The Impact of Business Model Disruption on Fast Fashion Industry Chain Management in the Context of Globalization

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Abstract: Globalization has posed severe challenges to the management of the fast fashion industry chain, but it has also brought opportunities for transformation and upgrading. In the context of globalization, the fast fashion industry faces the combined impacts of increasingly complex supply chain networks, significant cultural differences, rapidly changing consumer demands, and environmental and social responsibility pressures. This background has prompted disruptive changes in the traditional fast fashion business model and triggered a comprehensive innovation in the management of the industrial chain. This paper aims to explore how globalization drives the reshaping of the fast fashion industry chain and the key role of business model innovation in promoting the green transformation of the industry chain. Through literature review, this paper summarizes the main development trends and management pain points of the fast fashion industry in the context of globalization. Research shows that business model innovation is the core driving force for the fast fashion industry to cope with the challenges of globalization. Digital technology-driven supply chain transparency, the implementation of circular economy models, and cross-border collaboration for resource allocation have all paved the way for the sustainable development of the industrial chain. This study provides a new theoretical perspective and practical direction for the fast fashion industry to achieve green transformation in the context of globalization.

Keywords: globalization, fast fashion, supply chain management, green transformation, sustainable development

1. Introduction

As an important driving force for contemporary economic development, globalization has brought unprecedented opportunities and challenges to various industries. As a typical representative of globalization[1], the fast fashion industry has achieved the goal of rapid commodity updates and cost optimization through cross-border procurement, rapid production and global distribution networks. Globalization provides fast fashion with the advantages of convenient resource flow, expanded market scale and rapid technology dissemination. However, this process has also caused a series of problems, such as environmental pollution, waste of resources and infringement of labor rights[2]. The supply chain of fast fashion is centered on "fast, efficient and low-cost", forming a highly complex global network[3]. In this system, enterprises achieve low-cost production through global layout, but the resulting environmental problems, such as large amounts of carbon emissions,

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chemical waste emissions and water waste[4], have become the main constraints to its ecological sustainability. Furthermore, the management of the global fast fashion supply chain has faced significant criticism due to labor issues. Problems such as low wages, long working hours, and poor working environment have frequently occurred, seriously affecting the industry's image of social responsibility. In this context, traditional business models are gradually unable to meet the needs and standards of the new era. The global fast fashion industry chain is ushering in a profound change in business model disruption, driven by the improvement of technological innovation and consumer awareness, which has become a key driving force to meet challenges. The new business model not only reshapes the structure of the supply chain but also provides the possibility for green transformation[5], making sustainable development a core issue of industry competition.

This paper aims to expand the research field of business model disruption in the context of globalization, focusing on analyzing its role and value in the management of the fast fashion industry chain. By combining the perspectives of industry chain management and innovative practice, this paper explores how emerging business models can achieve comprehensive development in environmental, social and economic dimensions. Through research, this paper attempts to provide new theoretical contributions to the academic community and provide practical guidance for the sustainable transformation of fast fashion companies in the context of globalization.

2. Fast Fashion Industry Chain under the Background of Globalization

2.1. The Characteristics of Fast Fashion Supply Chain

The fast fashion industry has become a typical representative of the global economy due to its unique business model and supply chain management strategy. The core characteristics of its supply chain include rapid response, efficient production, and a low-cost model[6][7]. This business model aims to quickly transform consumers' latest demands into best-selling products on the market through a highly agile supply chain structure[8][9]. Fast fashion brands such as Zara and H&M rely on real-time data monitoring and information technology to closely integrate design, production and distribution to achieve an efficient cycle from design to shelf, which usually takes only a few weeks[10].

Efficient production is a highlight of the fast fashion supply chain. Enterprises significantly reduce production costs through standardized production processes and refined allocation of global manufacturing resources. At the same time, the distributed production layout enables enterprises to respond flexibly to market changes. However, this highly efficient supply chain comes at the cost of massive resource consumption and environmental pressure[11]. Overproduction and inventory waste have become issues that cannot be ignored. In addition, the agility of the fast fashion supply chain has also made environmental and social issues more prominent, such as excessive resource use, pollutant emissions, and the neglect of labor rights in low-cost manufacturing[12][13].

2.2. The Complexity of Globalization in Optimizing Supply Chains and Allocating Resources

Globalization has brought significant advantages to the fast fashion industry in terms of supply chain optimization and resource allocation. With the support of transnational procurement and manufacturing, companies are able to take advantage of the resource advantages of different regions and obtain raw materials and labor at the lowest cost[14][15]. For example, many fast fashion brands choose to carry out large-scale production in Southeast Asia and South Asia to take advantage of local cheap labor and looser environmental regulations[16]. This global layout provides fast fashion companies with flexible resource allocation and market responsiveness. However, globalization has also significantly increased the complexity of supply chain management.

