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WORLD MARITIME UNIVERSITY

Shanghai, China

**RESEARCH ON BUILDING
TRUST MECHANISM OF 3PL IN CHINA**

By

SUN LI

China

A dissertation submitted to the World Maritime University in partial
fulfillment of the requirements for the award of the Degree of

MASTER OF SCIENCE

In

INTERNATIONAL TRANSPORT AND LOGISTICS

2006

DECLARATION

I certify that all the material in this dissertation that is not my own work has been identified, and that no material is included for which a degree has previously been conferred on me.

The contents of this dissertation reflect my own personal views, and are not necessarily endorsed by the University.

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ACKNOWLEDGEMENT

I am deeply indebted to my supervisor, Professor Lin Guolong, for his guidance, insight and encouragement throughout the course of my dissertation and for his careful reading of and constructive criticisms and suggestions on drafts of this dissertation.

I owe thanks to all of professors from WMU and SMU. They teach me the professional knowledge that can be conveniently used in my jobs.

I would also like to thank Professor Donner from WMU and Professor Liu Wei who will make time to assess my dissertation.

A special thanks to the all teachers of the Group of this joint program, which gives me a chance to study with my favorite classmates.

Finally, I sincerely thank my parents, my sister, and my boyfriend for their love, encouragement and financial support in my years of study.

ABSTRACT

Title of Dissertation: **Research on Building Trust Mechanism of 3PL in China**

Degree: **MSc**

Now, many small logistics companies enter into this industry so that the 3PL service market becomes disordered. These disordered operations directly lead to the trust crisis of 3PL business in China. So it begins with showing phenomena of “evaporation” about the cargo and payment of goods which were taken by some 3PL companies on the sneak.

These phenomena appear which are combined with the relationship between 3PL and their customers. The survey on the trust situation is conducted to the individual 3PL service users who mainly mean the online- shop sellers and the feedback only concern about express companies, the results of survey also reflect 3PL business trust factor affect customers make a decision to choose 3PL service providers.

So it's necessary to do some research on trust factor and build the trust mechanism for 3PL in China. According to the appearance of trust crisis, the trust mechanism should be built by 3 steps, and these 3 steps to rebuild trust mechanism only show the successful trust relationship. If the relationship building fails, the crisis will be appeared. If considering the cost factor, the level of trust will be changed with the passage of time. But during the process of establishment of trust mechanism, it has some probable problems and the author will provide some recommendations to build the trust relationship between the 3PL and logistics service users.

KEY WORDS: Trust, 3PL, Mechanism, Relationship, Service

TABLE OF CONTENTS

DECLARATION	ii
ACKNOWLEDGEMENT	iii
ABSTRACT	iv
TABLE OF CONTENTS	v
LIST OF TABLES	vii
LIST OF FIGURES	viii
LIST OF ABBREVIATIONS	ix
CHAPTER 1 INTRODUCTION	1
1.1 BACKGROUND	1
1.2 KEY CONCEPT	4
1.2.1 The concept of trust	4
1.2.2 The concept of 3PL	5
1.3 TYPES OF TRUST OF 3PL IN CHINA	7
CHAPTER 2 TRUST CRISIS ABOUT 3PL IN CHINA	11
2.1 PHENOMENA OF “EVAPORATION” TRIGGER TRUST CRISIS	11
2.2 NON-CREDIBILITY PHENOMENA AND CONSEQUENCES IN LOGISTICS INDUSTRY	14
2.2.1 High transaction costs of logistics business	15
2.2.2 High supervising costs for logistics service	16
2.2.3 Widespread phenomena of irregular operations	17
2.2.4 3PL providers can not fulfill commitments	18
CHAPTER 3 EFFECTS OF TRUST ON PERFORMANCE OF 3PL IN CHINA	19
3.1 RELATIONSHIP BETWEEN 3PL AND LOGISTICS SERVICE USERS	19
3.1.1 Relationship between 3PL and company users	20
3.1.2 Relationship between 3PL and individual users	23
3.1.3 Benefits of building good relationships	25
3.2 A SURVEY ON USAGE OF 3PL SERVICE	25
3.2.1 Relationship between trust value and times of usage	26
3.2.2 Market share of express companies	28
3.2.3 Relationship between usage time and trust value	29
3.2.4 Corresponding proportion of different usage time	30
3.2.5 Relationship between usage time and quantities of express companies	31
3.2.6 Conclusions of the survey	32
3.3 EFFECTS OF TRUST ON PERFORMANCE OF 3PL IN CHINA	34

CHAPTER 4 STEPS TO BUILD TRUST MECHANISM OF 3PL	39
4.1 THE STEP OF COMING INTO BEING TRUST	40
4.1.1 Building up good reputation	40
4.1.2 Building the fair return on investment	40
4.1.3 Building common solutions to conflicts	41
4.2 THE STEP OF STRENGTHENING TRUST	41
4.2.1 Building the trust relationship between individuals and organizations	41
4.2.2 Building the open information exchange mechanism with partners	42
4.2.3 Inspiring 3PL and logistics service users with mutual study	43
4.3 THE STEP OF MAINTAINING TRUST	44
4.4 THE MODEL OF BUILDING TRUST MECHANISM OF 3PL	44
CHAPTER 5 SUGGESTIONS TO TRUST MECHANISM BUILDING	50
5.1 PROBABLE PROBLEMS	50
5.2 SUGGESTIONS TO BUILD TRUST MECHANISM	51
5.2.1 Keeping abreast of customer collaboration experience and background	51
5.2.2 Timely communication and consultation	52
5.2.3 Establishing credibility mechanisms	52
5.2.4 Establishing the learning mechanism	53
5.2.5 Establishing reasonable industry regulation	54
CHAPTER 6 SUMMARY AND CONCLUSIONS	56
REFERENCES	59
APPENDIX	63

LIST OF TABLES

TABLE 1.1 THE PERCENTAGE OF 3PL SERVICE TYPES	3
TABLE 2.1 THE PERCENTAGE OF LOGISTICS COSTS ACCOUNTING FOR THE SALES	17

LIST OF FIGURES

FIGURE 1.1 STAGES OF TRUST DEVELOPMENT	8
FIGURE 3.1 THE PERCENTAGE OF OUTSOURCING LOGISTICS SERVICE BY COMPANY USERS	21
FIGURE 3.2 RELATIONSHIP BETWEEN TRUST VALUE AND TIMES OF USAGE OF 3PL COMPANIES	28
FIGURE 3.3 MARKET SHARE OF 3PL COMPANIES (EXPRESS COMPANIES)	29
FIGURE 3.4 RELATIONSHIP BETWEEN USAGE TIME AND TRUST VALUE	30
FIGURE 3.5 CORRESPONDING PROPORTION OF DIFFERENT USAGE TIME	31
FIGURE 3.6 RELATIONSHIPS BETWEEN USAGE TIME AND QUANTITIES OF EXPRESS COMPANIES	32
FIGURE 4.1 STEPS TO BUILD TRUST MECHANISM	45
FIGURE 4.2 RELATIONSHIPS BETWEEN LEVEL OF TRUST AND TIME	46
FIGURE 4.3 RELATIONSHIPS BETWEEN COST AND LEVEL OF TRUST	48

LIST OF ABBREVIATIONS

3PL	Third Party Logistics
CBT	Calculus-based Trust
KBT	Knowledge-based Trust
IBT	Identification-based Trust

CHAPTER 1

INTRODUCTION

1.1 BACKGROUND

China has experienced huge growth over the last few years as a result of on-going liberalization of the market and acceptance into the global economy. The logistics industry has been one of the main beneficiaries of this change. Today, the growth of the Chinese logistics market is closely related to the growth of the Chinese economy which has maintained economic growth rate at 7%-8% over recent years. It could be said that logistics has become a new industry of great vitality, and has caused high attention from various aspects of society including government, manufacturers, wholesalers, logistics service providers, educational organizations, and research institutes.

Currently, 90% of the top 500 enterprises of the world have invested in China. These foreign funded enterprises, along with sino-foreign joint ventures, have the greatest need for logistics services. Domestic enterprises also are developing greater need for logistics services. With the development of high technology, e-commerce, and supply chain management, the production, sales, and operating methods of Chinese enterprises are experiencing profound change. Many

corporations have started to integrate their supply chains and adopt Just In Time operations. With B2B and B2C becoming gradually more popular, logistics outsourcing is expanding further (Distribution Business Management Association, 2004, p. 32).

Because many companies need more logistics service, some of them are considering that outsourcing their products to the professional logistics service providers. It brings more chances for 3PL companies.

3PL as one important segment of the modern logistics is expected to become the engine of the industry growth. The concept of Third Party Logistics (3PL) was first mentioned in 1988 in a Customer Service Survey Report conducted by the U.S. Council of Logistics Management (CLM). It refers to the business model under which the logistics operations of a company are handled by a specialized logistics company, not the company itself or its customers- the two parties directly involved in the fundamental business transaction. A 3PL provider usually offers a series of service along the supply chain of its customers. It is characterized by specialization, customization, and strong IT support.

Conducted from February to March 2005, the 2005 China Logistics User Survey drew responses from 438 industry professionals. 56% of respondents are currently using a third-party logistics provider (3PL), much less than other continents such as North America 79% or Western Europe 76%, and only 20% of respondents consider 3PL as a “Solution Provider”: 3PL in China need to be more professional and differentiate from transporter and warehouse operators. According to the survey, the top three services currently outsourced to 3PL in China are transportation (over 30%), warehousing (15%) and custom clearance (12%).(Table 1.1)

Table 1.1 The percentage of 3PL service types

Service Types Percentage	Transportation	Warehousing	Customer Clearance
Outsourcing	9.17%	8.73%	5.45%

The survey also uncovers the main criteria when selecting a 3PL provider in China. As expected, price is ranked as the top criterion followed by local market experience, services range and good reputation of the vendor. Over 20% of supply chain and logistics managers surveyed cited service level and cost effectiveness as the main areas where they think a 3PL provider can improve in China. Cost effectiveness (19%) and management capabilities (15%) were also cited by subjects (China Supply Chain Council, 2005).

Just like what the survey said, besides price, the service and reputation are also the criteria for selecting a 3PL provider. When customers use the 3PL service, they will compare the different service levels and reputation of every logistics service provider. Among of many factors, trust is a key factor to affect the judgment by customers, because trust factor can be regarded as the bridge of establishment of relationship between 3PLs and the other 2 parties. Trust can exist in the relationship between 3PL and customers. If customers can trust 3PL, they will build a long term cooperation relationship with 3PL. But if the 3PL is not worthy being trusted by customers, customers will break up the relationship with 3PL, then 3PL will lose these customers.

But more and more customers complain the 3PL companies of China because those service providers lack trust. Currently, in China, there exists the trust crisis in the 3PL business. The author will introduce trust crisis of 3PL and try to analyze this phenomenon and finally provide the reasonable suggestions to this trust crisis.

1.2 KEY CONCEPT

1.2.1 The concept of trust

Trust is very important for the relationship among us. It's both emotional and logical act. Emotionally, it is where you expose your vulnerabilities to people, but believing they will not take advantage of your openness. Logically, it is where you have assessed the probabilities of gain and loss, calculating expected utility based on hard performance data, and concluded that the person in question will behave in a predictable manner. In practice, trust is a bit of both (World Wide Web).

Many scholars describe it from some aspects. For example:

A. Baier said "Trust ... is letting other persons (natural or artificial, such as firms, nations, etc.) take care of something the trustor cares about, where such 'caring for' involves some exercise of discretionary powers" (A. Baier, 1986, pp. 234, 235,240).

F. Fukuyama described it as "Trust is the expectation that arises within a community of regular, honest, and cooperative behavior, based on commonly shared norms, on the part of other members of that community" (F. Fukuyama, 1995, p. 26).

M. Sako said that “Trust is a state of mind; an expectation held by one trading partner about another, that the other behaves or responds in a predictable and mutually expected manner”(M. Sako, 1992, p. 32).

L.G. Zucker thoughts about from Sociology field and said that “From a sociological perspective, trust is defined as a set of expectations shared by all those involved in an exchange” (Zucker, L. G., 1986, p. 54).

From the definitions above, the definition of trust at least includes 2 points which one is a state of mind and the other one is the mutual relationship. So the definition used in this dissertation can be simply concluded that “trust is an expectation of one party, and it exists in the relationship between one party and the other party, which is based on commonly shared values”.

1.2.2 The concept of 3PL

A Third-Party Logistics provider is a performance or distribution centre that is capable of supporting all of the following functions: receiving, shipping, storage, inventory control, customer service, order tracking and returned merchandise. The term Third-Party Logistics is about the procurement of a bundle of services in long term relationships, characterized by mutual trust and sharing of risks and rewards (Andersson, 1997, No. 34).

There are different definitions of the term.

