

Research on Retail Channel Fees based on the Perspective of Bilateral Markets

Yangqi Liu

College of Economics, Jinan University, Guangzhou 510000, China

Abstract

With the development of productivity and the fierce competition in the retail industry, there has been a long dispute between large retailers and suppliers over slotting allowances. The slotting allowances has become an important source of profit for large retailers, but this does not mean that the existence of the slotting allowances is unreasonable, nor does it mean that the slotting allowances will reduce the social welfare. This paper attempts to study the issue of retail slotting allowances by taking a new theoretical framework—two-sided markets theory. In this paper, the rationality and formation mechanism of the slotting allowances are explained through two-sided markets theory. On this basis, the theoretical model method is used to derive the slotting allowances pricing model. Finally, it proposes regulation on the abuse of retail slotting allowances. The retail slotting allowances stems from the cross-network externalities that users obtain on platform. It is the performance that large retailers platform internalize the cross-network externalities under the vertical industry constraint mechanism. The slotting allowances is reasonable within a reasonable amount, but effective regulation on the abuse of slotting allowances is required.

Keywords

Two-sided markets; Retail slotting allowances; Cross-network externalities; Pricing strategies.

1. INTRODUCTION

In recent years, in the increasingly competitive retail industry, the issue of large retailers charging access fees to suppliers has received widespread attention and controversy. At the same time, this is also the point of conflict between large retailers and suppliers. On the one hand, in the highly competitive retail industry, large-scale retailers adopt platforms and low-price strategies to attract consumers, which makes the profits of large-scale retailers continue to decline, and the retail industry has become a small-profit industry. Therefore, the act of collecting channel fees from suppliers is a means for large retailers to make up for their own operating costs and profit losses. At the same time, in the context of the rapid development of productivity and the homogenization of goods, the shelf resources of large retailers are a limited "commodity" that suppliers compete and rob, and the channel fee is the price at which suppliers purchase this resource. On the other hand, in real life, suppliers are heavily oppressed by the dominant market position of large retailers, and high channel fees make suppliers' profits drop. Therefore, in the context of such economic problems, this article will conduct research on retail channel fees as the research object.

This article attempts to use the bilateral market theory to study retail channel fees. Most previous scholars studied the issue of channel fees from the theories of "market power" and "efficiency improvement", but this article re-examines this issue from the perspective of bilateral markets in the theory of industrial organization, and analyzes the impact of large

retailers that meet the characteristics of bilateral markets. The rationality of the behavior of the supplier's charging of channel fees reveals the formation mechanism of channel fees under the framework of the bilateral market and the pricing strategy of channel fees, and proposes effective regulatory suggestions for the abuse of channel fees in the bilateral market.

2. LITERATURE REVIEW

Foreign research on bilateral markets and retail channel fees predates China. The following is the current status of foreign research. (1) Research on bilateral markets. Rochet and Tirole (2002) established a model to study the relationship between price elasticity and bilateral market pricing, and pricing is directly proportional to price elasticity. Mark Armstrong (2002) studied competitive platforms to discuss what factors determine which side of the platform companies will subsidize, and whether such subsidies are effective from a social perspective. After the establishment of the theoretical model, Armstrong concluded in the two-party single-homing model: platform companies will spend a lot of money to attract the more competitive side in the market and the side that can generate more cross-network externalities; The conclusion is drawn from the model where one party is single-homed and the other party is multi-homed: In a competitive market where the coefficient of difference tends to zero, the platform company will choose the number X of the multi-homed side, so that the cost function $C(X)$ is equal to the revenue function $R(X)$ Achieve balance. Bernard Caillaud and Bruno Jullien (2003) believe that the core of the business strategy of Internet platform companies is to use transaction fees. They usually adopt a divide and conquer strategy, that is, one side gives subsidies and the other makes profits. In a highly concentrated market structure, user externalities can be better protected, and market concentration does not necessarily lead to low efficiency. (2) Research on retail channel fees. Greg Shaffer (1991) believes that the most significant feature of retail channel fees is that the collection of fees does not change with subsequent retail sales. He believes that resale price control and shelf competition are consistent, and the rental cost of shelf space leads to an increase in retail prices and corporate profits; he sorts the benefits through the model and finds that compared with resale price control, retail channel fees The benefits are lower. Paul N. Bloom, Gregory T. Gundlach and Joseph P. Cannon (2000) summarize the views of the two schools of retail channel fees—the efficiency school and the market power school. The efficiency school believes that channel fees improve the efficiency of retail distribution. Tools, the market power school believes that channel fees are a mechanism to disrupt competition. Through a questionnaire-style empirical survey of the managers of manufacturers, retailers and wholesalers, it is found that the managers of manufacturers and retailers agree with the views of the two schools of thought, and it is not that the retailer agrees with the efficiency school to make The businessmen agree with the market power school. Paul N Bloom (2001) studied the changes brought by retail channel fees and trade promotion to the tobacco industry's sales and policies. Through literature review, telephone interviews and analysis, it is concluded that tobacco companies pay retail channel fees to retailers and trade promotions, which enables the tobacco industry to have a better display platform and point of sale advertising.

