0	0	17	42	40
Average score: 4,23					
I will consume more organic food in the future.	0	4	38	32	25
Average score: 3,71					
I will recommend organic to people around me.	0	0	33	35	31
Average score: 3,98					

Source: Data analysis by the authors

7.3. Reliability analysis

7.3.1. The scale of Vietnamese culture

The scale of Vietnamese culture has Cronbach's Alpha coefficient of 0.694, greater than 0.6, so the scale will be retained. Indicators in the scale including VH1, VH2, VH3 have a total correlation coefficient of over

0.3, meeting the requirements. Indicators with Cronbach's Alpha index, if eliminated, are all smaller than the Cronbach's Alpha index of the scale, so they must meet the requirements. *Conclusion:* Vietnamese culture variables are reliable and well-measured.

Table 7.2. The reliability of Vietnamese culture scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.694 (Number of variables: 3)				
VH1	7.172	2.021	0.503	0.611
VH2	6.788	1.924	0.553	0.546
VH3	6.566	2.065	0.474	0.647

Source: Calculations from SPSS by the authors

7.3.2. The scale of family habits

The family habits scale has Cronbach's Alpha coefficient of 0.858, greater than 0.6, so the scale will be kept. Indicators in the scale including GD1, GD2, and GD3 have a total correlation coefficient of over 0.3, meeting the requirements. Indicators with Cronbach's Alpha index, if eliminated, are smaller than the Cronbach's Alpha index of the scale, therefore meet the requirements. *Conclusion:* The family variable is reliable and has a good measure, there is no overlap between the indicators.

Table 7.3. The reliability of family habits scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.858 (Number of variables: 3)				
GD1	7.828	2.511	0.758	0.780
GD2	8.121	2.230	0.700	0.842
GD3	7.949	2.497	0.751	0.785

Source: Calculations from SPSS by the authors

7.3.3. The scale of consumption motivation

The consumption motivation scale has Cronbach's Alpha coefficient of 0.843, greater than 0.6, so the scale will be retained. Indicators include DC1, DC2, DC3 with a total correlation coefficient of over 0.3, ensuring the requirements. Indicators with Cronbach's Alpha index, if eliminated, are all smaller than the Cronbach's Alpha index of the scale, therefore meet the requirements. *Conclusion:* The consumption motivation variable is reliable and has a good measure, there is no overlap between the indicators.

Table 7.4. The reliability of consumption motivation scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.843 (Number of variables: 3)				
DC1	7.182	3.109	0.722	0.768
DC2	6.808	3.136	0.718	0.772
DC3	6.596	3.182	0.685	0.804

Source: Calculations from SPSS by the authors

7.3.4. The scale of normative values

The normative value scale has Cronbach's Alpha coefficient of 0.844, greater than 0.6, so the scale will be kept. Indicators including GT1, GT2, GT3 have a total variable correlation coefficient of over 0.3, meeting the requirements. Indicators with Cronbach's Alpha index, if eliminated, are smaller than the Cronbach's Alpha index of the scale, therefore meet the requirements.

Table 7.5. The reliability of normative values scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.844 (Number of variables: 3)				
GT1	6.909	3.328	0.687	0.804
GT2	7.202	2.877	0.792	0.699
GT3	7.606	3.445	0.656	0.833

Source: Calculations from SPSS by the authors

Conclusion: The normative value variable is reliable and has a good measure, there is no overlap between the indicators.

7.3.5. The scale of WOM information

The scale of WOM information has Cronbach's Alpha coefficient of 0.621, greater than 0.6, so the scale will be retained. Indicators including TT1, TT2, TT3 have a total correlation coefficient of over 0.3, meeting the requirements. Indicators with Cronbach's Alpha index, if eliminated, are all smaller than the Cronbach's Alpha index of the scale, therefore meet the requirements. *Conclusion:* The WOM information variable is reliable and has a good measure, there is no overlap between the indicators.

