

Analysis of Cost Optimization Strategies for Small and Medium-Sized Enterprises in Overseas Trade-Taking Chocolate as an Example

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Abstract. With the reconstruction of the global supply chain and the rise of cross-border e-commerce platforms, "going global" for small and medium-sized enterprises is no longer an exclusive option for large enterprises. Especially against the backdrop of the gradual popularization of digital infrastructure, the possibility for small and medium-sized enterprises to survive and expand in the international market through technological empowerment and management innovation has significantly increased. This article aims to study how small and medium-sized enterprises can optimize trade costs during their overseas expansion. Taking the chocolate industry as an example, it explores how to optimize export trade costs through technological, and management means to promote the development of small and medium-sized enterprises in the global market, especially in South America. The article analyzes the main cost components currently faced by small and medium-sized enterprises in export trade and proposes corresponding optimization strategies. At the same time, it analyzes the pain points of the overseas trade cost of chocolate brands of small and medium-sized enterprises, such as supply chain and compliance certification, which need to be further optimized. This paper provides suggestions for the export of small and medium-sized enterprises.

Keywords: Small and medium-sized enterprises; maritime trade costs; chocolate.

1. Introduction

With the advancement of the globalization process, an increasing number of small and medium-sized enterprises choose to "go global" to expand their international markets, especially in promising markets like South America. However, due to reasons such as scale limitations and resource scarcity, small and medium-sized enterprises face relatively high trade costs in international trade, which has become a major obstacle to their international development. During the export process, small and medium-sized enterprises often need to overcome multiple challenges such as production costs, transportation costs, tariffs and complex regulatory procedures. Especially in the South American market, the policy barriers and regional characteristics involved also have an impact on the competitiveness of enterprises [1]. There are still considerable differences in the regulatory environment for SMEs among Latin American countries. This unfair competition and regulatory environment have further raised the export threshold, especially for SMEs with limited scale [2]. Compared with large enterprises having complete risk control systems and multipoint distribution capacity, SMEs often face the "single", anti-risk ability is weak, in the external environment changes in a passive position. They lack the information foundation of overseas markets, do not hold the initiative in changes of trade policies, and have almost no room to deal with factors such as exchange rate fluctuations, tariff adjustments, and logistics delays. South American countries have deficiencies in policy transparency and consistency in implementation. Enterprises often choose the wrong channels, miss subsidies or encounter customs detention due to lagging information, resulting in additional costs. These problems collectively lead to an unequal starting point for small and medium-sized enterprises when they enter the international market. Configurability barriers are also a major obstacle for SMEs to export. The combined influence of factors such as institutional environment, financial resources, and network connectivity often makes it difficult for SMEs to break through the

"bottleneck of going global" [3]. The chocolate industry, for example, as one of the important consumer goods in South America market, the export of chocolate has huge potential, but at the same time facing higher trading costs. Raw materials such as cocoa beans, milk powder and sugar need to be purchased and processed from multiple places. Take the chocolate industry as an example. As one of the important consumer goods in the South American market, chocolate has huge export potential, but at the same time it faces relatively high trade costs. Raw materials such as cocoa beans, milk powder and sugar need to be purchased from multiple places. The processing requirements are strict, and the storage and transportation conditions are harsh. This type of product places relatively high demands on the management capabilities and technical means of export enterprises. Most small and medium-sized enterprises have not established a complete supply chain control system and lack refined management methods. Therefore, they are prone to waste and repetitive costs in cross-border processes. Due to the limited market pricing space, even a slight fluctuation in export prices may touch the break-even point, and export plans are prone to being hindered. How to effectively optimize trade costs and enhance the market competitiveness of enterprises has become an urgent problem to be solved for domestic small and medium-sized enterprises [4]. For the in-depth study of the problem, not just in order to put forward several cost-saving technological tools or management skills, but also to the existing trade environment, looking for a have the operational path for small and medium-sized enterprises. From a micro perspective, it is to reduce the difficulty for individual enterprises to go global. From a macro perspective, it is about promoting small and medium-sized enterprises to participate more effectively in the global value chain and enhancing the efficiency of resource allocation. The cost issue, on the surface, seems to be a matter of accounting, but in essence, it is a mismatch between the enterprise structure, capacity and the market. A systematic breakdown of costs can reflect the real shortcomings of small and medium-sized enterprises in multiple aspects such as technological investment, management mechanisms, and institutional responses, and thus has practical significance and promotion value. In this paper, by analyzing the cost structure of small and medium-sized enterprises to sea trade, combined with the actual situation of the chocolate industry, discusses from two aspects of technology and management how to optimize trade costs, promote the sustainable development of small and medium-sized enterprises in the global market [5].