Lieb, et al defines Third-party logistics as: The use of external companies to perform

logistics functions which have traditionally been performed within the organization. The functions performed by the Third-party logistics firm can encompass the entire logistics process or selected activities within that process (Lieb, 1993, pp. 35-44).

Laarhoven and Sharman define 3PL as follows: “Third-party logistics are activities carried out by a logistics service provider on behalf of a shipper and consisting of at least management and execution of transportation and warehousing. In addition, other activities can be included, for example, inventory management, information related activities, such as tracking and tracing, value added activities, secondary assembly and installation of products, or even supply chain management”(Laarhoven van P.; Sharman, G.,1994, pp. 106-115).

Virum (1993) uses the following definition: “3PL are the services offered by a middleman in the logistics channel that has specialized in providing, by contract, for a given time period, all or a considerable number of the logistics activities for other firms.” (Virum, 1993)

However, according to Virum said that the definition of Third-Party Logistics is not complete without the following information: “Consists of a long term relationship between two parties which regard each other as partners. The logistics solution is worked out in cooperation specifically for each shipper. The goal for the relationship should be to develop into strategic alliances with win-win for both parties” (Virum, 1993). This leads to both 3PLs and logistics service users have the chance to come into being a long-term partnership.

This last amendment of definition shows that it is a strategic decision to outsource the logistical activities in a company. This is in line with current trends on the

market today as well with our point of view in this study. This amendment clearly states that partnership is a central issue in Third Party Logistics.

Based on the above definitions, the definition of 3PL in this dissertation can be concluded as:

Third-party logistics (3PL) are activities carried out by an external company on behalf of a shipper and consisting of at least the provision of management of multiple logistics services, mainly concerned about the traditional logistics service, such as transport and warehousing and other value-added logistics service. The co-operation between the shipper and the external company is an intended continuous relationship.

In this definition, “the shipper” refers to the party that sends the goods to their customers by external logistics service provider companies. The shipper includes company logistics service users and individual logistics service users. “External” implies that the company is not being a subsidiary company in an exclusive unilateral relationship with the shipper (Mother Company).

1.3 TYPES OF TRUST OF 3PL IN CHINA

Lewicki and Bunker proposed three qualitatively different types of trust. The three proposed levels are “calculus-based trust” (CBT), “knowledge-based” (KBT) and “identification-based trust” (IBT) (Lewicki and Bunker, 1996, pp. 114-139). The authors suggest that customers may move from calculus-based to knowledge-based and identification-based trust, but customers may also remain at the same stage

throughout a relationship

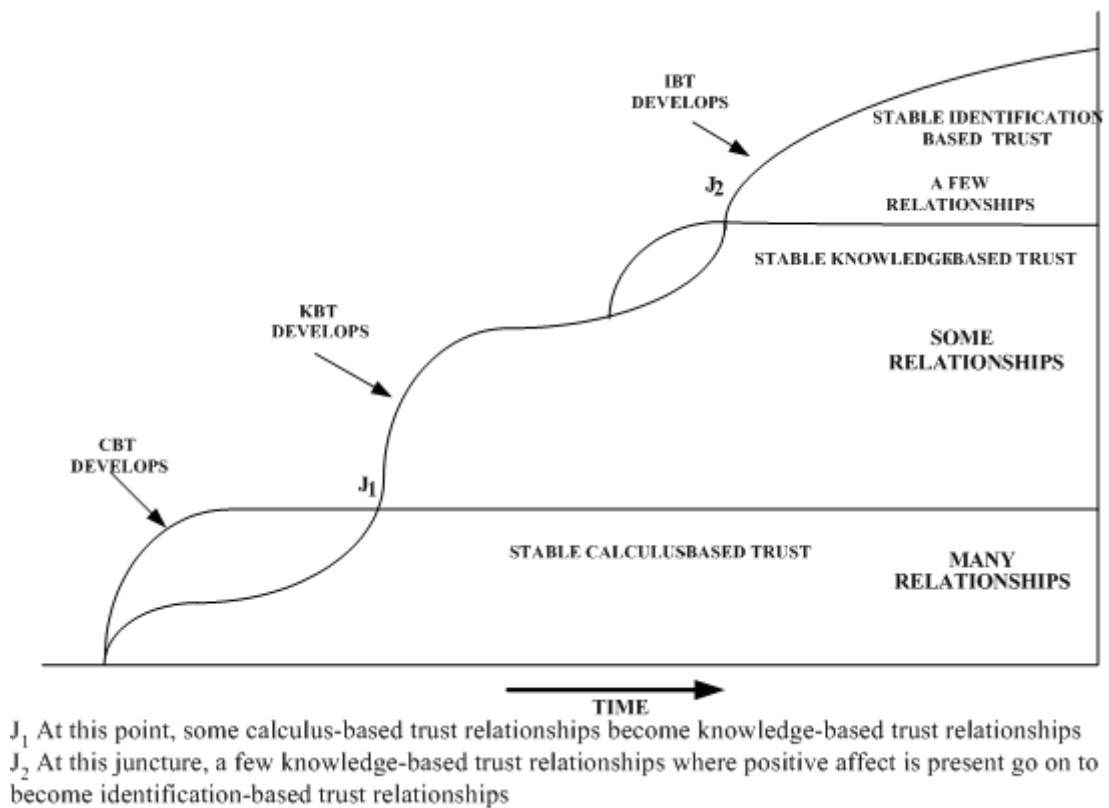


Figure 1.1 Stages of Trust Development

Source: Lewicki, R.J., & Stevenson, M.A. (1997). Trust development in negotiations: Proposed actions and a research agenda. *Business & Professional Ethics Journal*, 16, 115.

Trust evolves over time. A relationship that develops and matures moves from calculus based trust to one based on knowledge and, finally, on identification. It may also, as in the case of many business and legal relationships, end with the first stage of calculus based trust. This evolution of trust development can be showed by the Figure 1.1.

The first level is calculus-based trust which relationship building begins with the development of its activities. If one party is consistent and does not oblige the other to use punishment, trust is validated. The parties can then begin to acquire the knowledge base about each other's needs, preferences, and priorities. Customers with calculus-based trust have trust in the 3PL service provider because they believe it to be in the 3PL service provider's best interest not to suffer the loss of reputation and profits that a violation of trust would lead to. They believe in the benevolence of the 3PL service provider, but the belief is based on the cost of deterrence. Even small inconsistencies in performance could have a large detrimental effect on trust perceptions. Calculus-based trust may not be combined with high affective commitment.

The second level is knowledge based trust which is grounded substantially in the predictability of the other party — getting to know them well enough to be able to anticipate behavior and avoid surprises. Effective two-way communication is important for knowledge-based trust to develop because it ensures that 3PL and their customers exchange information about their preferences and approaches to solve problems. The relationship will be nurtured in the knowledge that if it is neglected, it will lose its strength and fade away. Customers have to be willing to share information with the 3PL companies, and 3PL companies have to be willing to learn about customers' needs and problems and to develop their services accordingly. The effect of a violation of trust depends on the extent to which the events were under the company's control. Temporary events may be ignored and trust will eventually be restored. If two parties do not move beyond the CBT stage, there are some possible explanations. Perhaps the relationship does not require more than business or arms-length transactions. Violations of trust may also make two parties wary of continuing their relationship.

The third level is “identification based trust”, where the parties come to understand, appreciate, and even share each other's wants and needs. If relationships advance to the KBT stage, there is an overlap in the developmental stage of trust. Customers with identification-based trust have full confidence in the 3PL companies and believe that they will act in their best interests. The logistics service providers have in-depth knowledge of customers’ needs and desires, and customers perceive that their desires are fulfilled. Shared values (Berry, 1995, pp. 236-245; Morgan and Hunt, 1994, pp. 20-38) characterize this type of trust, and customers tend to defend the companies against criticism from outsiders. Identification-based trust may also be linked to identification benefits (Hennig-Thorau et al., 2000, pp. 369-391) and to cultural and ideological bonds (Liljander and Strandvik, 1995, pp. 141-167). A violation of trust needs to be of great magnitude to dissolve the relationship.

The first or second level of trust may be sufficient for many transactions of 3PL in China. The identification based trust usually will evolve and grow out of the earlier stages, and only a few relationships move to this stage of trust grounded in mutual identification, which occurs when 3PL companies and logistics service users come to internalize or closely identify with each other's interests. While this advanced stage of trust thrives in the soil of knowledge-based trust, it is enhanced through affirming similar motives, interests, needs, goals, and similar reactions to common situations; and sharing some relevant values and principles. Factors that may prevent this progression include lack of time, energy or desire to make a deeper commitment to the relationship and trust which the important factor we analyze in this dissertation.

CHAPTER 2

TRUST CRISIS ABOUT 3PL IN CHINA

2.1 PHENOMENA OF “EVAPORATION” TRIGGER TRUST CRISIS

On 6th, June in 2005, when customers from building materials market of Zhengzhou City went to the Lan Tian Logistics company and prepared to get their payment for goods, they found all of employees of this company had disappeared and the door of the company was closed. At this time, many other customers of this company in other markets also found the same situation. On that afternoon, the policemen came to inquiry about this case, and one of customers who suffered from loss told policemen that she called to the company last week, but the staff let her took cargo and payment of cargo this afternoon. She never thought of this result, and she lost over RMB 5,000 Yuan. According to the policemen' findings, about 100 customers lost RMB 1000,000 Yuan. (JC Trans, June 7, 2005)

On 8th, May in 2004, Ji Tong Freight Company of Technology Market of Zhengzhou City disappeared after they gained RMB 3000,000 Yuan of over 200 customers. Those cash was all from the payment for cargo. In this case, the most loss was RMB 210,000 Yuan, and the least loss was thousands of Yuan. When the reporter interviewed policemen, the policemen said from last August to today, it had taken place 8 cases about the sudden disappearance of freight companies in this market, which brought tremendous loss to customers, especially some individual business

persons. (JC Trans, May 10, 2004)

More seriously, one who was called as “the king of carriers of Sichuan Province (in China)” disappeared on 20th, August in 2005, and on the same day, all of 57 retail stores of this company were closed. When customers found their payment of cargo had been taken by the boss of this company, some of them even rushed into retail stores of this company to grab cargo. The situation was much jumbled until the policemen came to control. It was said the most loss was 60,000 Yuan and the total loss was evaluated over 30,000,000 Yuan RMB.

But how could this company get so much money over one night? One of Commerce and Industry Bureau of Chengdu City in Sichuan Province said, because many business people didn't compliance with the standards, they usually wanted to save trouble by making freight companies help them charge fees from consignees when the 3PL companies have sent cargo to consignees. And this case was not simple. Two weeks later, almost 100 business people still waited for the investigation results near the Chengdu Railway Station. At the same time, all about logistics business dropped a lot. Few people were willing to ship their cargo by small 3PL companies. And some people even called this as “A Panic”. And this panic also extended to other provinces and affected more and more logistics business. (Yang Dong, August 20, 2005)

Just because this industry only needs low threshold, many business people establish 3PL companies easily. And some so-called 3PL companies are made of one desk and one mobile phone.

These cases above are not occasional. Just in Chengdu City, there often occurs like

these cases many times. Now, more and more shippers are afraid of their cargo are missing or damaged by carriers. But how cargo can be delivered to other people? So persons still have to let 3PL companies transport their cargo. And when the cargoes are in transit, shippers are usually very worried. It's very seriously if the trust between shippers and logistics companies has been broken out.

According to the phenomena of what I mentioned above, some people called it as "Evaporation of Logistics" which means that 3PL companies intentionally missed after they get customers' cargo or payment of cargo and bring so much loss to the shippers. Several years ago, these phenomena used to be in the logistics transport between two cities. But recently, these phenomena frequently take place in the same city.

Besides these serious phenomena, many other comparatively small cases are also concerned by shippers or consignees.

For example, Mrs. Yu complained to Commerce and Industry Bureau of Hangzhou City that she posted 2 printers by Shanghai Yuan Tong Express Company (Hangzhou Branch), but her cargo missed on the way. Mrs. Yu thought that the logistics company is in duty bound to safely transport cargo to the destination, and if cargo were damaged or missed on the way, the logistics company should be responsible for the loss. However, Mr. Zhao who was responsible for handling with this case said that if Mrs. Yu didn't pay for the "insurance premium" of shipment, then they can only pay her twice the cost of mailing. Immediately, he added, any logistics company may miss cargo, and the total express industry is not of high quality in China. (Feng Yongming, May 24, 2005)

With the increase of similar cases, more and more customers find that third party logistics business in China lack logistics industry norms. Usually, those small companies only depend on one truck and one telephone. When they are gone, customers no longer find them again. Compared with the developed countries, the logistics business in China is still at the transitional phase from traditional operations to modern logistics. There are much difference in the operational background, business size and service quality of all kinds of logistics companies. Obviously, there are many outstanding problems such as weakness and small size and so on.

