Research on the Integration Content of Dual-channel Supply Chain

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ABSTRACT

In order to adapt to the change of market environment, many enterprises have opened up dual-channel to enhance their competitiveness. The integration of dual-channel supply chain focuses on integration of resources using the advantage of online and offline channel. This paper discusses the content of the integration, to seek the key factor to achieve synergies for dual-channel supply chain.

KEYWORDS
Integration, Dual-channel, Supply Chain.

INTRODUCTION

With the rapid development of Internet, manufacturers and final consumers have many contact ways and opportunities. E-commerce is an essential condition for the development of dual-channel supply chain. E-commerce is realized through distribution model of dual-channel. Therefore, more and more enterprises have opened up online direct channels or combined the traditional offline channels with online channels. It forms a competitive relationship between online channels and traditional offline channels. As for manufacturers, they need to adjust the relationship, mitigate the conflicts, and enhance their own profits. In the process of implementing dual-channel, manufacturers need to consider whether one of the channels has any objection to the activity of the other channel, and whether the online channels alienate the retailers of traditional offline channel. Channel conflict will bring trouble to the realization of e-commerce in the supply chain, and become the thorny issue in supply chain management. Therefore, the integration content of dual-channel supply chain has become the key to coordinate competition.

RESEARCH STATUS

Supply chain integration is a collaborative process. Supply chain is a chain structure or network structure which composed of upstream and downstream enterprises. Supply chain management includes the flow of information, logistics and services from raw material suppliers to the final customers. As market competition intensifies, supply chain coordination plays a dominant role in the supply chain strategy in the Internet era [1]. The synergy of online and offline dual-channel supply chain is mainly to coordinate the cooperative activities of all upstream and
downstream alliance

Enterprises in the supply chain [2, 3]. Synergy is the strategic element of the enterprise as well as product market scope, competitive advantage and direction of development. Synergy is the business performance of enterprise groups after a simple summary of business activities, which is generated on the basis of resource sharing among independent components [4, 5]. In the collaborative process, resource sharing includes tangible and intangible resources, and their combine increases the value of the enterprise [6].

Supply chain integration can be described from different dimensions. Internal and external integration are the most common categories [7-9]. External integration includes supplier’s integration and customer’s integration. That is, supply chain integration measures the strategic cooperation and the degree of coordination among manufacturing enterprises and supply chain partners from the three dimensions of supplier’s integration, internal integration and customers integration [10]. Supply chain integration can be described from the four dimensions of strength, scope, duration and depth. There is a close relationship between the four dimensions, and it is very important for the planning and implementation of the project [11]. From a global perspective, the existing mode of supply chain integration can be divided into high equilibrium mode, medium equilibrium mode, low equilibrium mode and outer orientation mode [12].

MACROSCOPIC PERSPECTIVE

(1) The integration of value creation activities in the supply chain operation process

Integration of online and offline channel is not a simple resource optimization configuration, but also a process of mining channel value creation. No matter what strategies and measures enterprises adopt, they all start from the profit of enterprises and social interests. Enterprise profits depend on the efficiency and effectiveness of the supply chain, so that the value creation activities in supply chain operations is particularly important. By taking the form of the first split before integration with the operation process of online and offline dual-channel supply chain. That is to say, we find the main activities to create value through analyze the activities of online and offline supply chain, and then plan the process of actual activities of dual-channel supply chain on the premise of online and offline interaction, finding out the core value-added activities after integration. In the process of splitting, we need to analyze the core functions and main activities of each node enterprises in the supply chain, including the core linkages with upstream and downstream enterprises. Especially the role played in the connection with end users, the way taken, and the effect achieved in the actual activities, and value creation to the whole supply chain are the main content of research and analysis. The integration of activities is the core issue of operation in online and offline dual-channel. Only by mastering its operation mechanism can we effectively grasp the key to the integration content. The integration of the activities of the online and offline channels must be based on the analysis of the channel activities. Online channels can use more mobile terminals to create value, and these activities are not one-way channel activity, they need to interact with the offline channel. Therefore, the integration of supply chain operations is more necessary.

(2) The integration of channel selection factors
The choice behavior of consumers is influenced by their own and external factors. The result of selection has a direct impact on the distribution of benefits between online and offline channels. The main reason for the channel conflict is the unequal distribution of interests. Therefore, the channel selection factors of consumers have a direct relationship with the effect of channel integration. Research on the channel selection factors of consumers will help to integrate the enterprise activities related to the factors and invest more capital in these activities in order to guide the consumers’ behavior and weaken the conflicts among channels. The factors that affect consumers’ choices vary from online to offline, and there may be conflicts. Take searching for information for example, online channels have a strong and convenient source of information, consumers search information through the online channel so that they can compare offline retail prices, product matching and other information, and then select the offline channels to purchase. This is a typical free-riding behavior. Information service itself is a kind of cost input. When the online channel invests a certain amount of cost, it serves the retailer that meets the conditions in offline channel and causes loss of profit to the online channel.

(3) Benefits compensation between manufacturers and retailers

It is not absolute that manufacturers open up online channels for the retailers’ interests. Online channels can have a synergistic effect on the offline channels. There is no absolute threat for retailers’ interests after manufacturers opening up online channels. Due to lower wholesale prices, the appropriate adjustment of price can increase the overall revenue of online and offline dual channels [13-16], and it may motivate retailers to improve their service levels in addition [17]. Dual-channel supply chain is characterized by that manufacturers compensate retail channels for the loss of interest through providing order to retailers in a certain percentage. Therefore, in the process of dual-channel integration, a set of scientific and effective compensation mechanisms need to be established in order to safeguard the interests and long-term relationships between retailers and manufacturers. In addition, it is conducive to manufacturers to make a reasonable distribution of benefits, eliminate the loss of traditional channels’ profits caused by online channels, and further improve the integration of dual channels.

