

Taking YTO and SF Express as Examples to Analyze the Operation Status of the Express Delivery Industry

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Abstract. In recent years, with the gradual prosperity of online shopping, the development of the express delivery industry has also flourished. The ensuing problem is that the market is saturated, and many express delivery companies will carve up the existing express delivery market together, so the ultimate profit of each company will be relatively meager. How an enterprise maintains its existing market size is very important. This article selects two companies, SF Express and YTO, with direct sales system and franchise system, for case analysis. In this research, the basic situation of the two enterprises is introduced, followed by a comparison of products, services and business levels of the enterprises to gain a picture of their economic benefits. The research results show that SF Express has better economic benefits and development level. It can be concluded that at present, people not only pay attention to the price of delivery but also pay attention to the quality of goods in the process of transportation. In the future, the express delivery market will gradually be refined, but the price and service in each market will tend to be unified. If companies want to maintain the sustainable development of business, it is suggested to continue expanding your own scale and learn from each other's strengths before the entire market stabilizes.

Keywords: Express delivery industry, Shunfeng, Yuantong, Economic benefits.

1. Introduction

In the past 20 years, with the rapid development of global Internet technology, the disposable income of residents has gradually increased. Slowly, the Internet is no longer just providing entertainment, but has also become a place for people to conduct transactions, which has promoted the economic development of various countries. Coupled with the outbreak of the new crown pneumonia epidemic in 2019, people spend most of their time at home, and shopping is gradually flourishing. At the same time, the prosperity of online transactions has promoted the development of the logistics industry. According to surveys and research, in 2021, Chinese express delivery service companies will complete a total of 108.30 billion pieces, a year-on-year increase of 29.9% [1]. The cumulative revenue of the express delivery business was 1,033.23 billion yuan, a year-on-year increase of 17.5% [1]. However, the number of express delivery companies is also increasing. How to maintain a stable position for existing companies in the express delivery market has become a burning question for various express delivery companies. This article will select two companies, SF Express and YTO, and analyze their logistics scale and financial data in detail. Then the conclusion will show which company has a larger market size and more market potential. Based on the above analysis, the suggestions on how to improve the enterprise to obtain higher economic benefits for other enterprises to learn from will be put forward.

2. Business Situation

2.1. The Situation of ShunFeng

SF Express was founded in Shunde, Guangdong in 1993, then it developed into SF Holding Group. In the following context, it refers to SF Holding. SF Holding owns two brands, SF Express and Fengwang Express, with business scope spanning the mid-to high-end and low-end markets.

SF Express, a subsidiary of SF Holdings, is a direct-operated enterprise based in the mid-to-high-end market. SF Express is a leading logistics service provider with a strong logistics network and transportation capabilities. Its logistics network covers 31 provinces, autonomous regions and municipalities directly under the central government. Nearly 300 medium and large cities and more than 1,900 county-level cities or towns are included [2]. In addition, SF Express has outlets or delivery services in Hong Kong, Macao, Taiwan, South Korea, Japan, Malaysia, Singapore and the United States. With the dense logistics network and diversified means of transportation, SF Express can realize the timeliness of express delivery and provide high-quality express services.

Fengwang Express (founded in May 2020) adopts a franchise system, targeting the low-end market, and its main strategy is price wars. At present, with the help of SF Express's logistics system, it is also conducive to carrying out price war strategies to gain market share. However, in order to improve transportation efficiency in the future, it will gradually establish its own logistics and warehousing system.

2.2. The Situation of Yuan Tong

Yuan tong was established in Shanghai in 2000. At present, the enterprise logistics system is relatively complete, with a large scale. Recently, YTO Express won the title of 5A-level logistics enterprise in 2020, ranking among the top 50 logistics enterprises in China [3]. It can be regarded as a logistics enterprise with a strong influence in China. YTO mainly delivers express goods up to 50kg. On that premise, YTO sets some main businesses, such as Same-day Express, same-day regional package, cross-provincial time-limited express, air first-day express, and air second-day express. YTO's services also cover a series of professional express services such as warehousing and distribution. What's more, YTO can formulate courier solutions for customers to provide personalized and one-stop services. YTO not only owns the domestic market but also expands the existing express lines in Hong Kong, Macao, Taiwan, Southeast Asia, Central Asia, Europe, and the United States, which leads to obtaining some international markets through such special logistics lines, to achieve cross-border transportation of goods. At present, the coverage of domestic services is as high as 31 provinces, cities, autonomous regions and municipalities directly under the Central Government. International services cover four continents [4].

