

Research on the Influencing Factors of Vietnamese Consumers' Cross-border E-commerce Online Shopping Intentions

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Abstract

The swiftness of the Internet era has brought a good development opportunity to the economies of countries around the world, especially cross-border e-commerce. The emerging development of cross-border e-commerce and e-commerce in Vietnam must now pay more attention to the continuity of its development. Consumers' willingness to cross-border online shopping has gradually become a plus point of concern for Vietnamese society and academia. This paper analyzes the six influencing factors of Vietnamese consumers' cross-border e-commerce online shopping willingness through the technology acceptance (TAM) model, which are: perceived usefulness, perceived ease of use, perceived risk, perceived popularity, cultural values. Result show that: (1) Perceived usefulness, perceived ease of use, perceived popularity, and cultural values positively affect the willingness of Vietnamese consumers to buy online cross-border e-commerce; (2) Perceived risks negatively affect the willingness of Vietnamese consumers to buy online cross-border e-commerce; (3) Perceived popularity and cultural values have a moderating effect on other variables. According to the research results, Vietnam's development of cross-border e-commerce is proposed from five aspects: improving perceived usefulness, perceived ease of use, prevention and control of risks, catering to cultural psychology, and strengthening awareness of popular announcements.

Keywords

Cross-border e-commerce; Consumers' willingness; The technology acceptance (TAM) model.

1. Introduction

The rapid growth and popularization of Internet and smart phone usage has brought a good condition for the development of e-commerce. Online shopping has become an indispensable part of the lives of consumers all over the world. With the rapid development of the Internet, e-commerce in Vietnam also has good development prospects. According to statistics from the Internet data information network Digital, as of January 2021, the total number of people in Vietnam has reached more than 97 million, of which 150 million are using by mobile phones, accounting for 157.9% of the total, with 2020 more than 500,000 has been added. At the same time, according to statistics in January 2021, Vietnam's Internet usage reached 60 million people, accounting for 70.3% of the total, an increase of 0.8% over the same period in 2020. The average time each Vietnamese uses the Internet per day is six hours and 47 minutes, the number of people using mobile phones to access the Internet has increased rapidly, reaching 94.7% of the total number by January 2021.

According to statistics from the Vietnam Statistics Bureau, the number of online shoppers in Vietnam will account for 30% of the total population in 2020, and the average consumption amount will reach US\$350. B2C e-commerce transactions have grown by an average of 20%

annually, reaching 10 billion U.S. dollars, accounting for 5% of the country's total retail sales of goods and services.

The era of global economic integration has brought cross-border e-commerce into a new stage of development. The continuous improvement of living standards and income has made cross-border e-commerce more and more popular among Vietnamese consumers. When domestic e-commerce products cannot meet their needs, consumers are more inclined to choose cross-border e-commerce. Cross-border e-commerce has a relatively obvious influence on national import and export trade, and consumers' purchase intention is an important part of the development process of cross-border e-commerce. Research on consumers' willingness to purchase cross-border e-commerce online has become the concern of many scholars. In Vietnam, as cross-border e-commerce is still a relatively new industry, research on the willingness of relevant consumers to buy online from cross-border e-commerce is still rare. This article points out the concerns of Vietnamese consumers in the process of cross-border e-commerce online shopping by studying the influencing factors of Vietnamese consumers' cross-border e-commerce online shopping and proposes reasonable improvement measures.

2. Research Purpose and Significance

2.1. Research Purpose

The main research purposes of this paper are:

- (1) Identify and analyze the influencing factors of Vietnamese consumers' cross-border e-commerce online shopping willingness, and point out the degree of importance of each influencing factor.
- (2) Provide appropriate suggestions to relevant industries and organizations to improve cross-border e-commerce services and improve consumer satisfaction.