Trust is the fulfillment of commitments. Now, commitments to the quality of logistics services have become the credit logo of international logistics benchmarking enterprises. In the website, P.G.L Group Co, Ltd. of Guangdong Province work out the commitment that: “In warehousing operations, the rate of damage and shortness is 0, and the accuracy rate of document is 100%; in the railway transportation, on-time-delivery rate is 95%, and damage rate is 1%; in the road transportation, on-time-delivery rate is 98%, damage rate is 0, and the accuracy rate of documents is 100%”. (<http://www.pgl-world.cn/pgl.html>) These are commitments from a famous 3PL company of China. This company writes commitments in their websites because they want to make customers see it and trust them, then choose them as logistics service user. It shows that logistics service provider has realized the importance of trust to the 3PL business.

2.2 NON-CREDIBILITY PHENOMENA AND CONSEQUENCES IN LOGISTICS INDUSTRY

Just like many cases what are showed above, with the rapid development of China's logistics industry, the conflicts between low market credibility and modern logistics gradually exposed, which has become the fetters of restricting the development of modern logistics industry. The current existing non-credibility phenomena and their consequences in China's logistics industry are as followings.

2.2.1 High transaction costs of logistics business

A part of logistics transaction costs refer to searching the information such as service quality, performance records and credit information about the logistics enterprises. It is not difficult to find third-party logistics service providers and their products through the Internet, telephone directory, paper media or intermediary companies etc, but for the reason that our country has not established a perfect credit service system, an enterprise can not know the overall credit situations of other enterprises without transaction experience with them. So if an enterprise of shipper wants to deal with an unfamiliar logistics enterprise, he should have to prepare for paying the initial costs.

Another important component of transaction costs is the cost of signing the contract and seeking legal relief costs after the opposing party breach the contract. Logistics is a contract-intensive industry, but most of logistics companies just entered the enterprise market, and they do not have a good business practice, and the contract is often short of detailed information in strict accordance with rights and obligations. Even some business contracts signed, in current credit deficiencies environment, the contract performance still makes two parties feel anxious. When China's consignors receive logistics services, they are often subjected to the troubles such as

time delay and damage of goods. When the breach of contract happened, because of the uncertain factors of judicial decisions and the difficulty in enforcement, many of the violations have not been punished accordingly, which, in a way, encourages the activities of breach of contract. In addition, local governments are also worried about that the over severe punishment for breach will lead to bankruptcy of enterprises and then increase social burden. Therefore, the existing institutional arrangement for the protection of the victim is very disappointed to logistics service users, which gives loose to some 3PL companies and triggers what those cases show above.

2.2.2 High supervising costs for logistics service

Both parties in transactions do not hope to go to court, and the best way to reduce the breach is supervising and urging the opposing party to keep the contract. While the demand side recognizes that the logistics service is important to its development of customer relationships, however, the logistics service quality is intangible. When the customers consign their goods to the third party logistics providers, the 3PL companies have the rights to decide the whole logistics process. The extent of their performance can not be verified through visual or physical method. Consignors are lack of effective supervision and restraining mechanism for the third-party logistics services, and they can not directly and timely control the logistics quality of services, unless consignors' enterprises supervise the full process by using electronic tracking system. If they do, it will cost consignors too high, and the enthusiasm to outsourcing logistics will be weakened. Therefore, the performance largely depends on the self-regulation of logistics services, but the current self-regulation levels still can not satisfy the requirements of public people to trust.

2.2.3 Widespread phenomena of irregular operations

The logistics expenses of United States, European Union, Japan and other developed countries are generally low, for example, the U.S. logistics costs accounted for 9.17% of sales of the manufacturing, the average level of EU countries are 8.73%, Japan's logistics costs only 5.45%. In some developing countries, such as South Korea, the 2001 survey revealed that the logistics cost accounted for 11.1% of sales. According to the survey to foreign enterprises in China, the Chinese manufacturing enterprises logistics cost is approximately 25% to 30% of sales. (DAI Yong, March, 2002, pp.23-25)

Table 2.1 The percentage of logistics costs accounting for the sales

Country Percentage	US	EU	Japan	South Korea	China
Logistics costs' share	9.17%	8.73%	5.45%	11.1%	25%-30%

According to the above analysis, some foreign logistics advisory experts and scholars draw the conclusion that China has prodigious potential market in logistics business. Many logistics companies have emerged throughout the country. Many logistics parks and logistics centers have been built. The various transport companies also change to logistics companies. But the problems have been exposed, for example, logistics operation is no uniform national or regional standards and tax evasion and tax avoidance are very popular, which greatly undermined the credits of the logistics

industry.

2.2.4 3PL providers can not fulfill commitments

When both parties negotiate about their contract, in order to obtain the business, the logistics service providers often exaggerate their own logistics capabilities, which lead to the commitment can not be fulfilled. Excessive commitment is unable to perform, which will produce a serious negative impacts. First, the two parties can not establish and maintain trust mechanism, thereby endangering their strategic alliance and supply chain. Secondly, the interests of both parties are damaged. Due to the logistics service providers can not fulfill their commitment, their market share will soon be damaged, and the logistics demand party will become the direct victims.

CHAPTER 3

EFFECTS OF TRUST ON PERFORMANCE OF 3PL IN CHINA

3.1 RELATIONSHIP BETWEEN 3PL AND LOGISTICS SERVICE USERS

The relationship between a 3PL and its customers is a symbiotic relationship. The 3PLs can not leave away their customers which include cargo providers and cargo receivers, otherwise it will become insignificant.

The reasonable relationship between 3PLs and their customers can be described as a famous Chinese saying, which says two locusts are tied in one rope. These locusts can not leave separately. If they jump into the opposite direction, they will have to compete with each other. The result will be that both of them can not run out easily. But if they have the same idea and jump into the same way, they can come into being good partner relationship and the result is that they can run out more easily.

The same to the two locusts bond into one rope, the relationship between 3PL and their customers is just like these two locusts. When the 3PLs and their customers can't make great efforts in the same direction, they will meet more resistance. But if they make concerted effort, the composite force from them will overcome resistance and, finally, bring them to the success.

3.1.1 Relationship between 3PL and company users

In fact, some large 3PL companies have built the solid relationship with the customers. And scholars call this combination as the logistics alliance.

Now, no logistics company in China has exceeded 2% of market share (WANG Pengji & CHEN Liuqin, 2003, pp. 379-383). China has entered into WTO, and globalization of economy is impelling Chinese logistics industries to the international competition system. It quietly needs large and systematic logistics companies. Undoubtedly, it gives many logistics companies more chances. In order to adapt to the new economic environment, some 3PL companies begin to think about the new way to integrate the relationship between their own companies and their customers to achieve the win-win result.

Company users often have large scale of logistics requirements. Now, in China, they have more requirements in the traditional logistics service, especially in the warehousing and transport service. They are different from individual logistics service users, because they produce products or do business in the trading which makes them need more frequent logistics service.

As what is said in the Fifth Logistics Market Interview Report by Chinese Logistics Association, in the investigation, manufacturers outsource 19% of logistics operations to the 3PL for their raw materials, and totally outsource 18% of logistics operations to the 3PL for their finished products. Compared to the manufacturers, trading companies outsource 27% of logistics operations to the 3PL. 3PL still holds

small market share for those company users and many of them only provide traditional logistics operations. But the investigation suggests that about 67% of manufactures hope that 3PL can provide other kinds of logistics operations. This situation can be indicated by the Figure 3.1.

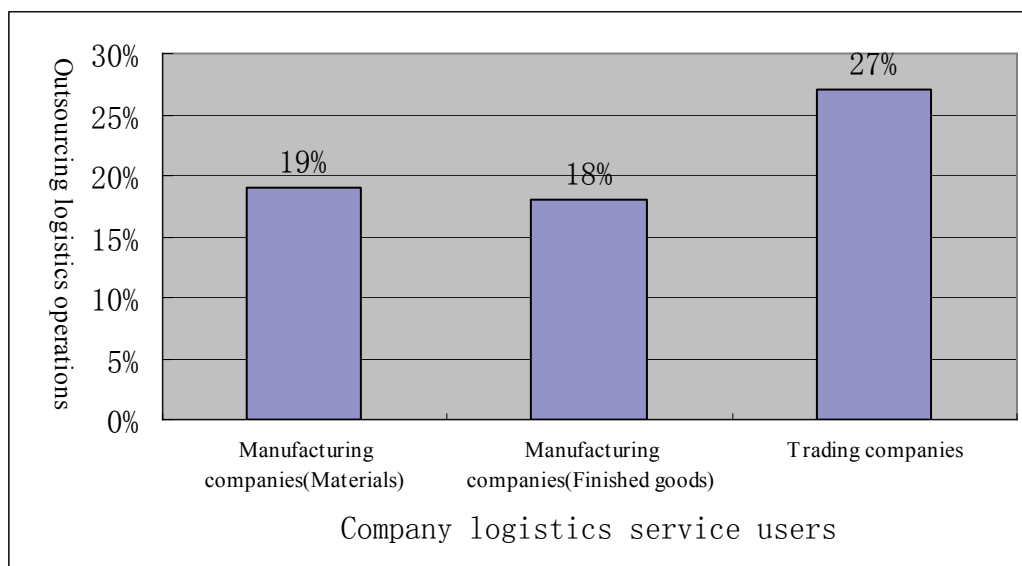


Figure 3.1 The percentage of outsourcing logistics service by company users

Just like the Figure 3.1 shows, only some logistics service outsource by company users to the 3PLs. So it's the huge chance for 3PL companies. But it's also the huge challenge for 3PL companies because the investigation data shows that the satisfaction level is so low. More than 50% of manufacturing companies and more than 70% of trading companies are not satisfied with performance of 3PL companies. Major reasons for their dissatisfaction are higher cost, lack of instant and exact information. This parlance indicates that most of logistics service users often complain the higher cost by using 3PL. On the one hand, it shows that customers always think about the cost from the logistics aspects, but never analyze the impacts on the total cost of companies by using outsourcing logistics service from systematic

aspect. On the other hand, 3PL companies haven't standard service level to decrease service cost. Just because both 3PL companies and manufacturing/trading companies can not harmoniously cooperate with each other, about 60% of manufacturing companies and trading companies are looking for new 3PL companies. It displays that the supply and demand of logistics service are very instable. The outsourcing logistics services have many chances but they are variable very much. (Warehousing Association of China, 2004, September, pp. 37-45)

The investigation what we said above has potentially revealed that the relationship between company users and 3PL are still separated. So some 3PL companies try to build close relationship with manufacturing companies and trading companies. Logistics alliance is the outcome of this idea. It means that 3PL and manufacturing companies form relatively long-term relationship crossing companies. In the alliance, companies trust each other, and take on risks together. Certainly, they share mutually cooperative benefits. The alliance is beneficial to save transaction costs between company users and 3PL, and strengthens logistics management and logistics technical power. It will make the company users fix attention on their productions or trading. Similarly, 3PL can pay more attention to provide more professional logistics service, not constantly look for cargo owners. Apparently, the alliance relationship brings win-win partnership.

For example, when P&G Company entered into Chinese market, they looked for Cargo Transfer Station with good reputation in 1994. At the beginning, P&G Company found two state-owned large storage and transport companies, consign them to transport P&G products to major distribution centers. But only after two months, P&G stopped this cooperative relationship because bad service and disordered management of these two companies can not meet the demands of P&G

Company. Afterwards, P&G Company found Liu Wu who later became the president of P.G.L Group Co, Ltd. For the P.G.L. Company, this is the good opportunity for cooperating with world-class company. Because P&G is always strict in the quality of logistics service, every logistics service provider should comply with GMP and SOP standards. As the fresh 3PL company, P.G.L. Company took care of every product for P&G in order to achieve better service. In the sequel, P&G became the main customer of P.G.L. Company, and it gave most of railway freight operations to the P.G.L. Company. At the same time, P&G continually brought forward new requirements to the P.G.L. Company and help this fresh logistics company enhance operation and management level. Certainly, P.G.L Company cherished this chance and tried to improve their quality of practice. These two companies had come into being good partnership through cooperation of several years. (Guo Zhen and Xu Kun, 2004)

3.1.2 Relationship between 3PL and individual users

3PL business concerns many logistics service fields. So many express companies can be regarded as 3PL companies because they provide logistics service for two parties---shippers and consignees which are same to the company users.

With the development of e-business, many people set up their on-line shops in the Ebay platform (www.ebay.com.cn) or Tao Bao platform (www.taobao.com). But many individual on-line shop sellers can't support large 3PL companies or EMS which is owned by China Post because these companies are expensive for the small individual logistics service users, so they have to find small 3PL companies.