Yang Chao (2010) uses theoretical models to study the competitive strategies of large retailers and their influencing factors. He believes that the competitive strategies of large retailers are the result of maximizing profits. They usually give preferential treatment to consumers with large network externalities and charge high channel fees to suppliers, which is no loss to the general welfare of society. Yes, the government has no need to intervene. Zhang Yao (2012) uses a combination of quantitative data analysis and theoretical analysis to put forward the "network externality surplus hypothesis" of the source of channel fee value, that is, the channel fee can only be derived from the surplus of cross-network externalities created by retail platforms for suppliers. Xiong Manhong (2013) used theory and mathematical model

methods to propose that market structure will affect the economic effect of channel fees. The government should regulate the form and amount of channel fees on the basis of acknowledging the rationality of channel fees. Yang Xu (2013) established a mathematical model to study the formation mechanism and pricing mechanism of retail channel fees in a two-sided market through variable and expressive reasoning. Retailer platformization is the root cause of channel fees. On which side of the platform the competition is fierce, the retailer will pay attention to which side. Zhancheng (2014) established a bilateral single-homing platform model and a supplier multi-homing model through theoretical models and empirical analysis. Platform companies charge retail channel fees to reduce the level of welfare for suppliers, consumers and society as a whole.

3. ANALYSIS OF THE CHARACTERISTICS OF THE TWO-SIDED MARKET OF LARGE RETAILERS

3.1. Reasons Why Large Retailers Present the Characteristics of Two-sided Markets

With the development of the economy and the improvement of people's living standards, people's consumption has become more and more modern, which makes large retailers take advantage of the trend to become a typical bilateral market, showing the characteristics of a bilateral market.

3.1.1 Experiential Consumption Has Become An Important Demand of Modern Consumers

In today's society, consumers no longer only pay attention to the product itself during the shopping process, but pay more and more attention to the consumer experience. Today's large retailers play an important role in it. Traditional small and medium-sized retailers generally only have the function of distribution, but large-scale retailers can provide consumers with experiential services while distributing products. Experiential consumption can also be created through some special themes and activities. For example, on the occasion of Christmas, many large retailers not only concession consumers in price, but also create distinctive Christmas themes in the shopping environment to attract consumers. , Thereby increasing the flow of people in the mall, increasing sales and profits. The demand for experiential consumption has given large retailers the characteristics of a bilateral market, making it an integrated trading platform and venue.

3.1.2 Large Retailers Create A Sense of Belonging to the "Community" for Consumers

Outside of home and workplace, people need a third space to release emotional pressure and find a sense of identity. In ancient times, tribes relied on blood relationship and social structure to exist, while in modern society there is a phenomenon of "new tribes". Compared with traditional tribes, "new tribes" are more lacking in stability and have more blurred boundaries. They only rely on common spirit and values to maintain development. People's belonging to "new tribes" is not single and short-lived. For example, in the small and medium-sized retail industry, there are also some community tribes specially created for "literary youth" and "influencers". These community tribes that arouse consumer belief and emotional resonance are integrated with business. Public places in modern society have gradually lost their previous function of gathering the public. Instead, commercial places have become "communities" where the public settled. Consumers are more willing to combine their emotional beliefs with consumption and shopping to find a new sense of belonging . Large retailers are playing an important role in this "community" stage. Consumers increasingly regard large retail venues as their new places to stay and relax. Therefore, while large retailers create a sense of belonging to consumers in the "community", they have evolved into a bilateral market that is extremely attractive to consumers and users, bringing great positive externalities to the platform's supplier users.

3.1.3 "One-stop" Shopping Brings Convenience to Modern Consumers

Large retailers are in a comprehensive business format in the evolution of retailers, so "one-stop" shopping methods become possible. In the fast-paced and convenient life atmosphere, consumers are also pursuing a fast and convenient way of consumption when shopping. For example, the retail format of shopping malls has integrated large supermarket chains, clothing brand stores, convenience stores, amusement parks, restaurants, etc., so that consumers can satisfy all kinds of food, drink, and entertainment in a specific area and a certain time range. Consumer demand. Moreover, large retailers have turned the retail space into a space that allows consumers to escape from reality and enter the imagination, making it a theme and paradise development. Therefore, large retailers have become an effective medium for displaying the differentiated products of suppliers, and customers who stay here become the audience for product display.