Table 7.6. The reliability of WOM information scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.621 (Number of variables: 3)				
TT1	7.576	1.614	0.422	0.534
TT2	7.778	1.236	0.489	0.434
TT3	7.455	1.679	0.391	0.575

Nguồn: Nhóm tác giả tính toán từ phần mềm SPSS

7.3.6. The scale of consumption behavior

The scale of consumption behavior has Cronbach's Alpha coefficient of 0.694, greater than 0.6, so the scale will be retained. Indicators including HV1, HV2, HV3 have a total variable correlation coefficient of over 0.3,

meeting the requirements. Indicators with Cronbach's Alpha index, if eliminated, are all smaller than the Cronbach's Alpha index of the scale, therefore meet the requirements. *Conclusion:* The consumer behavior variable is reliable and has a good measure, there is no overlap between the indicators.

Table 7.7. The reliability of consumption behavior scale

Observable variables	Scale mean if item deleted	Scale variance if item deleted	Corrected item – Total correlation	Cronbach's Alpha if item deleted
Cronbach's Alpha = 0.729 (Number of variables: 3)				
HV1	7.475	2.476	0.502	0.699
HV2	7.535	2.190	0.546	0.647
HV3	7.434	1.779	0.621	0.555

Source: Calculations from SPSS by the authors

7.4. Testing the research model and hypotheses

7.4.1. Testing the research model

According to the results of the correlation test, the degree of correlation between the independent variables and the dependent variable has Sig. value less than 0.05. Thus, there is a strong correlation between the independent and dependent variables. At the significance level of 1%, the Pearson coefficients of the independent variables and the dependent variable are in the range from 0.5 to 1, therefore the independent variables all have a positive change with the dependent variable and have a high correlation with the dependent variable. However, there is a possibility of multicollinearity.

Table 7.8. Correlation matrix between independent and dependent variables

		VHVN	GD	DC	GTCM	TTTM	HVTD
VHVN	Chi số Pearson	1	0.390**	0.478**	0.410**	0.218*	0.633**
	Giá trị Sig.		0.000	0.000	0.000	0.030	0.000
	Số mẫu	99	99	99	99	99	99
GD	Chi số Pearson	0.390**	1	0.466**	0.438**	0.351**	0.547**
	Giá trị Sig.	0.000		0.000	0.000	0.000	0.000
	Số mẫu	99	99	99	99	99	99
DC	Chi số Pearson	0.478**	0.466**	1	0.528**	0.281**	0.662**
	Giá trị Sig.	0.000	0.000		0.000	0.005	0.000
	Số mẫu	99	99	99	99	99	99
GTCM	Chi số Pearson	0.410**	0.438**	0.528**	1	0.342**	0.720**
	Giá trị Sig.	0.000	0.000	0.000		0.001	0.000
	Số mẫu	99	99	99	99	99	99
TTTM	Chi số Pearson	0.218*	0.351**	0.281**	0.342**	1	0.261**
	Giá trị Sig.	0.030	0.000	0.005	0.001		0.009
	Số mẫu	99	99	99	99	99	99
HVTD	Chi số Pearson	0.633**	0.547**	0.662**	0.720**	0.261**	1
	Giá trị Sig.	0.000	0.000	0.000	0.000	0.009	
	Số mẫu	99	99	99	99	99	99

Source: Calculations from SPSS by the authors

Conclusion: The independent variables in the model have a linear relationship with the dependent variable, enough to be included in the regression model

to explain the change of the dependent variable. In other words, the factors proposed in the model are eligible to be included in the regression equation to explain the behavior of organic food consumption.

7.4.2. Testing the hypotheses

Table 7.9. The results of analysis of ANOVA variance

Model	Sum of squares	df	Mean squared	F	Sig.	
1	Regression	33.481	5	6.696	48.409	0.000 ^b
	Residual	12.864	93	0.138		
	Total	46.346	98			

Source: Calculations from SPSS by the authors

Sig. value of ANOVA variance is 0.000, less than 0.05, so the research model is eligible to be included in the regression and the regression model is suitable. The results also show that the independent variables explain 70.8% of the dependent variable. Thus, the research model is good and the variables have a great impact on the research object. Durbin-Watson value is 1.704, so the model does not have autocorrelation when referring to the Durbin-Watson value table.