In the BBS of TAO BAO Platform, many individual sellers complained the Express companies. For example, one seller consigns 3 mobile phones to Yuan Tong Express Company of Shenzhen Branch on 10th, Dec in 2005. But after 3 days, when the seller called this express company, they told the seller that they couldn't find the bill number of 3 mobile phones in the computer system. They said they would check the computer system again. But on 18th, Dec, they informed this seller that they couldn't find his cargo, so they were willing to pay for 3 times of express fee which was 50 Yuan at most. This seller was very angry, but he was very confused what he could do to solve this problem. (ZJ568, January 13, 2006)

Sellers complained some express companies in the BBS of on-line trading platform. One complaint may make other sellers look out this express company.

So when these individual logistics service users complain some 3PL company, they often give up this express company and choose the new one. The relationship between 3PL business and individual users are very instable. Once the individual sellers meet bad performance of 3PL companies, they will no longer use this service provided by this company. At least it shows that the occasional accidents will break out their relationships.

They are not like the company users which can form the stable partnership with the 3PL business. 3PL companies often consider that these small sellers only provide small quantity of cargo. So it's very hard to build solid cooperation relationship between them.

3.1.3 Benefits of building good relationships

If the 3PL and their customers come into being good relationship and corporate well, it will bring every party of logistics business more benefits.

The first benefit is saving cost. If these shippers and 3PL companies form good relationship, it is helpful to decrease transaction fees. Due to good partnership, it will make two parties save trouble to find new customers or new service providers. And because two parties have cooperated with each other for a long time, it can lower risks of fulfilling contracts and avoid conflicts.

The other important benefit is improving efficiency of logistics operations. With the development of information technology, especially web technology is widely used, two parties can contact with each other very smoothly, not only depend on telephones like before. If one party doesn't use the new technology, the other party will have no idea about cooperation. But two parties who have formed good partnership will not be afraid of this situation. The smooth information flows will speed up operations to save time and to save communication cost. It gives two parties the win-win outcomes.

3.2 A SURVEY ON USAGE OF 3PL SERVICE

Usually, the company users are often interviewed by professional research institutes. But the individual users are ignored by researchers. Just like what the analysis on the relationship between individual users and 3PL above, we have found that on-line

shop sellers are the main force of consuming 3PL service. But the express companies which are one kind of 3PL companies that provide the service to individual services users haven't formed stable relationship. Why the relationship is so variable? Considered trust factor, the survey on the individual logistics service users is conducted in order to disclose the influence of trust factor by detailed data.

This survey is conducted on the BBS of TAOBAO Platform with random. According to the feedback, 193 online shop sellers attend this survey and they totally use 41 3PL companies. The detailed data are showed in the APPENDIX. And analysis below will based on those data.

3.2.1 Relationship between trust value and times of usage

Set the 5 major key performance parameters for evaluating trust which includes “losing cargo”, “compensation”, “the speed of taking cargo”, “service attitudes” and “other explanation”. These 5 parameters can be set up as P_{i1} , P_{i2} , P_{i3} , P_{i4} and P_{i5} . According to the investigation data, each of the parameters can be gained the value between 0 and 1. Because the parameters are not of the same importance, we can use the different Weight to distinguish them which can be set W_1 , W_2 , W_3 , W_4 and W_5 . And we regulate $W_1+W_2+W_3+W_4+W_5=1$.

Then, the trust can be calculated about the 3PL companies used by every subject, which can be showed by the formulation as following:

$$T_i = W_1 * P_{i1} + W_2 * P_{i2} + W_3 * P_{i3} + W_4 * P_{i4} + W_5 * P_{i5}$$

Because the service attitudes directly reflect the relationship between 3PL and their customers,

this parameter is certain of the highest weight. We can set the Weight of 5 parameters according to the different importance of 5 parameters as followings: $W1=0.2$, $W2=0.2$, $W3=0.2$, $W4=0.3$, $W5=0.1$

First, we can analyze the relationship between trust factor and the frequencies of 3PL companies used by the interviewed subjects.

Average trust of 3PL companies can be displayed by the formulation as follows:

$$TV_i = \frac{1}{n} \sum_{k=1}^n P_{ik} * W_{ik}$$

In the formulation above, “n” presents the interviewed objects of using this 3PL company, “ P_{ik} ” presents Trust Value of the i -th subject.

According to this hypothesis, we can find the relationship between Trust Value and times of usage of 3PL companies by interviewed objects as the Figure 3.2 below.

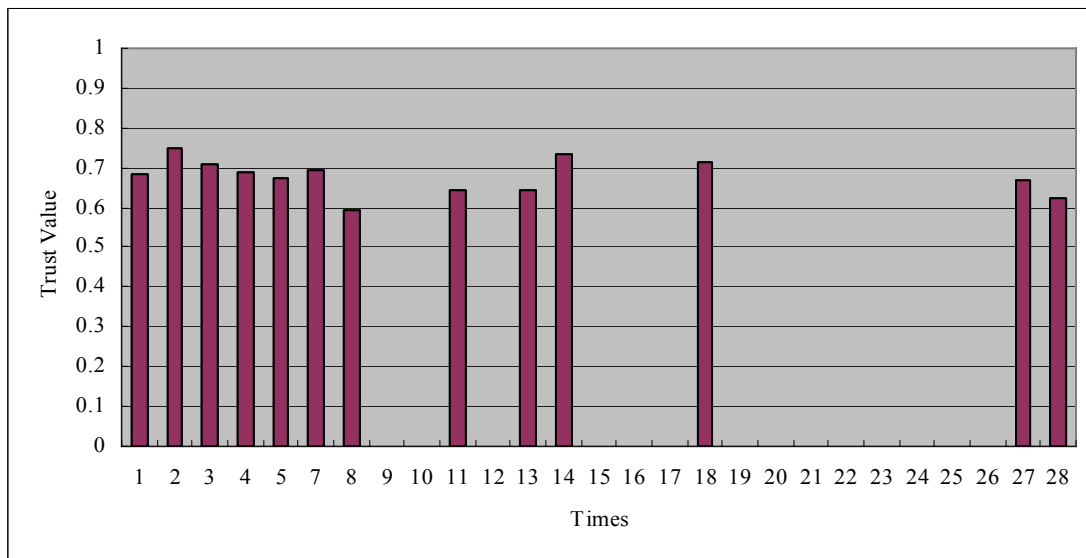


Figure 3.2 Relationship between trust value and times of usage of 3PL companies

From the Figure 3.2, it can be found that an interesting phenomenon. Statistics shows that using small number of times of logistics companies are giving customers the confidence is not lower than the widespread use of logistics companies. Those usages of 3PL companies over 10 times don't gain the higher trust value than usages of 3PL companies below 10 times. At the same time, those usages of 3PL companies over 10 times occupy the big share of the 3PL business. This figure also reflects the unstable service performance provided by the 3PL companies. With frequently used, 3PL companies disclose more and more deficiencies, which makes the trust value becomes a little lower than the 3PL companies used below 10 times.

3.2.2 Market share of express companies

The interviewed sellers use 41 3PL companies. From the analysis, it can be found that the market share of 3PL companies which now means express companies is revealed as Figure 3.3 below.

“Others” in the Figure 3.3 means that no more than 3 interviewed objects use this company. From the figure, we can see that Shen Tong Express, Yuan Tong Express, Shun Feng Express, Tian Tian Express and EMS occupy 58% of customers. They are the large scale 3PL express companies in China and they gain the big market share. The fact that so many customers choose them as their own logistics service providers also reflects the force of them. Otherwise, 27 3PL express companies which chosen by customers only occupy 19% of market share. With the large scale express companies become more and more powerful, these small scale companies

will become bankrupt in the competition or purchased by the large scale express companies.

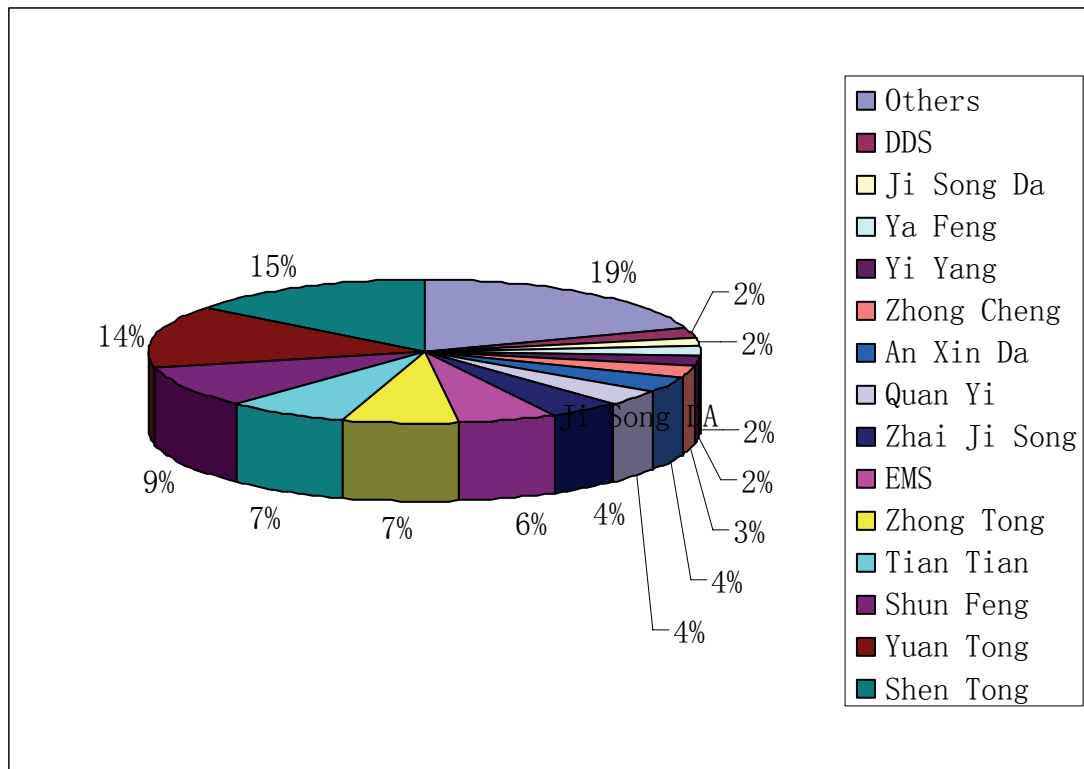


Figure 3.3 Market share of 3PL companies (Express Companies)

3.2.3 Relationship between usage time and trust value

In the survey, each subject uses those different express companies for different length of time. Some express companies are used over 1 year, but some are not. According to the difference of usage of time, we can analyze the relationship between the Trust Value and usage time. So we classify usage time into one month, one month to 3 months, 3 months to 6 months, 6 month to 12 months and over 12

months. For every different length of usage time, we can calculate the Average Trust Value like Figure 3.4 below.

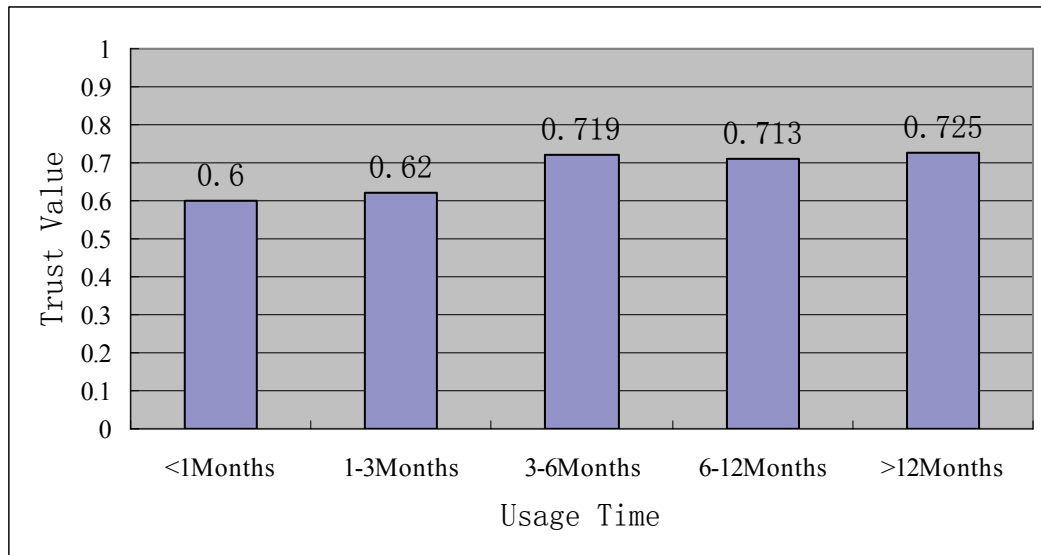


Figure 3.4 Relationship between usage time and trust value

This Figure 3.4 clearly demonstrates that usage time over 3-6 months or even longer, express companies will maintain a higher degree of trust evaluation. And express companies used for several months get the lower trust value. This result is consistent with our expectations.