The enterprise targets the market in a low-end market and uses relatively low prices to obtain customers to increase market share. Due to the low revenue of single express delivery in the low-end market, companies need to reduce operating costs to ensure profitability. Besides, the enterprise adopts the franchise system, in which the headquarters has a weak restriction between each outlet. For profit distribution, headquarters and franchisees are following each single fixed proportion of profit distribution. In addition, franchisees need to invest in the headquarters.

3. Market Segmentation Analysis

The express delivery market is divided into the mid-to-high-end market and the mid-to-low-end market. The products and services in the express delivery market mainly revolve around two aspects: transportation efficiency and price. The service types that emphasize the efficiency and quality of express transportation form the mid-to-high market, while the service types that emphasize low-cost transportation form the low-end market. The market segmentation factors of the express delivery industry mainly include the level of macroeconomic development, the upstream market of express delivery, and downstream customers. The classification of the express delivery market is not completely determined by the express delivery companies themselves, but by the upstream industry that occupies a dominant position. The upstream industry will be affected by the macro economy. If the macroeconomic situation develops well and shows an upward trend, people's living standards will improve to varying degrees. If people's income level increases, it will greatly promote consumption. After the total amount of online shopping products increases, the business of the express delivery industry will gradually increase. Obviously, the express delivery industry is attached to the e-

commerce market, and consumers will become an important factor in promoting the development of the express delivery market. Because different consumers have different priorities in the process of product mailing. For example, some people hope that the express delivery fee will be low, while others pay attention to the completeness and speed of the express mailing process. Therefore, consumers will choose different express companies, which also play a role in promoting the segmentation of the express market. SF Express, a subsidiary of SF Holding, provides mid-to-high-end product services relying on a variety of logistics methods and efficient express sorting. Fengwang, a newcomer to the market, competes with other logistics companies that provide mid-to-low-end products and services to gain market share with its price advantage. Compared with SF Holdings, the target market of YTO Express is the low-end market. At present, the scale of the company is gradually expanding, and it has not yet been involved in the field of mid-to-high-end express delivery services.

Through the survey, it was found that YTO is deeply involved in the low-end market, with a market share of 15.3% in 2021 [5]. SF Express will only have a 9.7% market share in 2021 [5]. However, SF Express not only has a large market share in the mid-to-high-end market but has also developed the mid-to-low-end market and has shown that it will gradually expand the size of the two markets in the future. (In the comparison of financial indicators, the data shows that SF Express is a high-input and high-return enterprise, and YTO Express has less investment, and its income is not as high as that of SF Express. However, the development of YTO Express is relatively stable)

4. Product Diversity Analysis

4.1. The Product Diversity Analysis of SF

SF's logistics system has a variety of transportation methods, mainly focusing on land and air-based transport. According to Table 1, it can be concluded that: At present, SF Express not only owns the largest cargo airline in China but also the largest cargo owner of China's air cargo with shipping more than 1,920,000 tons of physical commodities. Domestic air cargo volume accounted for 35.5% of China's air cargo volume, with an average of 4,754 daily flights. According to statistics at the end of 2021, SF Express has 86 operating all-cargo aircraft (68 of its own), 590 pilots and 111 routes, covering 53 domestic stations and 35 international and regional stations. For scattered aviation resources, SF Express has 10,914 airline routes with a shipment volume of more than 820,000 tons [6].

For the land transportation system, more than 95,000 trucks participate in the transportation of main lines and branch lines in the global operation and management, including 130,000 domestic transportation lines. For the product series of express delivery by the railway system, 130 ordinary railway transportation have been opened. Its international trains have opened 203 routes, covering 31 countries and regions. It handles more than 81,000TEU of railway freight. There are about 20,000 shipping lines, which can reach more than 1,000 ports and terminals, covering 177 countries and regions. The total shipment by sea is more than 300,000TEU. SF Logistics outlets are also widely distributed at home and abroad. There are as many as 21,000 domestic self-operated service outlets [6].