The multi-level and transnational characteristics of the fast fashion supply chain led to many challenges in coordination management and risk control[17]. The long-distance transportation of raw materials and the distribution of production bases make the supply chain more sensitive to climate change, changes in trade policies and geopolitical risks. For example, the impact of the global pandemic on supply chain disruptions has highlighted the fragility of over-reliance on production in a single region. In addition, supply chain transparency issues have also become a focus of public and regulatory attention[18][19]. Consumers' concerns for social responsibility and environmental protection have further promoted the development of supply chain management in a more transparent and sustainable direction[20].

3. The Theoretical Framework of Business Model Disruption

3.1. Core Characteristics of Business Model Disruption

Business model disruption is a way to break through existing industry rules and shape a new market competition landscape by redefining the way value is created, delivered and acquired. Its core features include challenging traditional business models, building new value networks, and achieving innovative practices through the combination of technology and concepts. Business model disruption drives changes in the industry landscape and provides opportunities for companies to gain new advantages in competition[21].

In the fast fashion sector, business model disruption is particularly evident. For example, the deep integration of digital technologies enables fast fashion companies to optimize production plans and market strategies with the help of online platforms and data analysis[22]. The real-time collection and analysis of consumer behavior data improve the flexibility of the supply chain and enable more accurate demand forecasting and inventory management. In addition, many companies have introduced the concept of circular economy[23][24], developed sustainable products and built closed-loop supply chains, which not only subverted traditional business models but also provided opportunities for green transformation. New Path[25].

3.2. The Intersection of Disruptive Innovation Theory and Business Model Transformation

Disruptive innovation theory emphasizes the impact of emerging technologies or business models on existing industries and achieves comprehensive changes in the industry through the reorganization of value networks and the reshaping of market structures[26]. Its integration with business model transformation is reflected in the following two aspects:

First, the introduction of technological innovation has changed the traditional structure of the value chain. In the fast fashion industry, the application of 3D printing technology, artificial intelligence-driven design tools, and blockchain technology has significantly improved the traceability and production efficiency of the supply chain[27][28]. These technologies accelerate the product development process and provide enterprises with the possibility to optimize resource allocation and reduce operating costs.

Secondly, changes in consumer demand have driven the renewal of value propositions. With the improvement of environmental awareness and social responsibility concepts, consumers pay more attention to the sustainability of products and the transparency of the production process [29][30]. To meet this demand, fast fashion companies are gradually shifting from a low-cost orientation to a business model centered on value creation[31]. For example, adopting environmentally friendly materials and implementing fair trade policies have become new highlights of corporate competition.

4. The Practice of Business Model Disruption in Fast Fashion

4.1. Current Disruptive Business Models in the Fast Fashion Industry

In recent years, a variety of disruptive business models have emerged in the fast fashion industry to cope with multiple challenges in the context of globalization and sustainable development [32][33]. These business models mainly include sharing economy, customized production, online and offline integrated retail, and the circular economy.

The rise of clothing rental and second-hand trading platforms primarily reflects the application of the sharing economy model in fast fashion[34][35][36]. For example, Rent the Runway provides consumers with more choices by providing rental services for high-end clothing, while reducing the waste caused by overconsumption. Customized production uses big data and artificial intelligence technology to produce small batches according to the personalized needs of consumers, thereby reducing inventory pressure and reducing resource waste.

Online and offline integrated retail has become a new trend in the fast fashion industry. Through the seamless combination of digital platforms and offline physical stores, companies have achieved more efficient inventory management and better consumer experience. For example, Uniqlo provides consumers with a convenient shopping experience through digital fitting mirrors and online appointment functions, while improving the operational efficiency of the supply chain[37]. In addition, the circular economy model is becoming the focus of industry attention. Fast fashion companies are gradually transforming to a green production model by recycling old clothes and using recycled materials.

4.2. Successful Cases of Disruptive Business Models and Their Impact on the Supply Chain

Successful cases of disruptive business models in the fast fashion industry provide practical support for supply chain optimization and green transformation. For example, Zara's vertical integration model achieves a fast cycle from design to shelf by centralizing the management of design, production and distribution. This model significantly improves the flexibility and responsiveness of the supply chain[38][39]. Similarly, H&M has promoted the closed-loop and greening of the supply chain through the "Circular Fashion" plan, using renewable materials for production and establishing a clothing recycling system[40][41].

These successful cases show that business model disruption can improve the operational efficiency of the supply chain and play an important role in promoting the structural adjustment of the industrial chain. Driven by technology and innovation, fast fashion companies have gradually formed a new supply chain management model oriented towards sustainable development.