2. The Current Situation and Cost Structure of Small and Medium-Sized Chocolate Enterprises' Overseas Trade

2.1. Current Trade Situation

The chocolate market in South America has shown a growth trend in recent years, but the logistics efficiency in the South American region is relatively low, especially in inland transportation. Take Brazil as an example. Logistics costs account for as high as 20% to 25% of total trade costs, significantly higher than those in other emerging markets. Tariff policy is still SMEs into one of the main costs of South America market. Although some South American countries have signed free trade agreements, tariffs on imported chocolate still exist. The chocolate tariff in Brazil is 18%, while in Argentina it is 15%. These tariffs directly affect the market pricing strategies and profit margins of enterprises, increasing export costs. Exchange rate volatility is the big challenge for South America market. In some South American countries (such as Argentina and Brazil), there is a relatively significant risk of currency fluctuations, which leads to unstable costs of cross-border payments and affects the capital flow and international settlement of small and medium-sized enterprises.

2.2. Analysis of Trade Cost Structures

When small and medium-sized enterprises export goods such as chocolate, their trade costs are usually composed of multiple components. Production cost is the most crucial part among them, especially in the chocolate industry. The cost of raw material procurement (such as cocoa beans, sugar, milk powder, etc.) directly affects the price of the final product. The equipment and energy costs used in the production process also account for a certain proportion. Globally, the differences in production

costs have led to different price competition pressures for enterprises in various countries when exporting. Transportation costs in the export trade of small and medium-sized enterprises occupy an important position. Especially when exporting to remote areas such as South America, the logistics cost is relatively high. Moreover, chocolate is a perishable commodity and has strict requirements for transportation conditions. The costs related to temperature control and packaging during transportation have also significantly increased the export expenses. The infrastructure and transportation network in South America are relatively backward in some areas, which leads to prolonged delivery times and increased costs. Chocolate very sensitive to the temperature control of the process of transportation to keep within the range of 15-20 °C, slight fluctuations may cause melting, flavor metamorphism and other quality problems. To ensure quality, enterprises often need to invest in high cost insulated packaging and cold chain transportation. In some South American countries, port facilities are outdated, customs clearance is slow, and storage costs and energy consumption expenditures have risen accordingly. Due to limited resources, small and medium-sized enterprises are in a passive position when choosing transportation methods and find it difficult to obtain cost-effective carrier resources. Tariff and non-tariff barriers are small and medium-sized enterprises can't ignore the factors in the process of sea. Although some countries in South America have free trade agreements with other countries, tariffs and trade barriers still exist. For instance, some countries impose high tariffs on the import of chocolate or require it to meet specific product quality standards, which invisibly increases the cost burden on enterprises. In addition, non-tariff barriers such as complex administrative procedures and long approval times have also added additional compliance costs for small and medium-sized enterprises. Financial costs cannot be ignored either, especially in cross-border transactions. Fluctuations in currency exchange rates and remittance fees can all have an impact on the cost structure of enterprises. The currencies of some countries in South America are unstable, and enterprises face significant exchange rate risks when making cross-border payments, further intensifying the uncertainty of costs. In addition, the cocoa-growing systems in different countries also have an impact on the cost structure. For instance, the production systems in Colombia, Ecuador and Peru vary in stability, sustainability and yield efficiency, leading to significant fluctuations in the prices of imported raw materials [6]. Columbia use scattered small farmers planting, more unstable production; Ecuador leans towards intensification, with small fluctuations in production capacity but relatively high prices. Peru, due to its emphasis on ecological and sustainable cultivation, often attaches green traceability certification to international procurement, resulting in relatively high overall procurement costs. The differences in raw material quality and price systems among multiple countries make it difficult for enterprises to form standardized procurement models, increasing the difficulty of decision-making and the cost of trial and error.

3. Analysis of the Pain Points of Overseas Trade Costs for Small and Medium-Sized Chocolate Enterprises

3.1. Supply Chain Cost Pain Points

Chocolate has extremely strict requirements for the transportation environment in cross-border exports. The product needs to be kept within a temperature range of 15 to 20 degrees Celsius. Even slight fluctuations may cause melting, deformation or flavor loss, which can affect sales and reputation. Transoceanic transportation often involves multiple transshipment links. During port loading and unloading or warehouse conversion, the temperature-controlled chain is prone to brief breaks. For small and medium-sized enterprises, stably leasing high-quality cold chain equipment or choosing reliable carriers means higher costs, further compressing profit margins. Raw materials procurement procedures also instability. The main production areas of cocoa beans are concentrated in West Africa and Latin America. The international price is affected by multiple factors such as weather disasters, regional conflicts and financial speculation. The procurement cycle is long, and small and medium-sized enterprises with limited bargaining power find it difficult to lock in long-term stable supply prices. Once market fluctuations occur, costs rise rapidly. Excessive transportation

distance and too many nodes may lead to delivery delays and inventory overstock, thereby increasing the pressure on capital turnover.