Table 1. The transport scale of SF [6]

Total Scale of SF Airlines Logistics			
Total Cargo Volume	>1,920,000tons	Average Vainly Flight	4,754
All cargo aircraft			
Cargo Aircraft in Normal Operation Pilot	86 (own aircraft 68) 590	Global Operating Routes	111
Fragmented Aviation Resources			
Domestic Route Total Shipments	2,114 >930,000tons	International Route	8,800
SF Express Land Transport Scale			
Global Mainline and Branch Trucks Terminal Delivery Van	>95,000 >90,000	Domestic Operating Lines Transit Field	>130,000 66
SF Express Railway Transportation Scale			
Ordinary Train Line International Train Line	130 203	International Handled Container Volume	>81,000TEU
SF Shipping Scale			
Shipping Line Sea Shipments	≈20,000 >300,000TEU	Involved Docks	>1,000
SF Express Outlet Scale			
Domestic Self-operated Service Outlets	>21,000	Domestic Terminal Cooperation Outlets	>168,000

4.2. The Product Diversity Analysis of YuanTong (YTO)

YTO transportation system is divided into two parts, the largest part is the land transportation system. According to Table 2, YTO has 75 self-operated transshipment centers in China, with more than 7,600 main-line transport vehicles. The company has over 7,600 main-line transport vehicles in the entire network, including 5,370 self-owned main-line transport vehicles. Its air transportation system is relatively small compared with land transportation, with only 10 self-owned aviation fleets. By the end of the reporting period, the company had 5,102 franchisees and over 64,000 terminal stores. The company's international business service network now covers 6 continents and more than 150 countries and regions. The company's express service network covers 31 provinces, autonomous regions, and municipalities directly under the central government across the country. The cities above the prefecture level have basically achieved full coverage, and the coverage rate of cities above the county level has reached 99.54%. The express service network in townships, villages and groups has expanded rapidly [7].

Table 2. YTO Transport scale [7]

YTO Land Transport Scale			
Own Trunk Transport Vehicles Self-operated Transshipment	5370 75	Transport Volume of Trunk Line	>7,600
YTO Air Freight Scale			
Own Aircraft	10		
YTO Outlet Scale			
Domestic Franchisee	5102	Terminal Store	>64,000

4.3. Comparison

Table 3. Logistics scale comparison

	SF	YTO
Own Cargo Aircraft	68	10
Lorry	>95,000	>76,000
Domestic Terminal Outlets	>168,000	>64,000
Transit Center	66	75

Judging from Table 1 and Table 2, there is a large gap in the amount of data that can be compared between the two companies. Generally speaking, YTO has fewer data, while SF Express has more comprehensive logistics information data at home and abroad. From another point of view, the scale of YTO is currently smaller than that of SF Express. According to Table 3, some information can be concluded. In terms of the number of its own all-cargo aircraft, the number of cargo aircraft owned by YTO is almost one-seventh of that of SF Express. There is also a large gap in the number of trucks owned. The number of trucks owned by SF Express is more than twice that of YTO. The number of domestic terminal stores of SF Express is also significantly larger than that of YTO, and the number is three times as many as YTO's. Among the four comparable data, the only one in which YTO has an advantage is the number of transfer stations, but there is no particularly obvious gap, with only 9 more than the number of SF Express transfer stations.