2.2. Research Significance

2.2.1. Theoretical Significance

- (1) From the perspective of consumers, this article analyzes the two core variables in the TAM model that affect consumers' willingness to purchase cross-border e-commerce: perceived usefulness and perceived ease of use.
- (2) This article combines the perceived risk theory and introduces the perceived risk factors to analyze consumers' wait-and-see psychology of cross-border e-commerce online shopping. At the same time, it designs a scale based on the current actual problems of cross-border e-commerce and enriches cross-border e-commerce online shopping. The connotation of perceived risk in the process.
- (3) This article introduces the two variables of perceived popularity and cultural values on the basis of the technology acceptance model TAM, analyzes the impact of these two variables on the willingness of Vietnamese consumers to shop online in cross-border e-commerce, and point out their moderating effects on the perceived usefulness, perceived ease of use, and perceived risk of consumers' cross-border e-commerce online shopping intentions.

2.2.2. Practical Significance

- (1) The growth of the Internet and data economy has brought good development opportunities for cross-border e-commerce, and has gradually become an important support for the economic development of various countries and regions. Vietnam is a country with rapid development of e-commerce, and promoting cross-border e-commerce is one of the important tasks of the Vietnamese national government. This article explores the main influencing factors of cross-border e-commerce online shopping willingness and analyzes the reasons for the wait-and-see

attitude of Vietnamese consumers towards cross-border online shopping, so as to improve Vietnamese cross-border e-commerce online shopping transactions.

(2) This article also discusses the current problems of cross-border e-commerce in the research process. These issues have a significant impact on consumers' perception of cross-border e-commerce online shopping.

3. Research Summary

This article mainly sorts out from two aspects, including: first, a summary of relevant research on cross-border e-commerce; second, a summary of relevant research on purchase intention.

3.1. Summary of relevant research on cross-border e-commerce

Cross-border trade e-commerce, referred to as cross-border e-commerce for short, is a relatively advanced level in the development of e-commerce. With the recovery of the global economy and the advancement of Internet technology, the development of cross-border e-commerce has begun to receive the attention of the international academic community. In their research, scholars mainly pointed out the importance of cross-border e-commerce, the development prospects of cross-border e-commerce, and the problems faced by cross-border e-commerce.

(1) Cross-border e-commerce has an important position in the economic development of various countries

Regarding the importance of cross-border e-commerce, Hortaçsu (2009) believes that cross-border e-commerce is a further development of mankind, it can shorten the time and space distance between consumers and businesses, no matter which country you live in, you can buy product from all over the world [1]. Bertin Martens (2013) believes that cross-border transactions can bring two benefits to customers. The first is to shorten the distance in space and geographic location, and the other is to increase the diversity of products [2]. Chinese scholar E Libin et al. (2014) believe that cross-border e-commerce has developed rapidly and has become a new way of China's foreign trade, which is of great significance to the transformation and upgrading of Chinese enterprises in foreign trade [3]. Wang Aihong et al. (2017) believe that the cross-border e-commerce foreign trade model has become a new model for China's foreign trade transformation and upgrading, and a new engine for foreign trade growth [4]. Zou Lei et al. (2015) believe that cross-border e-commerce is a product of the times that emerged in the new era. Cross-border e-commerce is convenient and fast, is conducive to improving transaction efficiency, and is an important way to achieve traditional foreign trade informatization, networking and intelligence, is an important way to integrate into the world economy and achieve a higher level of openness [5]. Wu Yue et al. (2015) believe that cross-border e-commerce has an important contribution to China's economy, and the development of cross-border e-commerce can become a new breakthrough in the transformation and upgrading of China's foreign trade [6].