Table 7.10. Summary results of regression analysis

Model	R	R ²	Adjusted R ²	Standard error of estimation	Durbin-Watson
1	0.850 ^a	0.722	0.708	0.3719230	1.704

Source: Calculations from SPSS by the authors

Table 7.11. The multiple linear regression analysis

Model	Unstandardized coefficients		Standardized coef.	T	Sig.	Collinearity statistics	
	B	Standard Error	Beta			Tolerance	VIF
1	(Constant)	0.547	0.303		1.807	0.074	
	VHVN	0.311	0.067	0.298	4.608	0.000	0.715
	GD	0.144	0.061	0.157	2.377	0.020	0.680
	DC	0.194	0.057	0.241	3.420	0.001	0.600
	GTCM	0.340	0.055	0.427	6.225	0.000	0.635
	TTTM	0.089	0.073	0.073	1.221	0.225	0.830

Source: Calculations from SPSS by the authors

The results of multiple linear regression analysis according to table 5.10 are the basis for testing the research hypotheses:

- Testing hypothesis **H1**: the results show that there is no multicollinearity phenomenon (VIF < 2, Tolerance > 0.5) or if it does, it does not significantly affect the research results, so **H1 is accepted** (Sig. = 0.000, B = 0.298). This means that Vietnamese culture has a

positive influence on organic food consumption behavior of Tam Dat’s customers.

- Testing hypothesis **H2**: the results show that there is no multicollinearity phenomenon ($VIF < 2$, Tolerance > 0.5) or if it does, it does not significantly affect the research results, so **H2 is accepted** (Sig. = 0.020, B = 0.157). This shows that family habits have a positive influence on the organic food consumption behavior of Tam Dat Investment Joint Stock Company’s customers.

- Testing hypothesis **H3**: the results show that there is no multicollinearity when $VIF = 1,471 < 2$, Tolerance = 0.680 > 0.5 or if it does, it does not significantly affect the research results, so **H3 is accepted** (Sig. = 0.001, B = 0.241). This means that the consumption motivation has a positive influence on organic food consumption behavior of Tam Dat’s customers.

- Testing hypothesis **H4**: the results show that there is no multicollinearity phenomenon because $VIF = 1.668 < 2$ and Tolerance = 0.600 > 0.5 or if it does, it does not significantly affect the research results, so **H4 is accepted** (Sig. = 0.000, B = 0.427), which also means that normative values has a positive influence on organic food consumption behavior of Tam Dat’s customers.

- Testing hypothesis **H5**: the results show that there is no multicollinearity phenomenon ($VIF < 2$, Tolerance > 0.5) or if it does, it does not significantly affect the research results, but the Sig. value is 0.225, greater than 0.05, so **H5 is not accepted**. Therefore, the author rejects hypothesis H5. Thus, the WOM information has no impact on organic food consumption behavior of Tam Dat’s customers.

Table 7.12. Summary of the results of testing the research hypothesis

Hypotheses	Sig. value	Beta	Conclusion	Impact in order
H ₄	0.000	0.427	Accepted	1
H ₁	0.000	0.298	Accepted	2
H ₃	0.001	0.241	Accepted	3
H ₂	0.020	0.157	Accepted	4

Source: Data analysis by the authors

From the above results, the authors give the following linear regression equation:

$$Y = 0.298 * X_1 + 0.157 * X_2 + 0.241 * X_3 + 0.427 * X_4$$

While:

- Y : The consumption behavior
- X₁: Vietnamese culture
- X₂: Family habits
- X₃: Consumption motivation

X₄: Normative values

From the regression equation, it can be seen that the most influential factor on organic food consumption behavior of Tam Dat is the normative value factor while the least influencing factor is the family habits factor.

8. SUGGESTIONS FROM THE RESULTS

From the above research results, the authors propose suggestions for promoting Tam Dat organic food consumption as follows:

8.1. Promoting Vietnamese cultural factors in customers' organic food consumption behavior

According to the research results, Vietnamese cultural factors have a relatively clear positive influence on customers' organic food consumption behavior but customers rate the lowest among the factors, so this is the factors that need to be focuses. Tam Dat should carry out activities to remind customers of Vietnamese culture to increase customers' attention to its brands and products by implementing following solutions:

- Communicating about the culture in the manual cultivation of organic food ;
- Communicating about Tam Dat's solidarity with organic farmers ;
- Bringing cultural factors into business activities.