The reason why the data of SF Express and YTO have these differences is that the target markets of the two are different. SF Express is currently involved in the mid-to-high-end and mid-to-low-end markets. Due to the establishment of SF Express and its relatively short operating time, it still focuses on the mid-to-high-end market. The target customers are mainly enterprises, white-collar workers, and foreign users. Among all customer groups of SF Express, low-end customers accounted for as high as 80% (it is understood that it is ordinary individual customers posting and express delivery), and large customers accounted for the smallest, with only 5%. Although large customers only account for 5% of the total number of customers, according to the Pareto 20/80 theory, SF Express will continue to tap the inherent potential of large customers [8]. While providing differentiated and customized services to large customers, SF Express will also maintain existing low-end customers. The main market of YTO is the low-end market, and the main customers are easily affected by delivery fees, such as Taoba and Pinduoduo merchants. However, in the middle and low-end express delivery market, YTO is not the only company, but also ZTO, Shentong, Yunda and other companies are all dividing up the market share with it. Not only that, the target market of Fengwang Express, a subsidiary of SF Express, is also the low-end market. From this point of view, YTO must be very careful to maintain its market share and not be divided by other companies. On the contrary, the main businesses of medium and high-end large logistics companies are different, so there will not be too much overlap in their target markets. For example, SF Express is mainly engaged in small express delivery in the high-end market, and Debang Express is mainly engaged in large express delivery. JD Express is mainly engaged in the logistics and transportation services of its website, while SF Express targets more websites, companies and individual customer resources. To sum up, to meet the service needs of the mid-to-high-end market, SF Express needs to establish a comprehensive and complete logistics system, while YTO's logistics system will be relatively incomplete. Because to keep the cost low, the setting of the logistics system does not need to be particularly detailed, and it is only necessary to set up transfer stations and delivery points at important locations.

5. Financial Analysis

Table 4. Cost Comparison Unit: RMB [8, 9]

		2021	Year-on-year Growth	2020	Year-on-year Growth	2019
Cost	SF	2,036bn	39.81%	1,456bn	36.74%	1,065bn
	YTO	428bn	29.84%	330bn	14.7%	288bn

Overall, the growth rate of SF's cost investment is higher than that of YTO, and the growth rate is almost twice that of YTO. The operating costs of SF Express have increased by more than 35% year-on-year. Compared with the previous year's data, the data for 2021 will increase by 39.81% year-on-year, which is close to 40%. The year-on-year growth rate of YTO's cost input basically remained at 20%. The three-year business data shown in the chart can also be concluded that the investment cost of SF Express is significantly higher than that of YTO, and the input cost of SF Express in 2021 and 2020 is nearly 6 times that of YTO Express. In 2019, the cost of SF Express was as high as 9 times that of YTO. (specific detail see Table 4).

SF's relatively large investment costs are mainly due to these aspects: labor costs, warehousing costs, transportation costs and outsourcing costs, followed by management costs, information technology costs and sales costs [10]. Since 2019, the scale of SF Express has continued to expand, and the increasing demand for employees has led to an increase in the company's cost investment year by year. SF Express is a direct-operated enterprise, so both the headquarters and terminal staff need to pay high wages and insurance [11]. Secondly, SF Express has added a number of outlets and transfer stations, and the profit margin of storage costs and management costs have shown an upward trend. Third, the increase in transportation costs has a certain relationship with vehicle purchases, maintenance, and oil price increases. According to Wang Jie's research report, in 2017, the cost of purchasing and maintaining transportation equipment accounted for 30.31% of the transportation cost. Fuel costs accounted for 19.33% of transportation costs [10]. From 2019 to 2022, fuel prices will rise and fuel costs will rise considerably. Fourth, SF's outsourcing business is the majority of first-line delivery and delivery of express business. Some logistics center will also be outsourced, but this part of the cost will be calculated into warehousing costs [12].

Table 5. Profitability Comparison [8, 9]

		2021	2020	2019
Gross Profit Margin	SF	12.37%	17.42%	20.16%
	YTO	11.46%	11.89%	12.65%
Operating Margin	SF	3.05%	6.60%	9.07%
	YTO	9.46%	9.58%	9.83%
Net Sales Profit	SF	1.89%	5.01%	6.67%
	YTO	7.24%	7.23%	7.55%

The values and changes of YTO's profitability level are relatively stable, while the values of SF's three indicators are in a downward trend year by year. In addition to the gross profit margin, YTO's operating profit margin and sales net profit are both higher than SF Express. After 2019, the express delivery industry gradually adapted to the impact of the epidemic and began to gradually resume normal operations. YTO changed its business model, which allowed YTO to maintain its profitability at a relatively stable level [13]. The overall profitability of the two companies is relatively impressive. Although SF's operating profit margin and sales net profit margin are both lower than YTO, its annual net profit is higher than YTO. The overall net profit of YTO is on the rise and has a good momentum of development. (Table 5 has some specific details)

Through the analysis of the diversity, cost and profitability of the logistics tools of the two companies, SF Express and YTO, the conclusion can be drawn from the figure below—SF Express is in the upper left corner, and YTO Express is in the lower right corner.