(2) Cross-border e-commerce has good development prospects

In view of the prospects for the development of cross-border e-commerce, some scholars in China affirmed the development trend and advantages of cross-border e-commerce. Li Linghui et al. (2017) believe that economic globalization and the improvement of living standards have made cross-border e-commerce a part of people's daily lives. The important part is that the B2C retail model has been favored by consumers [7]. Cui Yanbing et al. (2015) believe that the position and role of cross-border e-commerce in international trade is becoming more and more important, and it has become an important path for the development of China's foreign trade [8]. Meng Xiangming and Tang Qianhui (2015) believe that cross-border e-commerce, as a new cross-border trade model, has great development potential and will become an

important part of China's foreign trade in the future [9]. E Libin and Huang Yongwen (2014) pointed out that whether it is Western European countries or emerging economies, e-commerce is developing rapidly, giving global cross-border e-commerce a prerequisite for vigorous development [10]. Wang Fang and Sun Lei (2015) believe that the needs of economic development, market choices, corporate capital development and government policy support give cross-border e-commerce a good development prospect [11].

(3) There are still many problems in cross-border e-commerce

So far, there are still many problems in cross-border e-commerce, and these problems have also been mentioned in the research of scholars. Bas (2014) pointed out that the advantage of cross-border e-commerce is that it makes trade borderless and accelerates the development of trade in various countries. However, the rapid development of cross-border e-commerce also brings about difficulties in return and exchange, and difficulties in real-time tracking of orders, and other cross-border logistics problems, to a certain extent, will hinder the development of cross-border e-commerce [12]. Marius Costel Esi (2015) studied the quality problems of modern B2C e-commerce websites from a relatively micro level. He believes that there are serious defects in the website process, mainly in the rationality of website and payment design [13]. Cardona (2015) verified that prices, varieties, and transaction costs are the driving forces for consumers to make cross-border purchases, but transaction risks are a big obstacle to cross-border e-commerce [14]. Li Yan (2016), Wu Xing (2016), Meng Xiangming, Tang Qianhui (2015), Xu Song, Zhang Yanyan (2015) believe that cross-border e-commerce has some problems in terms of cumbersome customs clearance procedures, slow cross-border logistics, and electronic payment security [15-19]. Lai YouWei, Wang Kaiqian (2014) also agrees that China's cross-border e-commerce is still facing problems such as long customs clearance time and inadequate market supervision at this stage [20]. Chen Huipeng (2018) believes that in addition to Internet security issues, customs clearance and commodity inspection issues, lack of talents, political, legal, taxation, exchange rate and other risks, language, culture, ethnicity, and religious barriers will affect the development of cross-border e-commerce [21].

3.2. Summary of Relevant Research on Consumers' Online Purchase Intention

(1) The meaning of online purchase intention

Purchase intention refers to the possibility that consumers want to purchase a certain commodity. Purchase intention will directly affect consumers' purchasing behavior, that is, the higher the purchase intention, the more willing consumers will make actual purchase behavior. Purchase intention has become an important research part of scholars in analyzing the process of consumer behavior. Qi Wen'e and Lin Chuan (2018) believe that the nature of online purchase intention is very similar to purchase intention, which mainly refers to the subjectivity of consumers in the purchase process. Due to the different buying environment, the influencing factors of online purchase intention and offline purchase intention are different to a certain extent. When shopping offline, consumers can directly touch the products, and if shopping online, consumers can only understand through the seller's information and product information, so the consumer's willingness to buy mostly depends on the information that can be searched on the Internet [22].

(2) A review of relevant research on the influencing factors of consumers' online purchase intention

Due to the different buying environment, there are differences between online shopping and offline shopping to a certain extent. Therefore, consumers' willingness to shop online is somewhat different from that of offline shopping. Hasslinger et al. (2008) studied the influencing factors of Swedish college students' willingness to buy books online and pointed out that price concessions, convenience, and store reliability directly affect the consumption behavior of college students, of which the influence of price concessions is the most important