3.2.4 Corresponding proportion of different usage time

We further look at all of the corresponding proportion of subjects of different usage time, as follows:

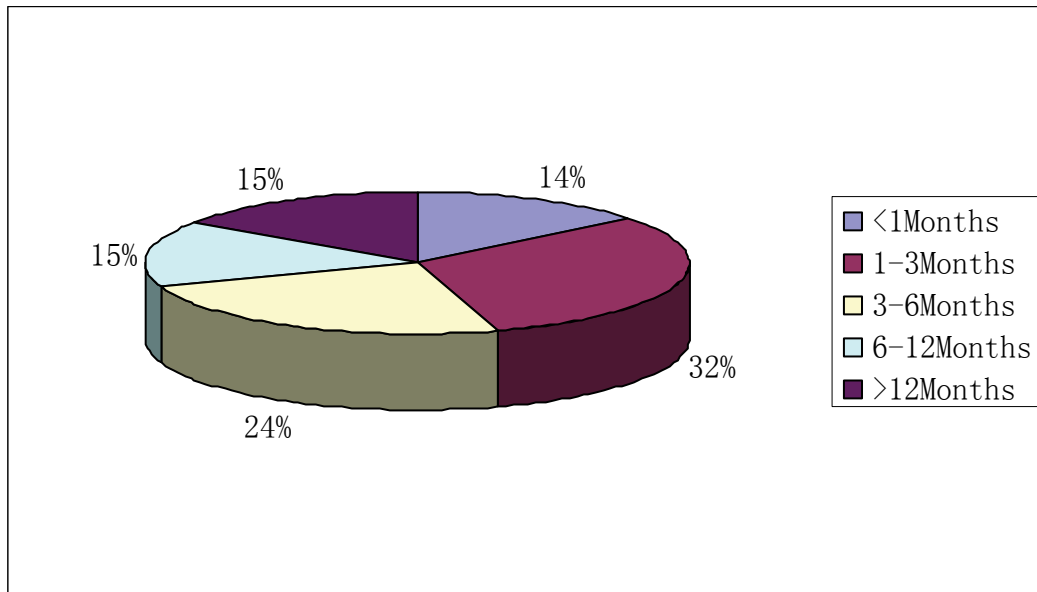


Figure 3.5 Corresponding proportion of different usage time

It's evident that 70% subjects don't use the logistics service companies more than 6 months, which indicates the current logistics service users has not been fully popularity in China and is still in its early stage of development. Those express companies whose usage time is more than 12 months accounted for only 15% of subjects who are likely to deal with logistics operation in China. But obviously, in our survey, only a few of such subjects are.

3.2.5 Relationship between usage time and quantities of express companies

Now, we can analyze the relationship between usage time and the quantities of Express companies.

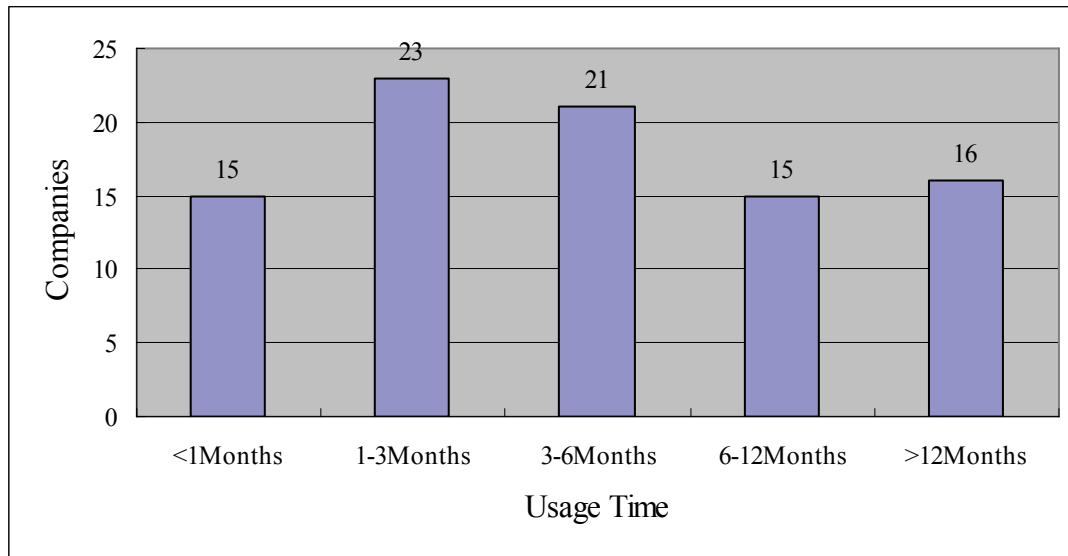


Figure 3.6 Relationships between usage time and quantities of express companies

Figure 3.6 is also in line with our expectations. Initially, the subjects just choose express companies in a very small number of companies within those express companies with good reputation because they are short of the information and don't know many other express companies. With the increasing usage time, they are likely to use more 3PL service providers. At this time, the subjects try many express companies within 1-6 months during their usage of logistics services. And with the stable business relationship being built, these customers gradually become matured to be inclined to choose trustworthy express companies whom they think of. And such express companies only accounts for a small number. So after 6 months the quantity of express companies used by subjects become declined.

3.2.6 Conclusions of the survey

From the analysis of the results on the survey, it ultimately complies with our

expectation. The trust factor is very important for logistics service users to choose the 3PL companies.

Although those usages of express companies for many times don't gain the higher trust value than usages of express companies for a few time, it just shows that the fact of disordered express market in China. The disordered logistics services have affected the trust value of those express companies. Certainly, those express companies with frequently used have been disclosed more and more deficiencies, which makes the trust value becomes a little lower. But these frequently 3PL logistics service users only concentrate a small number of customers, which indicates 3PL logistics service haven't become popular and the logistics market have more potential power. So it can be found that the customers often complain the express logistics companies with the increase of usage times. And it also indicates the express companies should improve their service performance in order to make customers trust them.

Those large scale express companies occupy big market share. The fact that so many customers choose them as their own logistics service providers also reflects the force of them. Otherwise, many 3PL express companies which chosen by customers only occupy small market share. Thus, the larger companies are of, the customers more willing to choose.

Those express companies whose usage time is over 3-6 months or even longer, express companies will maintain a higher degree of trust evaluation. And at the beginning, customers only choose logistics service providers by trying many logistics companies. If they find a trustworthy 3PL companies, they will maintain the stable relationship with logistics service providers.

Although this survey is conducted to the individual 3PL service users and the feedback only concern about express companies, it also reflects 3PL business of China has the potential market, and the trust factor affect customers make a decision to choose 3PL service providers.

3.3 EFFECTS OF TRUST ON PERFORMANCE OF 3PL IN CHINA

Although it has win-win outcome which form good partnership between 3PL and their customers, it is still hard to maintain the steady level of this relationship. The relationship between two parties is so complicated because this relationship is affected by many uncertain factors. Among of these factors, trust factor can be regarded as one of the most important factors. In the reality, many logistics managers of logistics department in manufacturing companies and trading companies don't or aren't willing to trust those 3PL Companies. It's evident that trust can be considered as the foundation of successful cooperation, and mutual party can improve performance through mutual fairly supervisory system. "Li Meixian (1998) said that only if two parties trust each other, they would accept partnership's ideas and improve their own essential faith and share knowledge with each other. Finally, it causes the close relationship inter-organizations." (Li Meixian, August 1998)

Trust may bring many benefits to the relationship between 3PL and their customers.

1. Trust can reduce the uncertainty of logistics partnership

The more uncertain the future is, the more uncertain feedback from two parties is, which makes mutual trust become more important. It's because mutual trust can

ensure these two parties take reasonable measures to solve unknown situation by their acceptable behaviors. The relationship between 3PL and shippers is so fragile that every party has to pay more attention to it. In one sense, the potential loss hidden in the bad relationship may be difficult to be calculated. For the 3PL companies, once they breach the commitments of two parties or do something that can't be trusted by logistics service users. They will not only lose this one customer, but also lose all of customers of the all potential customers of this industry. It's very terrible for a 3PL company because they are the service industry and the core development depends on enhancing service quality. If they have no customers because of bad service performance, they will be forced to shutdown. For the shippers, if they can't trust the logistics company which they choose, they will have to continue to look for new 3PL provider. It will waste much time and money for company users and individual users. When they use one new 3PL service provider, they have to take risks and adapt to each other over again. It will be detractive that these service users can not focus on their own major business.

In short, only when two parties trust each other, the relationship can be built and maintained. Trust can decrease or eliminate the motivation and behaviors of opportunism. Consequently, it is beneficial to make every party enjoy the advantage of integration.

2. Trust can reduce mutual transaction cost

Whenever one person interacts with another person, then a certain amount of what you do before, during and after the interaction may well be directed at ensuring that you do not get deceived by the other person. Just like the relationship between people and people, the same is to the relationship between 3PL and their customers. It's not necessary for these two parties, although it does not directly create value for

one party or the other party. It can be called as the transaction cost.

For example, if one logistics service user wants to outsource their own logistics operations, they may search for much information about prices of every 3PL companies. There may be a small local 3PL company that provide logistics service, but the manufacturing company or trading company doesn't trust this price. They may go to see a larger 3PL company. And probably they hire the professional market research institution to fulfill the market investigation. Even then, they also collect information through all kinds of channels, such as internet. Besides the prices, they may concern about the quality of service, some policy of compensation and so on. When they screen out some logistics companies, they will bargain with the 3PL companies to achieve the lower price and the better service. Finally, they may make decisions to choose one or more logistics service providers. And the transaction begins.

But this long process is included in the transaction costs which can be classified into 3 types, namely, "A" type, "B" type and "C" type.

"A" type cost is for searching and collecting useful information. For example, the logistics service users collect information about 3PL market and appropriate suppliers.

"B" type cost is for bargaining and decision-making. For example, the logistics service users negotiate about prices and service items with the 3PL companies. And then, both of two parties establish the agreement.

"C" type cost is for policing and enforcement. It ensures the other party

conforming to agreements.

The total transaction cost is " $A+B+C$ ". When the work of manufacturing and trading companies involves interaction with many 3PL companies, the cumulative transaction cost can be a very significant part of the cost of doing business.

So for these two parties, if two parties are able to trust each other, they will have the good communication with each other, which ensure the cooperation getting better. Then good partnership will make two parties maintain present relationship, not waste time and money to find a new partner. The " A " type will become less and less which we call it as " A_I " type. Subsequently, trust can avoid some conflicts between two parties because both 3PL companies and logistics service users are willing to think over the other side. And they needn't bargain prices over and over. Every party will give reasonable response to the price. So " B " type cost gets less which we can call it as " B_I " type. Finally, since two parties trust each other, they will be self-conscious to comply with agreements, which is not passive. So the " C " type cost can be reduced to " C_I " type cost, which is much less than " C " type cost that we mentioned above.

In short, if two parties can trust each other and eventually form the long term partnership, the transaction cost may be reduced to lower level, which the total number is " $A_I + B_I + C_I$ ". Obviously, the new number is far less than the previous old transaction cost which means that " $A+B+C$ ".

3. Trust can simplify the transaction process

Trust can be regarded as the mechanism of simplification. Luhmann said that the human is hard to deal with the complicated environment around us, so we must build

some mechanism of simplification. Trust is one of simplification mechanism which can be as the judgment to the morality and ability of human (Luhmann, 1979, pp. 29-47). This mechanism is built on the base of minds and psychology of members of every party. Because of trust mechanism, one party will not control the other party even if this party has enough ability. The big response to the faithful partnership is that they don't need make formal contracts and the items in the contracts are very simple, because when they meet conflicts, they may communicate with each other and negotiate about the solutions. So they can simplify the solutions to conflicts, and avoid long-term bargaining.

4. Trust is helpful to make 3PL and logistics users realize the potential of partnership

When two parties trust each other, they are willing to share secret information, understand business of the other party, and set up information system which combines all the correlative information into one shared information system in order to achieve better and highly efficient service. When the individual logistics service users trust one 3PL company, they will recommend to other users with pleasure. The 3PL company will have more business. And for the manufacturing company users, they may outsource more logistics operations to the 3PL companies if they think that this 3PL company is worth trusting. So it's the potential chance for the two parties.

CHAPTER 4

STEPS TO BUILD TRUST MECHANISM OF 3PL

From the analysis above, trust is the essential factor for the relationship between 3PL and logistics service users. But the recent cases which carriers disappeared after they get shipper's cargo and money make many logistics service users are afraid of outsourcing their logistics operations to those 3PL companies. This seriously influences the growth of 3PL market of China.

So it's very important to build trust mechanism of China's 3PL business. This trust relationship can be formed through 3 steps.

The first step is coming into being trust relationship between 3PL and logistics service users, which means that two parties are just finding each other by many channels of judgment, and begins to cooperate with each other.

The second step is strengthening the trust relationship between 3PL and logistics service users, which means that two parties have formed common missions and develop the long-term collaboration.