3.2. Pain Points of Compliance and Certification Costs

The quality and ingredient standards for chocolate products set by different countries vary significantly. When entering the European market, the cocoa solid content of chocolate needs to meet a relatively high proportion, while the standards in other regions are relatively lenient. If exporters want to cover multiple markets, they often have to conduct multiple sets of standard tests and certifications. This part of the expense accounts for 8% to 12% of the overall trade cost [7]. For enterprises with limited scale, such repetitive expenditures greatly weaken their profitability. Dynamic adjustment of the international food safety regulation has higher threshold of compliance. In the United States, imported food is required to add traceability and testing procedures. Enterprises must update their production processes, introduce new testing equipment and train their employees. These expenditures are not one-off investments but will persist for a long time along with the revision of regulations. The popularity of cross-border e-commerce platforms has further heightened consumers' sensitivity to food safety. Once non-compliance or testing defects occur, it may result in returns and fines at the least, and damage brand reputation and market access qualifications at the worst. The Deforestation Regulation (EUDR) to be implemented by the European Union in 2024 sets stricter traceability and environmental protection standards for agricultural products including chocolate, increasing the complexity of certification for small and medium-sized enterprises in the export process [8, 9].

3.3. Market and Operational Cost Pain Points

In terms of market expansion, small and medium-sized enterprises lack the ability to promote their brands. Most enterprises survive by relying on the OEM model and lack systematic brand building and marketing strategies. The popularity of their own brands in overseas markets is limited. Low-price competition has become the main way to enter the market, but the problem that follows is that the profit margin is too low to cover the additional expenses in other links. Once tariffs are raised or transportation costs increase, the overall business risk will suddenly increase. Canal South American retail network is given priority to with large supermarkets and convenience stores, shelves rents, admission fees and bar code registration fees constitute a heavy burden. The settlement cycle is relatively long, often exceeding three months, further worsening the tight cash flow situation of enterprises. In terms of online channels, although cross-border e-commerce platforms like Amazon have expanded their market space, their platform commissions are as high as 15% to 20%. Coupled with advertising, warehousing and logistics costs, their profit margins have been almost completely compressed [10]. In order to compete for traffic, enterprises must constantly invest in promotion and discounts, falling into a vicious circle. In the aspect of the localization of marketing and after-sales service. When there is a lack of a professional team, it is often necessary to rely on an agency company to complete the promotion and operation, which in itself increases the expenditure. If the after-sales response is not timely, it is easy to cause returns and negative reviews, further damaging the brand image. If this situation persists, enterprises will not only lose their advantage in terms of price but also be in a passive position in terms of reputation and channel competition.

4. Cost Optimization Plan for Small and Medium-sized Chocolate Enterprises' Overseas Trade

4.1. Technical Optimization

For all aspects of the above-mentioned cost structure, technological innovation can provide certain cost optimization opportunities for small and medium-sized enterprises. The production technology of chocolate can enhance production efficiency and reduce labor costs through automated and intelligent means [11]. For instance, by introducing advanced production lines, batch production can

be achieved, the stability of the production process can be enhanced, waste can be reduced, and thus production costs can be lowered. By adopting an intelligent monitoring and management system, various parameters during the production process can be monitored in real time, optimizing resource utilization and reducing energy consumption. In terms of logistics, the introduction of technology also has significant potential. The development of intelligent logistics technology, especially in real-time tracking during transportation, temperature control technology and automated warehousing, can significantly improve distribution efficiency, reduce losses and lower transportation costs [12]. By collaborating with technology companies and implementing logistics optimization solutions based on big data and artificial intelligence, enterprises can optimize transportation routes, reduce unnecessary transportation costs and time waste. In international payments and exchange rate management, the development of financial science and technology also provides an efficient tool for small and medium enterprises. For instance, by leveraging blockchain technology, real-time settlement of cross-border payments can be achieved, reducing payment costs and lowering exchange rate risks. The use of a multi-currency settlement system can reduce the additional costs caused by exchange rate fluctuations.