3.1.4 Individualized and Diversified Consumer Demand Contribute to the Value Industry Chain Network

Traditional consumer demand is single and homogeneous. The value industry chain presents linear characteristics. The upstream to downstream of the industry chain are manufacturers, retailers, and consumers in sequence. Consumers produce a certain kind of demand, which is transmitted to retailers and ultimately to manufacturers through a linear industrial chain. Nowadays, consumer demand has shown the characteristics of individualization and diversification. Consumers' needs are no longer single but diverse. For example, consumers need services while purchasing goods. Therefore, individualized and diversified consumer demands have made the traditional value industry chains intertwined, forming a new value industry chain network. In the value industry chain network, the various needs of consumers are intertwined. Large retailers can serve as the carrier of the value industry chain network to meet the various needs of consumers, providing goods and services at the same time.

3.1.5 The Introduction of Information Technology Has Improved the Efficiency of the Retail Industry

The combination of electronic information technology and the retail industry has brought huge changes to the development of large retailers. For example, the POS point of sale intelligence management system has improved the efficiency of the retail industry and created technical conditions for large retailers to expand their scale. In the information age, large retailers can quickly and quickly feel consumer changes and market trends through information technology, thereby guiding the production of the entire industry. The introduction of information technology into the retail industry has not only improved the efficiency of the retail industry, but also brought large retailers closer to consumers, becoming a platform for information transmission and guidance.

3.2. Economic Analysis of the Characteristics of Large Retailers' Bilateral Market

3.2.1 Platform Enterprise Structure

There are three market entities in the two-sided market, namely A-side users, B-side users and platforms. Side A users and Side B users obtain their respective benefits through interactive transactions on the platform, while the platform charges users fees to maintain its own development and achieve profitability. In the circulation channels of commodities, upstream suppliers and downstream consumers are users on both sides of the large-scale retailer's bilateral market. Large-scale retailers provide commodity distribution channels for suppliers and provide consumers with commodities and services. In the wholesale market, large retailers are the buyers of suppliers; in the retail market, large retailers are the sellers of consumers. Suppliers wholesale goods to large retailers, earning the difference between the wholesale price and cost to make a profit; consumers buy products distributed by large retailers and obtain

utility through the consumption of products and services; large retailers are doing Users of both parties charge a fee to both parties to make a profit when creating a convenient trading platform.

3.2.2 Cross Network Externalities

Among the above, modern consumption is the reason why large retailers have the characteristics of a bilateral market, and large retailers have a strong ability to gather customers, which is an important factor in the existence of cross-network externalities. The ability of large retailers to gather customers will change with factors such as brand influence, scale of operation, and industry competition. After large-scale retailers adopt various price or non-price strategies, large-scale retailers can attract a large number of consumers to shop and spend in retail places, and consumers have a strong preference for large-scale retailers; therefore, the expansion of consumer users brings cross-cutting Network externalities have caused a large number of suppliers to participate in large retailer platforms; the increase in the scale of supplier users on the platform has brought cross-network externalities, and consumer users have further increased, and finally reached a state of positive feedback. By analogy, the scale of users on both sides continues to increase, and the scale of large retailers' platforms has also continued to expand, reaching economies of scale. Large retailers' operating costs have fallen, profits have increased, and cross-network externalities have been internalized.

3.2.3 Non-neutral Price Structure

In order to achieve greater user scale and transaction volume, platform companies usually formulate asymmetric and inclined price strategies based on the nature of the platform. Usually, platform companies adopt a low-price or even free subsidy pricing strategy for users with a large cross-network externality coefficient, so as to attract users from the other side to participate in the platform, and the scale of the bilateral market will become larger and larger. Sexual increase forms positive feedback. In the two-sided market of large retailers, consumers generally adopt free or even subsidy measures, while suppliers charge certain channel fees or entry fees to make up for platform operating costs and even profits. For example, large-scale supermarket chains generally adopt a daily and low-price strategy to benefit consumers, and they charge higher channel fees to suppliers. The global e-commerce giant Amazon adopts the principle of customer first and charges merchants with varying degrees of platform fees.

4. REGULATION OF RETAIL CHANNEL FEES IN BILATERAL MARKETS

4.1. Strengthen and Improve Laws and Regulations Governing Channel Fee Abuse

There are constant disputes between suppliers and retailers on the issue of passage fees. From the perspective of the national government, it is necessary to regulate and control the abuse of passage fees from the legal source. Western countries paid more attention to this issue earlier than China, and anti-monopoly legislation and justice have been seen everywhere. In recent years, China has also taken certain measures against channel fee abuse, but relatively speaking, China's laws and regulations for retail channel fee abuse are relatively lacking and incomplete. Moreover, in China's past laws and regulations, there have been problems of emphasizing form over substance, and fairness over efficiency. Therefore, China should strengthen and improve the laws and regulations governing the abuse of passage fees, giving priority to efficiency and giving consideration to fairness and transparency, so as to effectively maintain market order.

