

## Analysis on the Influencing Factors of Trust Behavior among Consumers' Supply Chain

Yan Li<sup>1, a</sup>, Yang Liu<sup>2, b</sup>

<sup>1</sup>School of Management, Xi'an University of Science & Technology, Xi'an 710054, China;

<sup>2</sup> School of Management, Xi'an University of Science & Technology, Xi'an 710054, China.

<sup>a</sup>632058171@qq.com, <sup>b</sup>243214167@qq.com

### Abstract

In this paper, the consumer goods enterprises are regarded as the core enterprises of the supply chain, and the trust behavior between the suppliers and the customers is studied. The factors that influence the behavior are divided into three dimensions: relationship, trait and cooperative performance. analysis. The research results show that the reputation and ability of information supply chain members, the degree of information sharing, the degree of interdependence and the performance of cooperation have a great influence on the trust behavior between consumer goods supply chain.

### Keywords

Consumer Goods Business Enterprises, Cooperation , Trust Behavior, Cooperative Behavior.

### 1. Introduction

At present, the contacts between consumer goods e-commerce enterprises are gradually close, trust and cooperation between enterprises has become increasingly important. However, in the field of commodity sales and circulation, due to the opaque information between cooperative enterprises and enterprises, resulting in the status quo of mutual distrust between e-commerce enterprises, causing great losses to both partners. A few years ago , the illegal purchasing of purchases by Prismart supermarket led to the intensification of the contradiction between retailers and suppliers; and in the near future, Jingdong defriend YTO, TTK , Bestex Best Express and other third-party courier service providers also disturbed the market order of e-commerce logistics industry to a certain extent. It can be seen that the study of consumer e-commerce enterprises trust behavior and find out the influencing factors have a far-reaching impact on reducing transaction risk, improving trust and cooperation between enterprises and promoting the long-term development of e-commerce enterprises.

### 2. Literature review

Sociologist Simmel first proposed research on trust issues among supply chain companies in the early 20th century. By the middle of the 20th century, the academic community gradually realized the importance of this issue and conducted research and exploration. Experts and scholars are hoping to find out the factors that affect inter-firm trust through various methods. By summarizing the relevant literature, Ebert found that 45% of the research data involved in inter-firm trust issues, and revealed the importance of trust mechanisms <sup>[1]</sup>.

As the research progresses, the depth and breadth involved are more comprehensive. Aulakh et al. (1996) explored the influence of factors such as relational rules and control mechanisms on inter-firm trust <sup>[2]</sup>; while Ganesan (1996) focused more on the influence of trust from the relationship between actors <sup>[3]</sup>.

In summary, at present, most of the existing results focus on significant factors such as price, delivery, quality, technical ability, and sales ability, while the emphasis on the organizational structure, corporate culture values and other hidden influence factors are not enough. This paper is mainly based on the conceptual model of trust influencing factors, starting from the hidden factors involved

in the model map, investigating the cooperative performance of relevant suppliers, sellers and third-party logistics of e-commerce companies, and finding out how these hidden factors are. Affect the trust behavior between consumer goods supply chains.

### 3. Model building

#### 3.1 Theoretical model

According to the relevant theoretical model construction, Handfield et al. (2002) constructed the theoretical framework of the influencing factors of trust behavior from the perspective of macroeconomics<sup>[4]</sup>; Liu Yongsheng (2004) studied from the micro perspective of information sharing degree<sup>[5]</sup>; however, most of the above studies started from the dominant factors. To build the model, Zhao Yanping and Li Xiuqi (2010) put forward a theoretical model based on supplier's ability, reputation, cultural differences, risk preference, etc.<sup>[6]</sup>. On the basis of summarizing the literature and field investigation, this paper classifies and summarizes the factors that enterprises consider when selecting long-term trust and cooperation supply chain members, and designs the trust behavior among consumer goods e-commerce enterprises by using the logical framework method. The theoretical framework of the influencing factors, the specific analysis is as follows see Fig. 1.