The third step is maintaining the trust relationship between 3PL and logistics service users, which means that two parties have formed comparatively stable and solid trust

relationship through the accumulation of a long period of time of dynamic cooperation.

The detailed step can be showed as follows.

4.1 THE STEP OF COMING INTO BEING TRUST

4.1.1 Building up good reputation

Trust mechanism means that 3PL and their customers comply with common criteria of behaviors, ethics and morality which are promised by their own reputation. The reputation concerns many fields, such as corporation resources of two parties, history of cooperation, management skills and so on. When logistics service users choose one 3PL providers, they will try to know the performance, ability and quality standards of 3PL provider which require this party has competitive advantage of the cost and value-added service. And the history of the cooperation and management skills become the other two parts of building up good reputation. If one ever provided the good service to other logistics service users, the new customers are more willing to trust them and to be joined in the partnership. Thus, the 3PL company may strive for more partners through establishment of good reputation.

4.1.2 Building the fair return on investment

The trust relationship should build on gaining the higher returns on investment than before. As the total profits remains the same level, logistics service users are very

interested in the service quality of 3PL companies. If 3PL companies can make manufacturing company users or individual users save costs and ensure higher service quality for a long time, the logistics service users will be satisfied with the performance and may be willing to trust their service providers. For the logistics service users, they can get value added service from 3PL, which is worthy of their initial investment. And for the 3PL companies, they are willing to take new technology and new management system to adapt to their customers. If the service users always default logistics fees so that 3PL companies can't get their own benefits, 3PL companies will stop the cooperation with this customer. And they aren't able to come into being the trust relationship. So only both of two parties give the opposite party fair returns on investment, forming the trust relationship can be realized.

4.1.3 Building common solutions to conflicts

Solving conflicts is mainly dependent on contracts, but it's very important for the mutual trust of two parties that build common solutions to conflicts, through which they have chance to know each other about ideas, viewpoints, and measures. And it will help each other to adjust for each other and improve mutual trust relationship.

4.2 THE STEP OF STRENGTHENING TRUST

4.2.1 Building the trust relationship between individuals and organizations

In the final analysis, the relationship between 3PL companies and logistics services

can be regarded as the relationship between people and people. The interpersonal trust is different with the inter-organizational trust in the contents and structures but they have the potential relationship. Thus, 3PLs should develop the trust relationship from the interpersonal trust. For the 3PL companies, they should train their staffs to build trust relationship among employees. And then, these employees will apply it to the job and pay more attention to their own words and deeds in order to give their customers believable impression. Only these daily behaviors and words which exist between individuals in the work can help the 3PL companies strengthen the trust relationship with their customers.

4.2.2 Building the open information exchange mechanism with partners

Trust-building is based on knowing each other. Sharing of information between partners can make each other know more about the other party's cooperation reputation and correlative operational situation. Before 3PL companies and their logistics service users form the cooperation relationship, they may assess the opposite party. But it's not enough for the trust-building, because the assessment just tells those logistics service users about the findings of different 3PL companies of the day. If they want to strengthen the trust relationship with partners, they should strengthen mutual communion. Only when those logistics service users are familiar with what 3PL companies are doing at that time, those logistics service users set their heart at rest to trust 3PL companies. The sharing of information not only includes contacting with each other in time, but also includes building information system to share information with the each other. Of course, two parties will pay attention to the degree of sharing information, because some information concerns about the core business of their business which may cause the leakage of commercial

secrets.

In short, the information sharing can help two parties know more about each other and can trust each other, but two parties should control the degree of information sharing to avoid the leakage of core secrets of their business.

4.2.3 Inspiring 3PL and logistics service users with mutual study

If the 3PL companies want to strengthen the trust relationship with their customers, they should focus on continuous learning from their members in the team and their customers outside their team. With the integration of the knowledge from different customers, the members of two parties can know more about the other party's knowledge and skills, and enrich their own perceive which makes one party respect the other party's knowledge and skills and become trustful to the other party. At the same time, when the employees of 3PL or logistics service users have enhanced their own knowledge, these employees will also enhance the confidence for their ability.

What's more, the sharing of knowledge among the team members of one's own team not only improve the individual knowledge of the team members, but also the resultant force of all these members will give the whole team larger energy. And only for this situation, the team members can cognize the mission statement of their own team. Thus, those team members are willing to trust their team. The result is that the employees of 3PL companies and logistics service users are happy to show their best performance to their customers, which makes logistics service users satisfied. Finally, trust relationship between these two parties will be reinforced.

4.3 THE STEP OF MAINTAINING TRUST

The most important measure of maintaining trust is to build the evaluation methods to the trust relationship between 3PL companies and logistics service users. When the two parties have cooperated for a long time, they should have a clear idea about their partners. The logistics service users will evaluate the performance the 3PL companies, and decide whether continue to collaborate with each other according to the performances. But this evaluation needs some standards because nobody can make a decision blindly. If 3PL companies are only afraid of the punishment for the failure of commitment, this trust relationship is the primary relationship. If two parties trust each other because they understand what the other party have done and predict what they will do, this trust relationship is the secondary relationship. And if the two parties trust each other because they have the common sense and values, and both of them just like a union, this trust relationship is the high-level relationship. When these two parties evaluate the trust relationship as the above standards, they can find out which one level they rest on and improve their performance to satisfy the partner's requirements. 3PL companies will pay more attention to improve their own performance to make themselves trustful to their customers. And thus, 3PLs will maintain their trust relationship with their customers.

4.4 THE MODEL OF BUILDING TRUST MECHANISM OF 3PL

Just like the analysis above, the trust mechanism includes 3 major stages. And the step I which means logistics service users begin to collect information and prepare for finding an appropriate 3PL partner. This step is the junior step, and 3PLs try to

attract the logistics service users through showing their good performance. The step II which means 3PLs strengthen trust relationship with logistics service users. This step is the intermediate step, and 3PLs will try to reinforce the trust relationship through exchanging information among individuals or between two parties. The step III which means 3PLs maintain trust relationship with logistics service users. This step is the senior step. When 3PLs have developed the trust relationship, 3PLs will try to keep the stable relationship with their customers through evaluation of their own performance and they should deal with assessments from logistics service users at any time. These three steps form the gradual ladders. (Figure 4.1) The higher ladder is of, the higher level of trust forms.

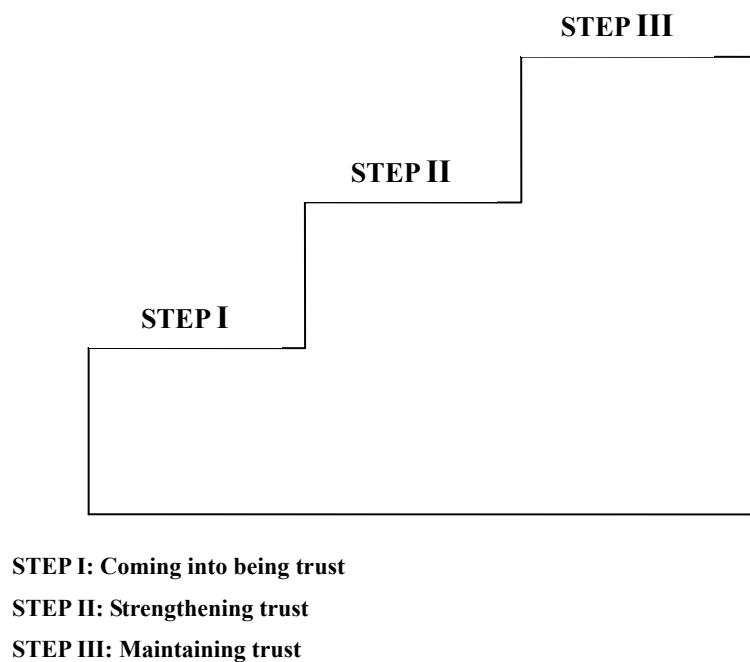


Figure 4.1 Steps to build trust mechanism

When we consider the time factor, these levels can be divided into 3 segments which can be displayed by the curves like Figure 4.2.

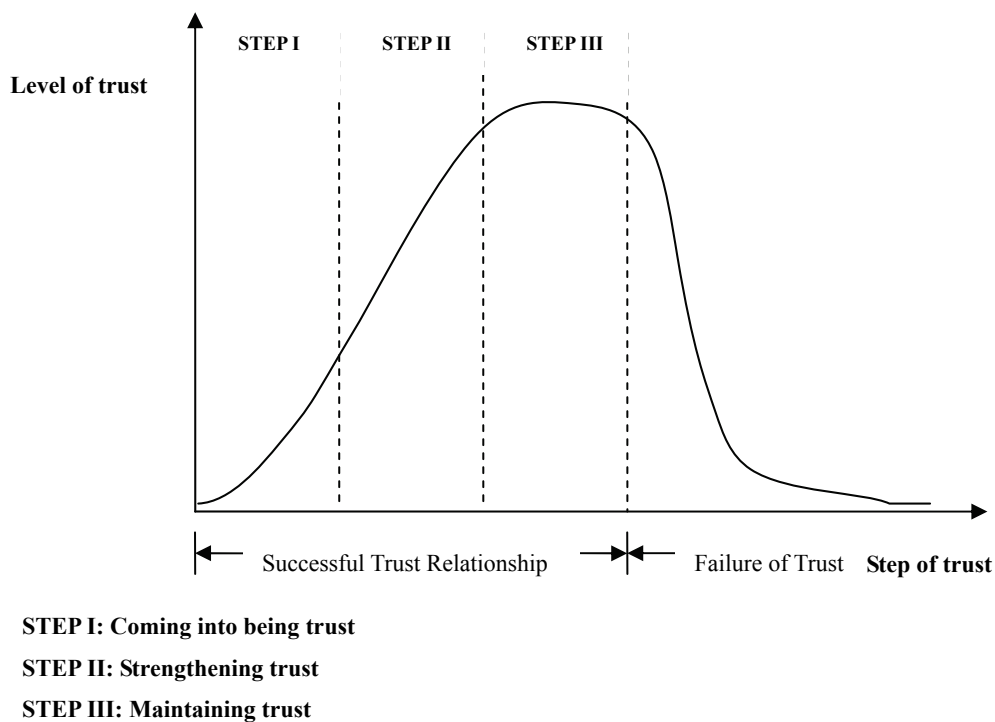


Figure 4.2 Relationships between level of trust and step of trust

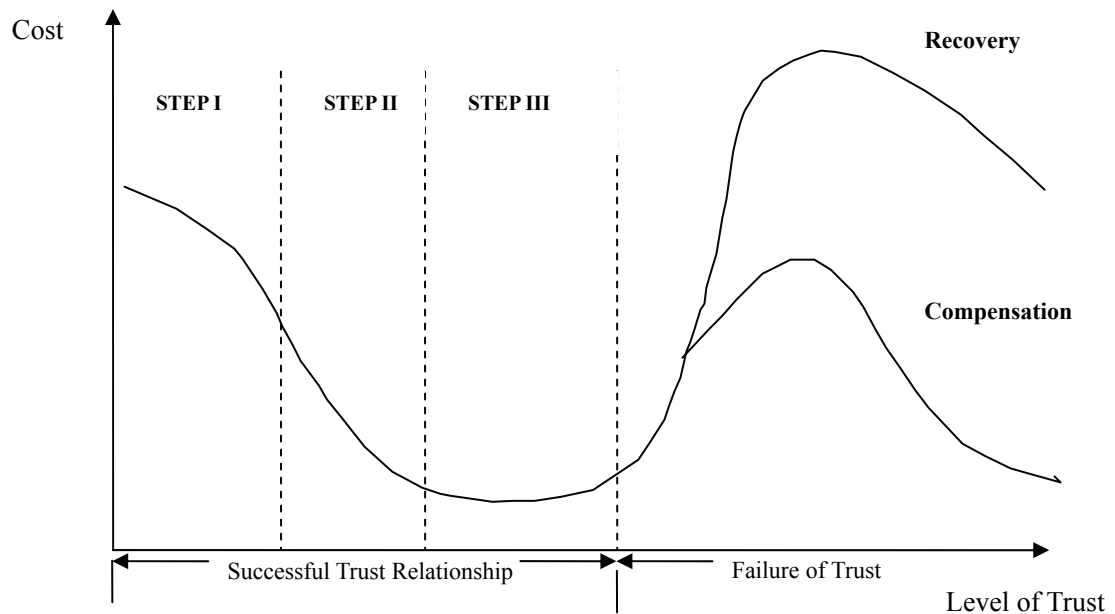
With the passage of step of trust, the levels of trust raise gradually. At the beginning, 3PLs makes logistics service users starts to trust them and the trust relationship between two parties just begins. Then, 3PL develops the relationship with their customers, and the trust level becomes higher than before. In this period of time, 3PL companies strengthen their trust relationship with their customers. Logistics service users can trust their service providers and they are more willing to accept the service of 3PL. After that, 3PL companies will maintain their good

performance to increase the trust level and logistics service users have cooperated with 3PL companies for long time, which makes two parties form a stable trust relationship.