[23]. Hossein Rezaee et al. (2011) believe that the factors that affect consumers' purchase intention mainly include: perceived usefulness, perceived preference, perceived reliability, perceived risk, corporate reputation, and social norms [24]. Vietnamese scholar Hoang Quoc Cuong (2010) uses the integrated technology acceptance-UTAUT model to analyze the influencing factors of consumers' online shopping intentions. He believes that the main factors that affect the willingness of Vietnamese consumers to shop online are: perceived price, perceived usefulness, perceived ease of use, social norms, perceived preference, and perceived risk [25]. Le Ngoc Duc (2008) pointed out that consumers who have used electronic payment will be affected by perceived usefulness, perceived ease of use, perceived behavior control and subjectivity and are willing to use electronic payment. For paying consumers, two factors such as perceived behavior control and subjectivity will directly affect their willingness to use [26]. The factors that affect the willingness of cross-border e-commerce online shopping and domestic online shopping are also somewhat different. Ma Shijian (2016) studied the influencing factors of consumers' cross-border e-commerce online shopping willingness pointed out that in addition to the impact of perceived usefulness, perceived ease of use, and perceived risk, consumers will be subject to their own nationalist psychology and subjective choices when purchasing overseas products [27]. Chen Zihui (2017) studied the influence of uncertain factors on consumers' willingness to purchase online cross-border e-commerce, pointed out that in order to make purchase intentions, consumers will always first identify the uncertainty, and then reduce the uncertainty in various ways to achieve certainly goals, uncertainty factors mainly include: personal information privacy concerns, fear of sellers' opportunism, information asymmetry, a sense of vitality, etc. [28].

(3) Research model of factors influencing consumers' online purchase intention

In the field of studying consumers' online purchase intentions, Davis (1986) first proposed the Technology Acceptance Model (TAM) through the theory of consumer behavior and planned behavior [29]. This model is widely used, when using the TAM technology acceptance model, researchers will add external variables according to the characteristics of the research object to develop the TAM technology acceptance model. In addition to the application of the TAM model, scholars have also adopted many methods to analyze the influencing factors of consumers' online shopping willingness. Ramakrishna Ramanathan (2010) uses a combination of principal component analysis and data envelopment analysis to point out that logistics services will affect consumers' purchase intention and purchase loyalty [30]. Huang Fang (2015) adopted a service model in his research and believed that the quality of platform services has the most significant impact on college students' purchasing decisions, and concluded that the stability of the platform system and the reality of herd mentality play an important role in improving consumers' purchasing intentions [31]. Li Jiang et al. (2020) used the UTAUT model to analyze the impact of e-commerce platform perception on consumers' purchase intentions and concluded that the functional perception and brand perception of cross-border e-commerce platforms can significantly affect consumers' experience of cross-border e-commerce shopping, thereby increasing their willingness to buy [32].

3.3. Research Review

In summary, the academic community generally believes that cross-border e-commerce is a new type of cross-border trade model with great potential, and it has become an indispensable and important trend in the economic development of various countries. With the rapid popularization of the Internet, the development of cross-border e-commerce also has good prospects. Although there are still many problems to be solved, it has gradually become the support of global economic development.

The development of cross-border e-commerce is inseparable from the increase in consumer purchases. Most scholars have concluded through research that there is a correlation between

consumers' purchasing behavior and their purchasing intention. The stronger the consumer's purchasing intention, the higher the feasibility of the purchasing behavior. Consumers' willingness to purchase online cross-border e-commerce is affected by many subjective and objective factors, and there are many methods and models to study these influencing factors. This article will use the TAM technology acceptance model to analyze the five major factors of Vietnamese consumers' cross-border e-commerce online shopping: perceived usefulness, perceived ease of use, perceived risk, perceived popularity, and cultural values.