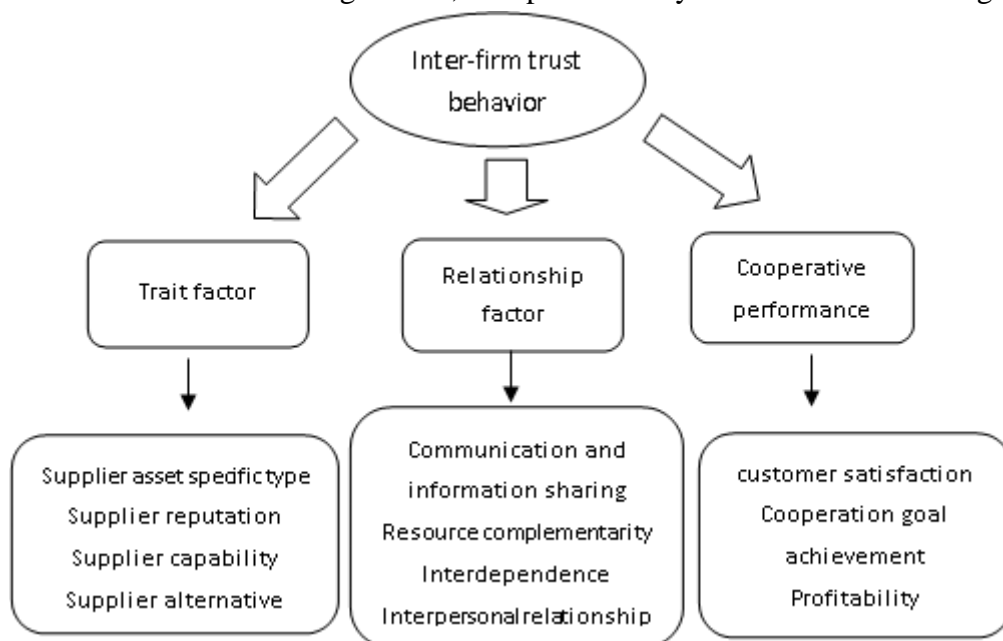


Fig. 1 The theoretical framework of the influencing factors

#### 3.2 Hypothetical interpretation

##### 3.2.1 Qualitative factors and the degree of trust between e-commerce companies

Zhang Gang, Zhang Dongfang (2008) constructed a theoretical model for the relationship between the credibility of supply chain enterprises, and believed that the higher the ability to influence the credibility of suppliers, the higher the degree of integrity and goodwill, the more trust they have. Gao<sup>[7]</sup>; Barber (1983) emphasizes the importance of ability in trust<sup>[8]</sup>; Wang Jianqun (2011) believes that the comprehensive quality and information ability of enterprises is crucial to establishing a cooperative relationship of supply chain trust, therefore, strengthen the enterprise Reputation and information sharing help to establish initial trust and deeper mutual trust<sup>[9]</sup>. Therefore, ability and reputation are the most intuitive and important evaluations of a company, and one of the most important factors for companies to choose suppliers. Based on this, this paper proposes hypothesis 1: Hypothesis 1: The better the reputation of the trusted party, the stronger the ability, and the higher the trust between the enterprises.

### 3.2.2 Relationship factors of trusted companies and the degree of trust of enterprises

Today, with the increasingly close relationship between enterprises, the academic community has conducted extensive research from the perspective of relationship. Cao Yuling and Li Suicheng (2011) based on the analysis and modeling of the communication and information sharing, interpersonal relationship and cooperation experience involved in the relationship dimension, and the relationship between it and the degree of trust <sup>[10]</sup>; Li Yongfeng (2007) It also points out that non-friendly trust, cooperation, information sharing and other methods are the most efficient and time-saving methods for promoting complex transactions <sup>[11]</sup>. Communication and information sharing are particularly important in the cooperation between people, the cooperation between enterprises and customers, and the cooperation between enterprises. Based on this, this paper proposes hypothesis 2.