But these three steps only present the successful trust relationship. If one case damages the profits of logistics service users, it may affect the trust relationship. And a single trust failure can have a knock-on impact other trust relationships, for example, when one 3PL company the logistics service users trusted to do some work for customers have failed in some way, resulting in the customer's trust in the whole 3PL company and brand being affected. Cumulatively, the trust relationship between 3PL companies and their logistics service users is broken. So the curve of the level of trust approximates to 0. Even 3PL companies take measures to save the trust relationship, but the result often makes 3PL companies being disappointed because the cost of recovery may be much higher than the previous steps for developing the trust relationship.

So when we consider the cost factor and the step of trust, the sketch map may be showed as Figure 4.3 below.

In the stage I, 3PL should be of good reputation in order to attract those logistics service users. But good reputation is not shaped in one day and it is based on the many previous logistics operations which have gained higher evaluation. Thus, 3PL companies, in fact, have paid for a lot of money and time to accumulate their own credits. Besides it, 3PLs have to introduce themselves to the logistics service users and negotiate with each other, which also cost 3PL companies too much. In this stage, the total cost is very high.



STEP I: Coming into being trust

STEP II: Strengthening trust

STEP III: Maintaining trust

Figure 4.3 Relationships between Cost and Level of Trust

In the stage II, 3PL companies constantly improve themselves in order to meet the requirements of their customers. They exchange information with their customers and make corresponding adjustments which costs less than the stage I.

In the Stage III, 3PL companies have formed the stable relationship with their customers. But they should keep themselves being trusted by their customers, so they are never careless to their performance. So it's still costs the 3PL much money and time, but less than stage II.

But the occasional cases may break the trust relationship. If the occasional cases

become more and more, the trust relationship will be drastically destroyed. When this situation happens, the cost curve will be divided into two forked curves. One is the recovery cost and the other one is the compensation cost. Because when some cases that destroy the trust relationship have happened, customers will ask for the compensation of loss. 3PL companies will have to compensate for the loss of customers which will cost 3PL companies much money. But 3PL companies pay less and less costs on building the trust relationship between them and those customers because those logistics service users don't trust the 3PL companies again, which makes the curve approximate to 0. If 3PL companies want to make up the relationship with their customers, they may pay much higher costs for recovery of the trust relationship than the previous stages of development of trust relationship.

CHAPTER 5

SUGGESTIONS TO TRUST MECHANISM BUILDING

5.1 PROBABLE PROBLEMS

When the 3PL companies of China want to build trust mechanism, they may meet some difficulties.

1. It's difficult to share information between 3PL companies and logistics service users.

Because the information about their own industry often concerns about the core business of their production or selling, something secret can't be shared with their partners which brings some obstacles to these two parties. Furthermore, these logistics service users usually located in the different cities and most of them communicate with others mainly depend on the telephones. It will counteract the relationship between two parties.

2. The conflicts of management of corporate culture.

Because the companies have different backgrounds and different culture, they may

meet some difficulties in the ideas and values. When it happens, these two parties are hard to maintain the stable trust relationship.

5.2 SUGGESTIONS TO BUILD TRUST MECHANISM

5.2.1 Keeping abreast of customer collaboration experience and background

Cooperation experience can be used to judge whether the opposite party is worth being trustful. If two parties have very harmonious and successful cooperation in the previous coalition, they will have a higher degree of confidence in each other's minds, which means that enterprise possesses "goodwill". The higher Goodwill 3PL enterprises are of, the more accessible to trust they get. On the contrary, if the two partners had the unpleasant experience of cooperation, these two parties may not have next cooperation with each other or will be very cautious even if they go on the cooperation. If one 3PL company understands more clearly to the objectives and policies of logistics service users and knows what logistics service users are seeking cooperation in order to achieve their own strategy, this 3PL company and their customers will have ability to cooperate with each other to promote performance. So naturally, it will produce a sense of trust between each other. Conversely, if one 3PL company wants to obtain the trust from their customers, in addition to develop cooperation strategy, it must find ways to let logistics service users know their cooperation strategy and the ability of implementing these strategies. At this time, the exchange between the two parties is very important, so these two parties should pay more attention to learning about the other party's background frequently.

5.2.2 Timely communication and consultation

In the process of cooperation, if two parties can always maintain resources sharing and “face-to-face” communication, the mutual confidence will be enhanced. Both sides can exchange views and opinions on a particular issue. Therefore, if 3PL companies and their customers have established smooth communication channels and enhance mutual understanding, they can increase mutual trust. In addition, when these enterprises draft regulations and policies that involving their partners, they should discuss with interested partners, then to make the final decision. Although this method may leak confidential strategy, it indeed wins an absolute trust from partners. In fact, enterprises should not worry too much about the leakage of secrets, because for the two partners, the strategy should be consistent or interdependent, so that the more the one party understands the other party, the more two parties will cooperate with each other. That will be conducive to realize maximization of profits of two parties.

5.2.3 Establishing credibility mechanisms

This credibility mechanism can establish and maintain trust relationship between 3PL companies and logistics service users. If one party deceives the other party for the short-term interests, it would undermine its credibility and affects the benefits of cooperation, and then this party will eventually lose credibility from partners. Therefore, two parties should establish the necessary credibility mechanism to prevent the occurrence of opportunistic tendencies. To establish the credibility, society and enterprise should work together from the following three aspects.

(1) Social credibility mechanisms, including, namely, the credibility safeguard system and law established by government, and other mechanisms of information intermediary agencies which includes enterprise authentication, credibility assessment and counseling, quality certification, security authentication, and so on.

(2) The credibility mechanisms of enterprises include the followings: correctly use cooperation strategies in the process of cooperation in order to build credibility; long-term “investment” for credibility, and maintain a good credit record; building long-term relationships with partners; and increasing expectations for the future cooperation interests in order to strengthen trust in cooperation.

(3) Strengthening cultural construction is an important component of “trust mechanisms”. The culture construction enables two parties to form common values. Because different business ideas and different management patterns of two parties will affect the smooth cooperation, or even lead to the disintegration of partnership. In addition, after selecting the other cooperation partner, in order to smooth cooperation, they must build harmonious trust relationship between intimate partners, which is the urgent need to integrate various enterprise culture and recognition. Therefore, the promotion of integration of enterprise culture and creating a harmonious cultural atmosphere to promote the development of trust relationship between 3PL companies and their customers will be of great significance.

5.2.4 Establishing the learning mechanism

It's very important for two parties to learn knowledge and skills. In the long run, the sustainable competition of enterprises comes from which these two parties have

more learning ability than their opponents. Learning includes not only the transmission of knowledge but also the knowledge creation. Two parties should be clearly aware of enhancing their performance through active learning activities. Two parties should pay more attention to learn the knowledge from each other to smooth the communication. For the 3PL companies, they should know more about the products of manufacturing companies, such as physics attributes, weight, size and so on. And for the logistics service users, they should know more about the methods of packing machines or transport modes in order to understand how their cargo are handled by 3PL companies safely. And only when they all know how the other party can do, they may communicate and cooperate with each other more easily.

5.2.5 Establishing reasonable industry regulation

Recent trust crisis cases show that 3PL industry lack the regulation, which make this business only has the easy entry no matter how much the sizes of those companies are. Now, the 3PL business in China still hasn't matured law related to 3PL business to restrict the operations of 3PL companies. And from last year, some provinces in China begin to try out "Classification and Evaluation Index for Logistics Enterprise". This standard system classifies logistics business into 3 categories, namely, transportation, warehousing and general service. And then this system divides qualification of logistics business into five grading levels from A to AAAAA by comparing the 6 parameters which includes operation, assets, management, service, network, information construction. If one 3PL company get higher grades in the evaluation, it will get higher grading level, such as AAA or AAAA or even much higher to AAAAA. So those 3PL companies with higher

qualification will win the trust by their customers and get more profits, and those 3PL companies with lower qualification may be eliminated through selection. The whole 3PL business will develop in the way of standardization and profession. For those 3PL companies, the industry regulation will play a role of restricting what 3PL companies do.

CHAPTER 6

SUMMARY AND CONCLUSIONS

Trust is like a pot of money. When 3PL companies do something for their customers, 3PLs may be regarded as put money in the pot. The problem is that some 3PL companies just take money from the pot and they consume their trust so that many customers are afraid of sending their cargo by some 3PL company. The most important reason for this situation is that 3PL business in China has not formed uniform standards in the logistics industry. And now many small logistics companies enter into this industry so that the 3PL service market becomes disordered. These disordered operations directly lead to the trust crisis of 3PL business in China.

The relationship between a 3PL and its customers is a symbiotic relationship. The 3PL can not leave away their customers which include cargo providers and cargo receivers, otherwise 3PL will become insignificant.

The survey on the trust situation is conducted to the individual 3PL service users who mainly mean the online- shop sellers and the feedback only concern about express companies, the results of survey also reflect 3PL business of China has the potential market, and the trust factor affect customers make a decision to choose 3PL service providers. So it's evident that trust factor is a major important factor to build a

relationship between two parties, such as reducing the uncertainty of partnership, reducing the transaction costs and simplifying the transaction process, etc.

So if the 3PL companies want to enlarge their own business and gain the trust from their customers, they have to rebuild the trust mechanism of 3PL in China. This trust mechanism can be built by 3 steps, which includes the step of coming into being trust, the step of strengthening trust and the step of maintaining trust. And when these three steps are achieved, the trust relationship between 3PL companies and their logistics service users can be built successfully. With the passage of time, the level of trust will be increased gradually and then keep the horizontal level in the step of maintaining trust. But if 3PL companies do something wrong to their customers, the level of trust will be declined quickly. And if the non-trustworthy cases have happened for many times, the level of trust will be decreased till the curve approximates to 0.

If considering the cost factor, 3PL companies will consume the cost of building trust relationship. At the beginning, the cost of coming into being the trust is a little higher than the next stage of strengthening trust because 3PL companies will have to show their best performance to logistics service users in order to attract the customers. Then when the trust relationship becomes stable, the cost will become lower and maintain state level. But the occasional cases may break the trust relationship. If the occasional cases become more and more, the trust relationship will be drastically destroyed. When this situation happens, the cost curve will be divided into two forked curves. One is the recovery cost and the other one is the compensation cost. Because when some cases that destroy the trust relationship have happened, customers will ask for the compensation of loss. 3PL companies will have to compensate for the loss of customers which will cost 3PL companies

much money. But 3PL companies pay less and less costs on building the trust relationship between them and those customers because those logistics service users don't trust the 3PL companies again, which makes the curve gradually approximate to 0. If 3PL companies want to make up the relationship with their customers, they may pay much higher costs for recovery of the trust relationship than the previous stages of development of trust relationship.

So this analysis is only a simple explanation to build the trust mechanism and the sketch maps have been drawn above which just show the rough process of this analysis.

When 3PLs in China act in an untrustworthy manner, they will be fined a huge amount and can even become bankrupt. And when trust is lost, it requires an even larger investment over a period of time to restore. According to this situation of trust crisis of 3PL in China, there are some suggestions to the establishment of trust mechanism, such as timely communication and consultation among partners, establishing credibility mechanisms and so on.

In conclusion, the best way for 3PL companies to solve the trust crisis of 3PL in China is to rebuild the trust mechanism and build good relationship with logistics service users no matter who are company users or individual users.