8.2. Promoting the family habits factor in customers' organic food consumption behavior

According to the results, the family habits factor has the lowest influence among the factors, however, customers rate this factor relatively high. Therefore, Tam Dat should take maintenance measures. Among the evaluation criteria of the family habit factor, the criterion of habit of using organic food is being underestimated the lowest. Therefore, in addition to maintaining activities for existing customers, Tam Dat can add a shopping program with family members or friends on weekends to maintain buying habits. In addition, it also helps customers have a new shopping experience. However, this program needs to be implemented regularly to be effective in maintaining customers' organic food consumption habits, besides creating consumption habits for loved ones customers in the future. Tam Dat should keep this in mind when implementing customer attraction programs.

8.3. Promoting consumption motivation factors in organic food consumption behavior of customers

According to the results, the consumption motivation factor has a clear positive influence on customers' organic food consumption behavior, and customers rate this factor not too high compared to other factors. Therefore, Tam Dat should use measures that enhance and promote customers' motivation to consume organic food.

- Strong communicating about the origin and the safety of organic products;
- Communicating about the benefits of organic food for health.

8.4. Promote the normative value factor in customers' organic food consumption behavior

According to the results, the normative value factor has the greatest influence on customers' organic food consumption behavior, and customers also rate the score at an average level compared to other factors. Thus, Tam Dat should take measures to promote organic food consumption behavior of customers.

- Promoting strong communication about the eco-friendliness of organic food;
- Spreading the message of environmental protection in business activities;
- Promoting customers' organic food consumption behavior to those around them;
- Promoting public health messages of organic food.

8.5. Promoting the WOM information factor in customers' organic food consumption behavior

The research results show that the WOM information factor does not affect customers' organic food consumption behavior, however, customers highly appreciate this criterion. Thus, WOM information only affects customers' organic food consumption behavior in the first purchase. Therefore, Tam Dat Organic should apply strengthening measures if they want to increase the number of new customers. Possible measures are promoting publicity through celebrities or people with expertise in food and nutrition.

8.6. Other suggestions

- Brand development to strengthen competitive position;
- Adding organic livestock products to increase competitiveness;

- Researching and implementing online sales system to compete with competitors.

CONCLUSION

Summary the research results

Through the research process, the factors affecting the organic food consumption behavior of Tam Dat Investment Joint Stock Company include Vietnamese culture, family habits, consumption motivation, and normative values. Among the above factors, the factor of normative values has the greatest influence on organic food consumption behavior. These factors explain 71% of organic food consumption behavior of customers at Tam Dat Organic. The WOM information factor only affects the behavior of organic food consumption in the first shopping time, but does not affect the organic food consumption behavior of regular consumers.

Through the process of quantitative research, it can be concluded that Tam Dat's customers are those who tend to act in the direction of traditional culture, with certain influences from family habits, great attention to health and social issues especially environmental issues. They choose organic food because of criteria such as safety, clear origin, environmental friendliness, and health benefits. This is the portrait of the target audience that Tam Dat Organic needs to aim for.

In addition, a number of solutions to improve competitiveness, develop brands, supplement groups of organic livestock products, and deploy an online sales system. Tam Dat needs to implement solutions in a synchronous manner with a clear implementation plan to achieve the highest efficiency in promoting customers' organic food consumption behavior, maintaining the number of customers and attract new customers.

Limitations of the research

Due to limited resources, this study only mentions 5 factors included in the proposed model. The scale in the research topic was built by the authors themselves through the process of qualitative customer surveys during the research process, so the scales in the factor may not be enough to measure comprehensively.

The factors in the research model proposed by the authors only cause 71% of the influence on the organic food consumption behavior of customers of Tam Dat. Thus, for Tam Dat's customers in particular, 29% of the impact comes from other factors that the authors have not yet explained.

The research topic has not mentioned the policy and legal environment in the field of organic agriculture, so it has not studied the difficulties of Tam Dat when doing business in this field.