In summary, globalization and technological innovation are important driving forces for fast fashion supply chain management and business model disruption. Through the disruption and innovation of business models, the fast fashion industry has responded to the complexity and challenges brought by globalization in supply chain management and opened up new possibilities for green transformation. Theoretically, the disruption of business models redefines the creation and delivery of value, offering a fresh research outlook for the industry. From a practical perspective, successful cases in the fast fashion industry have demonstrated the potential of disruptive innovation in optimizing supply chain efficiency, improving environmental protection levels and achieving sustainable development goals. Future research can further explore the application of business model disruption in other fields and how cross-industry collaboration can accelerate the process of green transformation.

5. Discussion

In the context of globalization, the complexity of the fast fashion supply chain poses severe challenges to corporate management. The findings of this study suggest that although globalization has created significant cost advantages and resource optimization opportunities for the fast fashion industry, the impact of long-distance transportation, cross-border coordination, and policy changes has further exacerbated management difficulties. This complexity highlights the importance of supply chain transparency and flexibility. Enterprises need to reduce risks through more refined management, regionalized supply chain layout and the design of emergency strategies. For example, promoting digital supply chain management can effectively improve transparency and responsiveness, thereby helping companies adapt to rapid changes in the global market.

Research shows that business model disruption is the core driving force behind the green transformation of the fast fashion supply chain. Innovations such as digital technologies and circular economy models provide companies with practical means to reduce their environmental footprint and create new market opportunities for them. For example, increasing consumer demand for sustainable products provides a competitive advantage to brands that adopt environmentally friendly materials and recycling technologies[42]. However, a single enterprise cannot accomplish green transformation alone; the entire industry must collaborate to achieve it. From a policy perspective, regulators need to promote corporate investment in sustainable practices through incentive mechanisms, while consumer education is also a key factor in driving demand changes. Although the research confirms the positive impact of innovation on supply chain sustainability, it also reveals significant barriers faced in practice. For example, the high cost of green technology and the lack of unified sustainability standards limit the ability of many companies to make a radical transformation in the short term[43][44]. In addition, there is a fundamental conflict between the traditional fast fashion business model and the requirements of sustainable development. The low-cost, high-efficiency production logic often fails to take into account the long-term goals of green transformation. Companies need to find a balance between profit maximization and social responsibility, while incentive mechanisms and policy interventions can help companies transition to a sustainable model more smoothly.

In the future, cross-industry collaboration will be an important driving force for achieving a comprehensive green transformation in the fast fashion industry. Fast fashion companies can work with technology companies to develop low-cost environmentally friendly technologies, work with suppliers to optimize production processes, and promote the development of sustainable standards through industry alliances. In addition, policymakers should play a more active role in accelerating industry change by establishing carbon taxes, encouraging circular economy models, and providing subsidies for technology research and development. This study theoretically deepens the understanding of the role of globalization and business model disruption in fast fashion supply chain management and enriches the research in the field of supply chain management and sustainable development. From a practical perspective, this article provides clear strategic recommendations for fast fashion companies, namely, enhancing supply chain resilience and competitiveness through digital technology, cross-border collaboration, and green production models. This study is mainly based on public literature and industry cases and lacks in-depth mining of internal corporate operational data. Future research can be combined with field surveys to verify the research conclusions. In addition, with the rapid changes in industry dynamics, research results may face certain timeliness challenges. Therefore, future research can focus on exploring the real-time innovation progress of the fast fashion industry and the applicability of green transformation experiences in other industries to fast fashion.

6. Conclusion

This study explores the profound impact of globalization on the fast fashion industry chain and the key role of business model disruption in promoting green transformation. The study shows that globalization has brought opportunities for resource optimization and market expansion to the fast fashion industry, and it has increased the complexity of supply chain management and triggered major challenges in environmental and social responsibility. To meet these challenges, business model disruption has become a key driving force. Innovations such as digital technology, circular economy principles, and supply chain transparency have provided a new path for sustainable development in the industry.

This study found that the fast fashion industry has not only improved the resilience of the supply chain by adopting sustainable materials, low-carbon production processes, and cross-border collaboration but also enhanced its fit with consumers' growing environmental and social responsibility needs. However, achieving a comprehensive green transformation still faces obstacles such as high costs, insufficient standardization, and resistance to organizational change. Future efforts require a broader collaborative network, policy support, and technological innovation to promote the industry's comprehensive transformation from resource-intensive to sustainable development. This study provides useful theoretical perspectives and practical inspiration for the practice and academic research of the fast fashion industry. Future research should further explore the applicability of cross-industry collaboration models and disruptive innovation in other fields to accelerate the overall green transformation of the industry.

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