Table 6. Net profit attributable to parent company [8, 9]

		2021	2020	2019
Net Profit Attributable to Parent Company	SF	4,269,100,000	7,326,100,000	5,796,500,000
	YTO	2,103,400,000	1,766,800,000	1,667,700,000

According to Table 6, SF's annual net profit attributable to its parent company is significantly higher than that of YTO. SF's highest net profit attributable to its parent is nearly four times higher than that of YTO's, and the lowest is twice that of YTO's. However, SF's net profit attributable to its parent has fluctuated greatly, while YTO's has been increasing year by year and its development is stable.

6. Suggestions

The main problem of SF Express is the high cost. First, SF Express has its own intelligent warehousing system in China and invests in the research and development of new logistics intelligent equipment. But generally speaking, the development of logistics in China is still relatively slow. Enterprises can learn from many foreign enterprises, such as Federal Logistics. FEDX applied

automatic sorting systems and cargo scanning guns in the transfer yard more than 20 years ago [12]. By learning advanced technologies and concepts, enterprises can lay the foundation for subsequent long-term development.

Second, the two brands of SF Express and SF Express can share the same logistics sorting center and warehouse in the early stage. When Fengwang Express develops stably and has a stable market share, it can gradually establish its own logistics system. At this time, it is possible to improve the respective transportation efficiency in the low-end and high-end markets.

Third, outsourcing can often reduce some operating costs, but it also brings some hidden costs such as improper execution of outsourcing contracts. Then the enterprise can implement a responsibility system, and the higher level of the outsourced personnel is responsible for the strong supervision of the execution of the contract.

If YTO wants to increase profitability, reduce operating costs, and stabilize its market position in the express delivery industry, it needs to combine today's digital technology. The use of digital technology can not only reduce high labor costs but also improve the efficiency of goods sorting while ensuring the integrity of things [13]. For example: the application of artificial intelligence to logistics enterprises, and the realization of intelligent enterprise warehousing.

Second, gradually improve the quality of employees. The express delivery industry belongs to the tertiary industry, so when consumers have a good consumption experience, it is possible to increase their brand awareness and market share. Enterprises can set up relevant training to improve the quality of grassroots employees and learn to communicate efficiently with customers [14].

7. Conclusion

This article fills the blank of the comparison of economic benefits among enterprises with different operating modes in the express delivery industry. Through the above-mentioned analysis, following points can be concluded: First, although the market share of SF Express is not as large as that of YTO, the overall net profit of SF Express far exceeds that of YTO Express; in terms of ensuring timeliness and express quality, SF Express has inherent advantages, because SF Express has a more complete logistics scale; not only that, but while developing the domestic market, SF Express is also expanding the international market, which has a forward-looking advantage. Generally speaking, SF Express has more potential for development in the future, and it is easier to adapt to the changing market environment.

With the continuous improvement of living standards, the purchasing power of residents is also gradually rising. Under this premise, the needs of consumers will not be limited to low commodity prices, they will have more demands. For example: the quality of the product must be guaranteed during the transportation process, the transportation time should be as short as possible, or there are specific requirements for the means of transportation, etc. So, whether it is a franchise system or a direct operation system, express delivery companies should firstly make changes centered on consumers' demands and provide more products that meet consumer needs. Second, delivery companies should improve the logistics system, and improve the quality of personnel. Not only that, but they also need to pay attention to the company's management Cost control, such as transportation costs, labor costs, etc. In this way, it is possible to be in an advantageous position among many express companies, maintain its own market share, and even expand its market share.

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