Hypothesis 2: The higher the degree of confidential information sharing and the degree of dependence of the trusted party, the higher the degree of trust between enterprises.

### 3.2.3 Cooperation performance and corporate trust

The performance of cooperation and the degree of trust of enterprises are proportional to a certain extent. Li Suicheng and Yang Ting used the degree of cooperation satisfaction, cooperation achievement degree, profitability and relationship sustainability to measure cooperation performance when studying the relationship between influencing factors and cooperative performance of trust behavior among enterprises. Trust can provide a competitive advantage for companies (Jay, 1994). Similarly, from the perspective of transaction cost, the cooperative performance of transaction costs and profitability among enterprises will also affect the trust behavior of supply chain nodes (Li Lin, 2010) <sup>[12]</sup>. In addition, Johnston et al. also analyzed and studied the positive correlation between trust and cooperation performance <sup>[13]</sup>. Based on this, this paper proposes hypothesis 3.

Hypothesis 3: The higher the performance of inter-firm cooperation, the higher the degree of trust in inter-enterprise cooperation.

## 3.3 Hypothetical interpretation

### 3.3.1 independent variables

This paper focuses on the study of hidden factors. Because of the three hidden factors under the study, there are too many indicators. Therefore, through comprehensive investigation and analysis, we select two representative indicators under each factor as independent variables. . In terms of trait influencing factors, the company's reputation and ability are selected as independent variables; information sharing and duration are selected as the independent variables affecting the relationship factors and the cooperation performance between enterprises.

### 3.3.2 dependent variable

There are many aspects of the performance of trust behavior between enterprises. Here we have selected the following three problem items for analysis, see Table 1.

Table 1 trust behavior measurement items

Dependent variable	Measurement item
Trust behavior	<p>Good cooperation between the two parties when cooperating</p> <p>Cooperation can take into account the interests of the other party and the risks they may face</p> <p>When you cooperate, you can seriously complete the relevant requirements of the company.</p>

## 4. Empirical analysis

### 4.1 Reliability and validity analysis

#### 4.1.1 reliability test

This article mainly uses the Spass software to test the Cronbachs Alpha indicator to illustrate the credibility of the survey, see Table 2.

Table 2 the reliability of the scale

Scale	Dimension	Reliability	Number	Scale reliability	Number of items
Supply chain trust traits		0.959	6	0.959	6
Supply chain trust partnership	Dedicated circumstances of assets	0.851	4	0.813	15
	Information sharing	0.853	5		
	Joint action	0.872	6		
Cooperative performance		0.761	5	0.761	5

Table 3 reliability statistics

Standardized item	Cronbach's Alpha	Number of items
	0.962	180
	0.957	

From the above table, it can be concluded that the value of Cronbach's Alpha is 0.962, the value of Cronbach's Alpha based on the standardized term is 0.957, and the number of items is 180, indicating that the questionnaire used in this survey is very reliable and the data obtained in the survey. With high credibility, it is very suitable for this study.

**4.1.2 validity test**

This paper uses factor analysis to measure the structural validity of the metric. As can be seen from the table below, the factor load is greater than 0.5, so the structural validity of the supply chain trust cooperation performance scale used in this survey is very high. see Table 4.

Table 4 Supply Chain Trust Cooperation Performance Scale Various Dimensional Factor Analysis Results Table

variable	item	Factor load	Cumulative interpretable variance
Cooperative performance	Whether to complete the cooperation goal	0.677	70.809%
	Whether the cooperation is profitable	0.697	
	Satisfaction of both partners	0.680	
	Willing to maintain long-term cooperation	0.772	
	Is it possible to stably occupy the market for a long time	0.765	
	Is it possible to guarantee timely and flexible delivery of products	0.658	

**4.2 regression analysis results**

**4.2.1 trait factors and trust behavior**

The correlation between trait factors and trust behavior., see Table 5.