(4) Interactive experience

Consumers pay more attention to interactive experience in the process of consumption. Subjective feeling in the process of experience is one of the important factors affecting the product loyalty and channel preference. Online experience in the internet environment is a virtual experience. Offline channel has physical environment which can give real experience to consumers. Virtual experience can attract consumers to get preliminary understanding, stimulate their interest in the product, and then go further experience in offline channel. Virtual experience in online channel can generate additional products and services, the brand value of the product and the value of the annex is undoubtedly a bonus. It also can improve customers’ loyalty, and further improve sales in offline channel. Virtual experience in online channel can provide an information feedback platform for customers. And any information reflected in the experience process can enhance the service of actual experience in offline. Through the integration of interactive experience in online and offline, it is not only to meet the needs of the consumers, but also enhance the experience services of each other.
MICRO PERSPECTIVE

(1) Products
Product integration is to achieve the consistency of products in online and offline. Now, many enterprises in order to maintain the interests of the retailers and ensure sales, especially in the clothing industry, general brand will update product slower in online channel than offline channel. The product variety is not complete, and most of the products are mainly over season in online channel. Product consistency also includes the assurance of product quality, to avoid manufacturers produce different quality products because of different channels and different cost. Consumers generate shopping intention through the actual experience of offline channel, pay for products through online channel, and then products reach consumers through the online channel. Therefore, the quality of products obtained from online channel that are required to be consistent with the offline channel, to reduce the risk of non-standard behavior.

(2) Services
The integration of services obtained from online and offline is to ensure the consistency of added value. Weaken the prejudice of channel selection due to different service quality caused by different channels, reducing the impact factors of service quality. Online services are information consulting, screening and matching. Offline services can provide more direct professional advice, sensory experience. How to make consumers feel the balanced additional value from different channels, it need manufacturers to provide the service that best suits the preferences channel by using the advantages of online and offline. Eliminating service differences in online and offline channel from the subtleties, it aims to balance the respective advantages of dual channels, weaken the effect of service gap on the channel conflicts [18].

(3) Pricing
When the enterprises develop to certain mature period, it can reduce the operating costs with the online platform. Therefore, the prices of online are lower than the offline. There are also enterprises that are trying to attract consumers’ attention with lower prices at the early stage of online channels. However, the blind price reduction is not a long-term strategy for the development of enterprises. The operation costs of online channel in the pioneering period and development are also limited. The fundamental of developing enterprise is to reduce the operating costs from the actual operation to achieve the real low price. Different ways of operating result in different operating costs and different price of products. In order to weaken the conflict of products’ prices in different channel, we need an effective pricing strategy and compensation mechanism for pricing integration to seek an optimal price interval value through the online-offline interaction and balance benefits of online and offline.

(4) Order allocation
After the manufacturer develops new online channel, the sales of original channel will be affected whether the dual-channel is synergistic effect or nibbled effect. It will either increase sales of the whole supply chain, including retailers or increases sales of supply chain, decreases sales of retailers, or maintains the sales of supply chain but the sales of retailers become lower for distribution of online channels, and even worse than online channels. Therefore, in order to motivate suppliers to participate in the supply chain activities and maintain cooperative relationships, we must consider balancing benefits of online and offline and formulate a set of distribution mechanism
that conforms to the development status of enterprise and the actual market competitiveness to ensure the healthy competition among retailers and the entire supply chain.

(5) Inventory

Manufacturers need to adjust the inventory of the entire supply chain to maximize the weakening of the bullwhip effect when they open up online and offline channels at the same time. Different inventory models of supply chain are dominated by different node enterprises, such as centralized inventory controlled by manufacturers, the retailer's product quantity is controlled and shipped by the manufacturer. Or inventory controlled by retailers, inventory of online and offline are managed by retailers. In addition, it can take inventory allocation management according to the different principles, that is offline and online channel have their own inventory management agencies and systems, running separately. In the process of dual-channel integration, it is necessary to make the lowest cost and the most conducive to synergy inventory mechanism.

(6) Logistics

Most of the logistics activities of offline channel occur in the upstream enterprises. Consumers can purchase directly in traditional channels with the experience of physical stores, eliminating the logistics. Online channel is using online platform to sale, so the downstream logistics is essential. However, with the integration of dual channels, the control of costs and the interaction and coordination of online and offline channels, logistics activities occupy an indispensable important position for the control of costs, interaction and coordination of online and offline. Whether purchased online or offline, it must rely on logistics to deliver products to customers. The distribution mode, the address of allocation and the coordination of the warehouse are the problems to be considered when integrating logistics [19].

CONCLUSION

In reality, supply chain management is already a sufficient and necessary condition for sustainable development of enterprises. Through the integration of supply chain, resource sharing and information integration of enterprises in the supply chain can be effectively strengthened. The ultimate goal of adopting a multi-channel is to better cater to the purchasing motivations of different consumers. By providing multi-channel choices for consumers, it can create healthy competition, increase customer base and increase consumers’ loyalty. In order to achieve the optimal integration of the dual-channel supply chain, it is necessary to conduct a comprehensive analysis from both inside and outside of supply chain so as to give full play to the reinforcing effects caused by the diversity and richness of the channels and avoid the negative effects of the eroded effect and achieve the optimal status.

ACKNOWLEDGEMENTS

Xiaolan Hu is the corresponding author. This paper is supported by PhD project of Wuhan Business University (2017KB012).
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