Further research

In addition to dealing with the limitations mentioned above, regarding the scope of the research, the authors will research in the geographical area, expand to other geographical regions, and expand the target audience so that the research results are more meaningful and more general, as a basis for businesses doing business in the field of organic agriculture in general to refer to and apply in their marketing activities.

REFERENCES

I. Vietnamese references

1. Đặng Phương Kiệt (2002). *Cơ sở tâm lý học ứng dụng*, 1st ep. Nhà xuất bản Đại học Quốc gia Hà Nội, 348-349.
2. Hoàng Thị Bảo Thoa et al. (2019). Các nhân tố ảnh hưởng đến ý định tiêu dùng thực phẩm hữu cơ của người tiêu dùng ở Hà Nội. *Tạp chí khoa học Kinh tế và Kinh doanh*, 35(3), 79-90.
3. Hoàng Trọng & Chu Nguyễn Mộng Ngọc (2008). *Phân tích dữ liệu nghiên cứu với SPSS*, 2nd ep. Nhà xuất bản Hồng Đức.
4. *Hồ Chí Minh toàn tập*, 3rd ep (2011). Nhà xuất bản Chính trị quốc gia.
5. Huỳnh Đình Lệ Thu et al. (2021). Các nhân tố ảnh hưởng tới ý định mua thực phẩm hữu cơ của người tiêu dùng tại thành phố Long Xuyên. *Tạp chí Khoa học Đại học Đồng Tháp*, 10(1), 71-84.
6. Lê Thị Thùy Dung (2017). *Các nhân tố tác động đến ý định mua thực phẩm hữu cơ của người tiêu dùng tại thành phố Đà Nẵng*. Master Thesis, Danang University.
7. Nguyễn Hoàng Ngọc Linh & Lê Quang Trục (2015). Nghiên cứu hoạt động marketing truyền miệng (word of mouth marketing) tại các khách sạn ở Thừa Thiên Huế. *Tạp chí Các tạp chí khoa học thuộc khối Khoa học tự nhiên và công nghệ*, 8(4), 24-34.
8. Nguyễn Thảo Nguyên & Lê Thị Trang (2020). Yếu tố ảnh hưởng đến ý định mua thực phẩm hữu cơ của người tiêu dùng tại Thành phố Hồ Chí Minh. *Tạp chí Khoa học Đại học Mở Thành phố Hồ Chí Minh*, 16 (1), 160-172.

9. Nguyễn Thị Nhung et al. (2021). Thực trạng tiêu dùng thực phẩm hữu cơ tại Việt Nam. *Tạp chí Tài chính doanh nghiệp*.
10. Quốc hội nước Cộng hòa Xã hội Chủ nghĩa Việt Nam (2020). *Luật Hôn nhân và gia đình Việt Nam hiện hành*. Hà Nội: Nhà xuất bản Chính trị Quốc gia Sự thật, p. 2.
11. Trần Ngọc Thêm (1999). *Cơ sở văn hóa Việt Nam*. Lần 2. Hồ Chí Minh: Nhà xuất bản Giáo dục.
12. Trần Quốc Vượng et al. (2006). *Cơ sở văn hóa Việt Nam*. Lần 8. Tam Kỳ: Nhà xuất bản Giáo dục.
13. Vũ Huy Thông (2018). *Giáo trình Hành vi người tiêu dùng*. Nhà xuất bản Đại học Kinh tế quốc dân.