Table 5 Regression Analysis Table of Trust between Enterprise Capabilities and Reputation and Consumer Goods Supply Chain

Independent variable	strain	Non-normalized coefficient $\beta$	Standardization coefficient $\beta$	t value	Sig value
Corporate competence and reputation	trust	0.376	0.511	7.988	0.000
F value: 68.799		R <sup>2</sup> :0.258	adjusted R <sup>2</sup> :0.254		

From the data in Table 5, it can be concluded that the normalization coefficient value is 0.511 and the sig value is  $0.000 < 0.05$ , and the significance test is passed. Therefore, the assumption 1 is established.

#### 4.2.2 relationship factors and trust behavior

The regression analysis related to relationship factors and trust behavior., see Table 6.

Table 6 Regression Analysis Table of Relationship Influencing Factors and Trust between Consumer Goods Supply Chains

strain	Independent variable	Non-normalized coefficient $\beta$	Standardization coefficient $\beta$	T value	Sig value
trust	Information Sharing	0.692	0.625	10.850	0.000
	Duration of cooperation	0.597	0.659	13.588	0.000
F value: 108.914 $R^2$ :0.486    adjusted $R^2$ :0.482					

According to the analysis in Table 6, the normalization coefficient  $\beta=0.625$ ,  $\text{sig}=0.000 < 0.05$ , indicating that the two have significant effects; the normalization coefficient value of the cooperation duration influence is 0.659, the sig value is  $0.000 < 0.05$ , and the significance test is also passed. . Therefore, the hypothesis 2 proposed in this paper is established.

#### 4.2.3 Cooperation performance and trust behavior

The regression analysis related to cooperative performance and trust behavior, see Table 7.

Table 7 Regression Analysis Table of Cooperation Performance and Trust between Consumer Goods Supply Chains5.

Independent variable	strain	Non-normalized coefficient $\beta$	Standardization coefficient $\beta$	T value	Sig value
Cooperative performance	trust	0.376	0.511	7.988	0.000
F: 74.135 $R^2$ :0.286    adjusted $R^2$ :0.282					

According to the analysis in Table 7, the normalization coefficient  $\beta=0.51$  and the sig value is  $0.000 < 0.05$ , indicating that the cooperative performance has a significant impact on the trust behavior between the consumer goods supply chains. Hypothesis 3 is established.

## 5. Conclusion

Through modeling and empirical analysis, this paper concludes that corporate reputation, information sharing and customer satisfaction have a great impact on trust behavior. Therefore, for consumer electronics e-commerce core enterprises and supply chain member companies, it is extremely important to enhance corporate influence and enhance information sharing and interdependence with its suppliers, retailers, customers and so on. Through the research and analysis of this paper, we can draw the following inspirations:

- (1) The supplier's disagreement with the core enterprise is mainly because the supplier cannot fully trust the core enterprise's reputation and sales ability, and the information sharing and communication are not in place. Therefore, on the one hand, core enterprises must start from themselves, improve their visibility and sales ability, and at the same time pay attention to the cultivation of corporate core values and the development of corporate culture, with their own core values and sales philosophy; on the other hand, in supply In terms of chain management, core enterprises must share and communicate with suppliers, third-party vendors, third-party logistics, and customers to maximize information and trust.
- (2) The main reason for the mismatch between the supplier and the core enterprise is that the supplier does not trust each other during the cooperation with the core enterprise. First, as a core enterprise, resources should be provided to the cooperative suppliers as much as possible. Customers, increase their dependence on each other, as partners to fulfill their commitments, maximize benefits while

considering their own interests, and timely share information and customers with core enterprises, reduce substitutability, maintain and core enterprises. Cooperation time.

(3) The main problem of the core enterprise's communication and management with customers is the customer's distrust of the core enterprise goods and services, mainly manifested by high commodity prices, high logistics costs, and inadequate customer service. First of all, the core enterprises should do a good sales strategy, starting from the quality of goods, strictly managing third-party sellers, strictly prohibiting counterfeiting; secondly, speed up logistics and improve customer satisfaction; finally, improve customer service levels at different levels. In the case, try to treat customers with equal treatment.

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