4.2. Optimization in Management

In addition to technological innovation, optimization in management also plays a crucial role in reducing trade costs. Enterprises can reduce the costs of intermediate links by optimizing supply chain management. Establishing long-term cooperative relationships with raw material suppliers and transportation companies enables one to enjoy lower purchase prices and more favorable transportation conditions. By integrating upstream and downstream resources and shortening the supply chain cycle, overall operational efficiency can also be enhanced. Enterprise can, through the study of the empowerment of staff training, strengthen the ability of intercultural communication and international laws and regulations to promote overall compliance execution efficiency. Research shows that systematic empowerment management can effectively enhance the sense of responsibility and execution ability of organizational members, which is particularly crucial for small and medium-sized enterprises [13]. In trade management, enterprises should pay attention to the compliance and risk management, avoid irregularities and result in additional costs. For instance, understand the trade policies and tariff systems of various countries in South America, and adjust product specifications and packaging according to specific requirements to ensure smooth customs clearance and reduce detention fees caused by non-compliance. At the same time, it is necessary to rationally arrange the export strategy to avoid unnecessary fluctuations caused by frequent price or shipment volume adjustments in the short term and ensure the stability of prices and the predictability of the market. To this end, enterprises can draw on the latest supply chain fairness monitoring frameworks, such as the monitoring system design of EUDR, to enhance their adaptability in policy dynamics and thereby reduce compliance risks [14]. Strengthening cooperation with local distributors and agents in the South American market can better understand local market demands and optimize marketing strategies. Through precise market positioning and customized product strategies, small and medium-sized enterprises can reduce promotion costs and increase market share while ensuring product quality. Enterprises can reduce costs by optimizing the purchasing management system. Building a diversified supplier network and reducing reliance on a single source can help quickly switch channels in the event of price fluctuations or unexpected events in production areas, stabilizing raw material supply and costs. Adopt a combined "futures + spot" procurement strategy and apply a price locking mechanism to control the cost fluctuations of raw materials such as cocoa beans and milk powder. Small and medium-sized enterprises with tight funds can also negotiate with suppliers to set up advance payment discounts or bulk purchase rebates to enhance their bargaining power and relieve cash pressure. Introduce a digital procurement platform to monitor price trends in real time, mine procurement data, identify abnormal fluctuations, and optimize the timing and quantity of procurement. Establishing a unified acceptance standard and supplier scoring system can help screen out high-quality suppliers, eliminate the procurement risks of inflated prices and unstable quality, and stabilize the cost structure from the source [15].

5. Conclusion

This study, by analyzing the trade cost issues faced by small and medium-sized enterprises in the process of chocolate export to the South American market, proposes optimization strategies from both technical and management aspects. In terms of technology, small and medium-sized enterprises should reduce costs through intelligent production, optimizing logistics and supply chains, and leveraging financial technology means. Intelligent production can not only enhance production efficiency and reduce waste but also play a key role in cost control. Optimizing logistics and supply chain systems can reduce unnecessary losses during transportation and enhance efficiency. Especially in South America, where infrastructure is relatively backward, intelligent logistics systems can more effectively lower transportation costs. In the field of fintech, the use of modern financial tools such as blockchain technology can simplify cross-border payment processes and reduce the risks brought about by exchange rate fluctuations. In management, optimizing the supply chain relationship, enhancing compliance and risk management, and working closely with local partners, can effectively reduce operating costs and improve market competitiveness. Small and medium-sized enterprises should enhance cooperation with suppliers and distributors, optimize procurement strategies, and reduce unnecessary expenditure in the production and operation processes. In addition, enhancing compliance and risk management, understanding local tariff policies, regulatory requirements, and market changes, can effectively avoid additional costs resulting from policy non-compliance. In-depth cooperation with local partners can reduce errors caused by cultural differences and unfamiliarity with the market, thereby enhancing market adaptability and sales. The uncertainty of export trade, which makes cost of small and medium-sized enterprises in developing strategy need to retain higher flexibility. Not only should the immediate transportation and production costs be focused on, but also the long-term brand investment and market maintenance costs should be taken into consideration. The South American market is vast, but its consumer culture is diverse, and policies vary from country to country. A slight oversight may lead to trade barriers. Therefore, continuous learning and keeping up with policy changes have become necessary actions. While implementing cost optimization strategies, enterprises also need to clearly define their own positioning. Some enterprises are suitable for delving deeply into the OEM route and winning by efficiency. Some enterprises are gradually developing their own brands and attempting to establish a stable customer base overseas. There is no absolute superiority or inferiority between these two paths, but both need to be adjusted in combination with cost control capabilities. Small and medium-sized enterprises to obtain long-term competitive advantage in the market in South America, must, through technology innovation and management optimization of two-wheel driven, comprehensively promotes its own trade cost management level. Enterprises should integrate their own resources, utilize intelligent and information-based means to promote cost control, and at the same time enhance supply chain management and local market adaptability. Through systematic strategic optimization, they can achieve sustainable development in the global market.

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