4. Research Hypotheses

4.1. TAM Model

Based on research conclusions, this article believes that perceived usefulness, perceived ease of use, perceived risk, perceived popularity, and cultural values have a significant impact on Vietnamese consumers' willingness to purchase cross-border e-commerce online. Among them, perceived popularity and cultural values have a moderating effect on perceived usefulness, perceived ease of use, perceived risk, and cross-border e-commerce online shopping willingness. The research model of this article is shown in Figure 1:

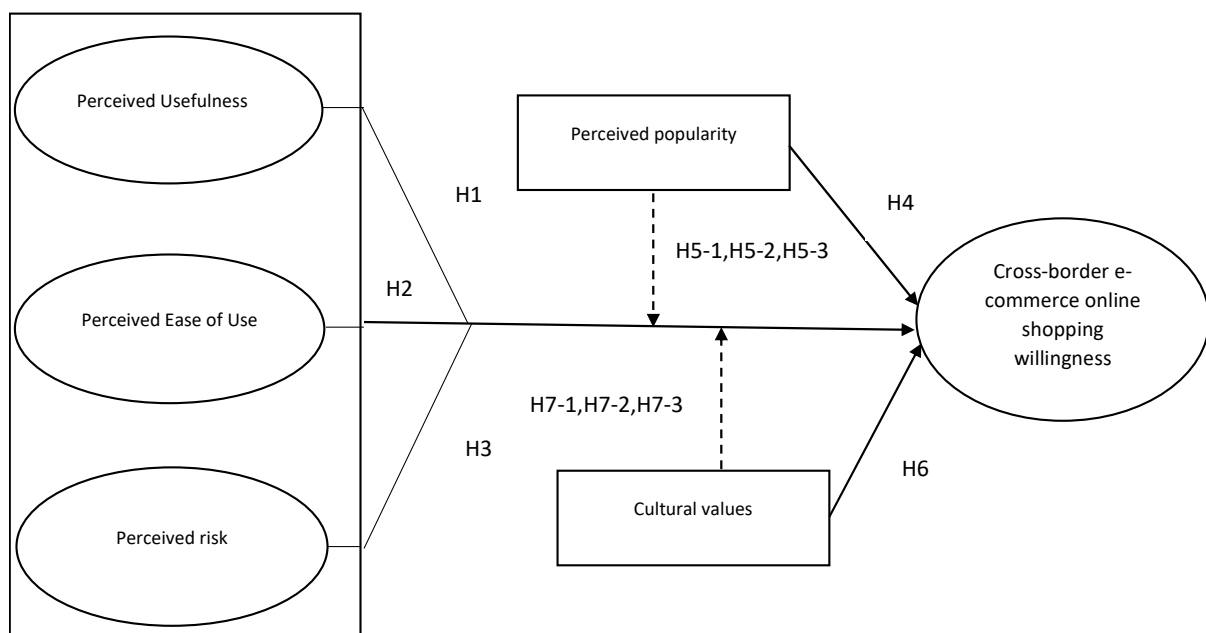


Figure 1. Research mode

Here, we hypothesized that:

H1: Perceived usefulness positively affects Vietnamese consumers' willingness to purchase online cross-border e-commerce

H2: Perceived ease of use positively affects Vietnamese consumers' willingness to purchase cross-border e-commerce online

H3: Perceived risk negatively affects Vietnamese consumers' willingness to purchase online cross-border e-commerce

H4: Perceived popularity positively affects Vietnamese consumers' willingness to purchase online cross-border e-commerce

H5-1: Consumers' perceived popularity has a moderating effect on the perceived usefulness of cross-border online shopping

H5-2: Consumers' perceived popularity has a moderating effect on the perceived ease of use of cross-border online shopping

H5-3: Consumers' perceived popularity has a moderating effect on the perceived risk of cross-border online shopping

H6: Cultural values are positively affecting Vietnamese consumers' willingness to purchase online cross-border e-commerce

H7-1: Consumers' cultural values have a moderating effect on the perceived usefulness of cross-border e-commerce online shopping

H7-2: Consumers' cultural values have a moderating effect on the perceived ease of use of cross-border e-commerce online shopping

H7-3: Consumers' cultural values have a moderating effect on the perceived risk of cross-border e-commerce online shopping

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