II. Sources from other countries

14. Andrzej Soroka & Julia Wojciechowska-Solis, (2019). Consumer Motivation to Buy Organic Food Depends on Lifestyle. *Foods*, Vol. 8, No. 11, pp. 581.
15. Arndt Johan (1967). *Word of Mouth Advertising and Informal Communication*. In: Donald F. Cox, ed. (1967). *Risk Taking and Information Handling in Consumer Behavior*. Boston: Harvard University, pp. 190.
16. Asgarnezhad Nouri Bagher et al. (2018). Factors affecting intention to purchase organic food products among iranian consumers. *Academy of Marketing Studies Journal*, Vol. 22, Issue 3.
17. Anssi Tarkiainen Sanna Sundqvist (2005). Subjective norms, attitudes and intentions of Finnish consumers in buying organic food. *British Food Journal*, Vol. 107, Issue 11, pp. 808 – 822.
18. Bollen K,A. (1989). *Structural equations with latent variables*. New York: John Wiley.
19. Frida Pacho (2020). What influences consumers to purchase organic food in developing countries ?. *British Food Journal*, 122(12), 3695-3709.
20. Gary D. Thompson & Julia Kidwell, (1998). Explaining the Choice of Organic Produce: Cosmetic Defects, Prices, and Consumer Preferences. *American Journal of Agricultural Economics*, Vol. 80, Issue 2, pp. 277-287.
21. Gerbing & Anderson (1998). An update Paradigm for Scale Development Incorporating Unidimensionality and Its Assessments. *Journal of Marketing Research*, Vol. 25, pp. 186-192.
22. Hair et al. (2009). *Multivariate Data Analysis*. 7th Edition. Upper Saddle River: Prentice Hall, 111-116.

23. Honkanen, P. et al. (2006). Ethical values and motives driving organic food choice. *Journal of Consumer Behaviour: An International Research Review*, Vol. 5, No. 5, pp. 420-430.
24. Icek Ajzen (1991). The theory of planned behavior. *Organizational Behavior và Human Decision Processes*, Vol 50, pp. 179-211.
25. Ihsan Effendi et al. (2015). Analysis of Consumer Behavior of Organic Food in North Sumatra Province, Indonesia. *Journal of Business and Management*, Vol. 4, Issue 1, pp. 44-58.
26. Ivana First & Stasa Brozina (2009). Cultural influences on motives for organic food consumption. *EuroMed Journal of Business*, 4(2), 185 – 199.
27. James F. Engel et al. (1993). *Consumer Behavior*. 6th Edition. Chicago: Dryden Press.
28. John J. Macionis (2011). *Sociology*. 14th Edition. New York: Pearson.
29. Jyoti Ranaa & Justin Paul (2017). Consumer behavior and purchase intention for organic food: A review and research agenda. *Journal of Retailing and Consumer Services*, Vol. 38, pp. 157-165.
30. Kahl, J. et al. (2012). Organic food quality: A framework for concept, definition and evaluation from the European perspective. *Journal of the Science of Food and Agriculture*, Vol. 92, No.14, pp. 2760-2765.
31. Leon G. Schiffman & Leslie Lazae Kanuk (1991). *Consumer Behavior*. New York: Prentice Hall.
32. Loudon D.L & Della Bitta A.J (1984). *Consumer behavior: concept and applications*. McGraw-Hill Companies.
33. Nunnally J. (1978). *Psychometric Theory*. New York, NY: McGraw-Hill.
34. Peter D. Bennet (1988). Marketing McGraw-Hill series in marketing, illustrated, *McGraw-Hill*.
35. Ralph Linton (1945). *Le fondement culturel de la personnalité*. Canada: Jean Marie Tremblay, 59-68.
36. Rambalak Yadav & Govind Swaroop Pathak (2017). Determinants of Consumers' Green Purchase Behavior in a Developing Nation: Applying and Extending the Theory of Planned Behavior. *Ecological Economics*, Vol 134, pp. 114-122.
37. R. Krishna & P. Balasubramanian (2018). The Significance of Factors Influencing Consumer Behaviour towards Organic Food Products in Kochi. *International Journal of Pure and Applied Mathematics*, Vol. 119, No. 12, pp. 2641-2665.
38. Seksak Chouichom et al. (2013). General View Point, Perception and Acceptance of Organic Food Products among Urban Consumers in the Thai Marketplace. *Sustainable Food Security in the Era of Local and Global Environmental Change*, pp. 187–201.
39. UNESCO (2002). *Records of the General Conference*. Paris: UNESCO.
40. Vijayalakshmi & Hanuman Kennedy (2020). A Study on the Effect of Demographic Factors on Consumer Buying Decision of Organic Food Products in Bangalore City. *Mukt Shabd Journal*, Vol. 9, Issue V, Issn. No. 2347-3150, pp. 789-806.