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APPENDIX

Using Investigation for 3PL Companies (Express)

Express Company	Usage Time	Has Lost?	Has Compensation?	Speed	Service Attitude	Other Comments	Trust Value
An Jie Express	6-12Months	1	1	0.9	0.3	0.6	0.73
An Xin Da Express	6-12Months	1	0	0.9	1	0.6	0.74
An Xin Da Express	>12Months	1	1	1	1	0.7	0.97
An Xin Da Express	3-6Months	1	0	0.9	0.3	0.6	0.53
An Xin Da Express	1-3Months	1	0	1	1	0.7	0.77
An Xin Da Express	1-3Months	1	0	0.9	0.3	0.6	0.53
An Xin Da Express	<1Months	1	0	0.9	0.3	0.6	0.53
An Xin Da Express	<1Months	1	0	1	0.3	0.7	0.56
Chang Yu Lo Logistics	>12Months	1	0	0.9	1	0.9	0.77
Chang Yu Lo Logistics	<1Months	1	0	0.9	1	0.7	0.75
Chang Yu Lo Logistics	3-6Months	1	0	0.9	1	0.9	0.77
Chuan Zhi Express	>12Months	1	0	0.9	1	0.7	0.75
DDS	1-3Months	1	0	0.9	0.3	0.7	0.54
DDS	>12Months	1	0	0.9	1	0.7	0.75
DDS	1-3Months	1	1	0.9	0.6	0.6	0.82
DDS	1-3Months	1	0	0.9	1	0.7	0.75
EMS	>12Months	0	0	0.9	0.3	0.7	0.34
EMS	>12Months	1	0	0.9	1	0.7	0.75
EMS	1-3Months	1	0	0.9	0.3	0.7	0.54
EMS	6-12Months	1	0	0.5	1	0.9	0.69
EMS	<1Months	1	0	1	0.3	0.7	0.56
EMS	>12Months	1	1	0.9	1	0.7	0.95
EMS	>12Months	1	0	0.9	0.3	0.6	0.53
EMS	<1Months	1	0	0.9	0.3	0.2	0.49
EMS	3-6Months	1	1	0.9	1	0.9	0.97
EMS	6-12Months	1	0	0.9	0.3	0.6	0.53
EMS	>12Months	1	0	0.9	1	0.6	0.74
Guan Da Express	>12Months	1	0	0.9	1	0.7	0.75
Hui Tong	1-3Months	1	0	0.5	1	0.6	0.66
Jia Li Da Tong	1-3Months	0	0	0.5	0.3	0.6	0.25
Jie Si Express	6-12Months	1	0	0.9	1	0.7	0.75
Jie Yu Express	3-6Months	1	0	0.9	0.3	0.6	0.53
Jin Chi Qi Liang Express	3-6Months	0	1	0.5	0.6	0.2	0.5

Ji Su Da Express	<1Months	1	0	0.9	0.3	0.2	0.49
Ji Su Da Express	1-3Months	1	0	1	1	0.9	0.79
Ji Su Da Express	6-12Months	1	0	0.9	1	0.9	0.77
Ji Su Da Express	<1Months	1	0	0.9	1	0.9	0.77
Kuai Ma Express	<1Months	0	1	0.9	0.6	0.2	0.58
Kuai Ma Express	3-6Months	1	0	1	1	0.7	0.77
Kuai Ma Express	>12Months	1	0	0.9	1	0.6	0.74
Long Bang	3-6Months	1	0	0.9	1	0.9	0.77
Mr.Hawk Express	1-3Months	1	0	0.9	1	0.9	0.77
Nan Bang	3-6Months	1	0	0.9	1	0.7	0.75
Neng Da Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Qin Cheng Express	3-6Months	1	0	0.9	1	0.7	0.75
Qin Cheng Express	>12Months	1	1	0.9	1	0.7	0.95
Qin Cheng Express	1-3Months	1	0	0.9	1	0.7	0.75
Qi Su Express	>12Months	1	0	0.9	1	0.6	0.74
Quan ri Tong	3-6Months	1	0	0.9	1	0.9	0.77
Quan Su Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Quan Yi Express	>12Months	1	0	0.9	0.3	0.7	0.54
Quan Yi Express	<1Months	1	0	0.9	1	0.6	0.74
Quan Yi Express	6-12Months	1	0	0.9	1	0.7	0.75
Quan Yi Express	6-12Months	1	0	0.9	1	0.7	0.75
Quan Yi Express	3-6Months	1	0	0.9	1	0.9	0.77
Quan Yi Express	6-12Months	1	0	0.9	1	0.7	0.75
Quan Yi Express	1-3Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	3-6Months	1	1	0.9	0.6	0.6	0.82
Shen Tong Express	1-3Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	1-3Months	0	0	0.5	0.3	0.7	0.26
Shen Tong Express	6-12Months	1	0	0.9	0.3	0.6	0.53
Shen Tong Express	1-3Months	1	0	1	0.3	0.9	0.58
Shen Tong Express	>12Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	3-6Months	1	1	0.9	1	0.7	0.95
Shen Tong Express	>12Months	1	1	0.9	0.3	0.7	0.74
Shen Tong Express	>12Months	1	0	0.9	0.3	0.6	0.53
Shen Tong Express	3-6Months	1	0	0.9	1	0.6	0.74
Shen Tong Express	3-6Months	1	0	0.9	1	0.9	0.77
Shen Tong Express	1-3Months	1	0	0.9	1	0.9	0.77
Shen Tong Express	1-3Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	<1Months	0	1	0.5	0.3	0.2	0.41

Shen Tong Express	1-3Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	3-6Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	>12Months	1	0	0.9	0.3	0.6	0.53
Shen Tong Express	6-12Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	1-3Months	1	0	0.9	1	0.7	0.75
Shen Tong Express	3-6Months	1	0	0.9	0.3	0.6	0.53
Shen Tong Express	6-12Months	1	0	1	0.3	0.9	0.58
Shen Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	6-12Months	1	0	0.9	0.3	0.6	0.53
Shen Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Shen Tong Express	3-6Months	1	1	0	0.6	0.2	0.6
Shen Tong Express	3-6Months	1	0	0.9	0.3	0.7	0.54
Shen Zhou Express	<1Months	0	0	0.5	0.3	0.2	0.21
Shun Feng Express	1-3Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	6-12Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	>12Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	>12Months	1	0	1	1	0.9	0.79
Shun Feng Express	1-3Months	1	0	1	1	0.7	0.77
Shun Feng Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Shun Feng Express	>12Months	1	0	1	0.3	0.9	0.58
Shun Feng Express	>12Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	3-6Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	<1Months	1	0	0.5	0.3	0.7	0.46
Shun Feng Express	>12Months	1	0	0.9	1	0.7	0.75
Shun Feng Express	3-6Months	1	0	1	1	0.7	0.77
Shun Feng Express	>12Months	1	0	0.9	1	0.6	0.74
Shun Feng Express	3-6Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	<1Months	1	0	1	0.3	0.7	0.56
Shun Feng Express	6-12Months	1	0	0.9	1	0.7	0.75
Shun Feng Express	1-3Months	1	0	0.9	1	0.9	0.77
Shun Feng Express	>12Months	1	0	1	1	0.6	0.76
Tian Di Network	6-12Months	1	1	0.9	1	0.7	0.95
Tian Tian Express	6-12Months	1	0	0.9	1	0.9	0.77
Tian Tian Express	6-12Months	0	1	0.9	1	0.7	0.75
Tian Tian Express	6-12Months	1	0	0.9	1	0.9	0.77
Tian Tian Express	<1Months	1	0	0.5	1	0.9	0.69
Tian Tian Express	1-3Months	1	0	0.9	0.3	0.6	0.53
TianTian Express	6-12Months	0	1	1	1	0.9	0.79

Tian Tian Express	1-3Months	1	0	1	1	0.7	0.77
Tian Tian Express	6-12Months	0	1	0.9	0.6	0.6	0.62
Tian Tian Express	3-6Months	1	0	0.9	1	0.9	0.77
Tian Tian Express	1-3Months	1	0	0.9	1	0.7	0.75
Tian Tian Express	3-6Months	1	0	0.9	1	0.7	0.75
Tian Tian Express	6-12Months	1	0	0.9	1	0.7	0.75
Tian Tian Express	3-6Months	1	1	0.9	0.6	0.2	0.78
Tian Tian Express	3-6Months	1	0	0.9	1	0.7	0.75
Tian Yi Express	3-6Months	1	0	0.9	0.3	0.9	0.56
Wei Feng Express	1-3Months	1	0	1	1	0.9	0.79
Xin Bang Lo Logistics	3-6Months	1	0	0.9	1	0.7	0.75
Xin Yi Da Express	>12Months	1	1	0.9	1	0.9	0.97
Ya Feng Express	<1Months	1	0	0.9	0.3	0.7	0.54
Ya Feng Express	6-12Months	1	0	0.9	1	0.9	0.77
Ya Feng Express	3-6Months	1	0	0.5	1	0.6	0.66
Ya Feng Express	<1Months	1	0	0.9	1	0.7	0.75
Yi Yang Express	3-6Months	1	0	0.9	1	0.7	0.75
Yi Yang Express	3-6Months	1	1	0.5	1	0.7	0.87
Yi Yang Express	3-6Months	1	0	0.5	1	0.7	0.67
Yi Yang Express	1-3Months	1	0	0	0.3	0.6	0.35
Yuan An Da Express	6-12Months	1	0	0.9	1	0.9	0.77
Yuan Tong Express	1-3Months	1	0	0.5	0.3	0.6	0.45
Yuan Tong Express	3-6Months	1	1	0.9	1	0.9	0.97
Yuan Tong Express	3-6Months	1	0	0.9	0.3	0.6	0.53
Yuan Tong Express	>12Months	1	0	0.9	1	0.7	0.75
Yuan Tong Express	6-12Months	0	1	0.9	1	0.9	0.77
Yuan Tong Express	6-12Months	0	0	0.9	1	0.7	0.55
Yuan Tong Express	1-3Months	1	0	0.5	0.3	0.6	0.45
Yuan Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Yuan Tong Express	<1Months	1	1	0.9	1	0.9	0.97
Yuan Tong Express	6-12Months	1	0	0.9	1	0.9	0.77
Yuan Tong Express	3-6Months	1	0	0.9	1	0.7	0.75
Yuan Tong Express	<1Months	1	0	0.9	1	0.6	0.74
Yuan Tong Express	1-3Months	0	0	1	1	0.7	0.57
Yuan Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Yuan Tong Express	3-6Months	1	0	0.9	1	0.9	0.77
Yuan Tong Express	<1Months	1	0	0.9	0.3	0.7	0.54
Yuan Tong Express	3-6Months	1	1	0.5	0.6	0.6	0.74
Yuan Tong Express	1-3Months	0	1	0.9	0.3	0.2	0.49

Yuan Tong Express	>12Months	1	0	0.9	1	0.9	0.77
Yuan Tong Express	<1Months	1	0	0.9	0.3	0.7	0.54
Yuan Tong Express	1-3Months	1	0	0.9	1	0.9	0.77
Yuan Tong Express	3-6Months	1	0	0.9	1	0.6	0.74
Yuan Tong Express	1-3Months	1	0	0.9	1	0.7	0.75
Yuan Tong Express	1-3Months	1	0	0.9	0.3	0.6	0.53
Yuan Tong Express	1-3Months	1	0	0.9	1	0.6	0.74
Yuan Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Yuan Tong Express	3-6Months	1	0	1	1	0.9	0.79
Yue Feng Express	1-3Months	1	0	0.5	0.3	0.6	0.45
Yue Feng Express	6-12Months	1	0	0.9	0.3	0.7	0.54
Yue Feng Express	1-3Months	1	0	0.9	0.3	0.9	0.56
Yun Da Express	>12Months	1	0	0.9	1	0.7	0.75
Yun Ad Express	3-6Months	1	0	0.9	1	0.7	0.75
Zhai Ji Express	<1Months	1	0	0.9	0.3	0.7	0.54
Zhai Ji Express	1-3Months	1	0	0.5	1	0.6	0.66
Zhai Ji Express	1-3Months	1	0	0.5	0.3	0.6	0.45
Zhai Ji Express	6-12Months	1	1	0.9	1	0.7	0.95
Zhai Ji Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Zhai Ji Express	1-3Months	0	1	0	0.6	0.2	0.4
Zhai Ji Express	1-3Months	1	0	0.5	0.3	0.6	0.45
Zhai Ji Express	<1Months	1	0	0.9	1	0.6	0.74
Zhong Cheng Express	3-6Months	1	0	0.9	0.3	0.6	0.53
Zhong Cheng Express	3-6Months	1	0	0.9	1	0.7	0.75
Zhong Cheng Express	1-3Months	1	0	0.9	1	0.9	0.77
Zhong Cheng Express	3-6Months	1	0	0.9	0.3	0.9	0.56
Zhong Cheng Express	3-6Months	1	0	0.9	1	0.7	0.75
Zhong Gang Express	1-3Months	1	0	0.9	1	0.7	0.75
Zhong Gang Express	1-3Months	1	0	0.9	1	0.6	0.74
Zhong Gang Express	<1Months	1	0	0.9	1	0.6	0.74
Zhong Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Zhong Tong Express	1-3Months	1	0	0.9	1	0.9	0.77
Zhong Tong Express	3-6Months	1	0	0.9	0.3	0.7	0.54
Zhong Tong Express	<1Months	0	1	0.5	0.6	0.2	0.5
Zhong Tong Express	>12Months	1	0	0.9	1	0.7	0.75
Zhong Tong Express	1-3Months	1	0	0.9	1	0.6	0.74
Zhong Tong Express	<1Months	1	0	0.5	1	0.9	0.69
Zhong Tong Express	<1Months	1	0	0.9	1	0.2	0.7
Zhong Tong Express	1-3Months	1	0	0.9	0.3	0.6	0.53

Zhong Tong Express	<1Months	1	0	0.9	0.3	0.7	0.54
Zhong Tong Express	3-6Months	1	0	0.9	1	0.6	0.74
Zhong Tong Express	1-3Months	1	0	0.9	0.3	0.7	0.54
Zhong Tong Express	1-3Months	1	0	0.9	1	0.7	0.75