4.2. Acknowledge the Rationality of Channel Fees in the Bilateral Market and Divide the Quota Reasonably

Based on the above analysis and elaboration, the existence of channel fees is reasonable under the framework of the bilateral market, and has its foundation and necessity. It originates from cross-network externalities and becomes a source of profit for platform companies. If the

government adopts banning and prohibition of channel fees, on the one hand, this is a violation of the inherent model of bilateral platform development, making the profits of large retailers greatly reduced and difficult to survive, and at the same time harming the welfare of suppliers and consumers; on the other hand, In actual operation, large retailers will still adopt "countermeasures" to charge passage fees in disguise, which undoubtedly makes the government's laws and regulations useless. Therefore, the government's policy formulation should be based on the recognition of the rationality of the passage fee. The government should aim at stimulating market vitality and promoting the healthy development of bilateral markets, and reasonably divide the channel fee quota according to certain quantitative standards (such as the supplier's market share), while taking into account product types, regional development and other factors. It not only guarantees the normal profits of large retailers, but also stimulates suppliers of different sizes to participate in interactive transactions with consumers on the platform.

4.3. Strengthen the Role of Industry Associations and Promote Healthy Competition in the Retail Industry

With the rise of third-party organizations and business industry associations, their role and position in the development of the industry are becoming more and more important. The government generally adopts economic, legal, and administrative measures to control the development of the industry at a macro level. However, because the government does not really understand the actual development of the industry, it is difficult to formulate a truly suitable industry competition. Development policy. Therefore, the role of industry associations has also emerged. Industry associations can act as a bridge between retailers and suppliers and build a platform for both parties to communicate and communicate. This will facilitate the full flow of industry information and improve the efficiency of the industry. Due to the professional nature of industry associations, it is often better than the government to understand the development of the industry, and can keenly capture the abuse of dominant positions in the industry. Therefore, the government should strengthen the role of industry associations and adopt the method of cooperation with industry associations. Work together to promote healthy competition in the retail industry.

4.4. Build Multiple Bilateral Markets and New Business Models

What we generally call a two-sided market usually involves the platform and users on both sides of the platform. The platform maintains profitability by pricing the flowers on both sides; but when the new business model is integrated into the two-sided market, there are multiple Bilateral market. For example, if you look closely at today's shopping malls, there are a dazzling array of goods in the shopping malls, which serve as a retail transaction platform for suppliers and consumers; at the same time, there are colorful window designs on the outer walls of its large buildings. At that time it acts as a media platform for advertisers and audiences. In this way, the shopping mall has become a comprehensive commercial platform with both a media platform and a retail transaction platform, with multiple bilateral markets. Under this structure of multiple bilateral markets, the profit sources of platform companies have become diversified, and the proportion of channel fees has decreased, so the abuse of channel fees will be regulated accordingly.

4.5. Leap from Bilateral Markets to Platform Ecology

The contradiction between suppliers and retailers on the issue of retail channel fees and the welfare impact on consumers is essentially a zero-sum game. Suppliers, retailers, and consumers allocate given externalities, and the amount of channel fees determines the distribution of benefits. To regulate the abuse of retail channel fees, this benefit cake should be fundamentally broken, and large retailers should move from a two-sided market to a platform

ecology. The development direction of large-scale retailers should extend both horizontally and vertically. Vertically, the industry chain is constantly approaching both ends of manufacturers and consumers, while horizontally, it is to break regional restrictions and expand in chains. The value creation of the platform ecology can break through the value creation of bilateral markets and increase the welfare of suppliers, consumers and large retailers themselves.

5. CONCLUSION

In the increasingly competitive retail industry, the issue of large retailers charging access fees to suppliers has received extensive attention and controversy. At the same time, this is also the point of conflict between large retailers and suppliers. On the one hand, in the highly competitive retail industry, large-scale retailers adopt platforms and low-price strategies to attract consumers, which makes the profits of large-scale retailers continue to decline, and the retail industry has become a small-profit industry. Therefore, the act of collecting channel fees from suppliers is a means for large retailers to make up for their own operating costs and profit losses. At the same time, in the context of the rapid development of productivity and the homogenization of commodities, the shelf resources of large retailers are a limited "commodity" that suppliers compete and rob, and the channel fee is the price at which suppliers purchase this resource. On the other hand, in real life, suppliers are heavily oppressed by the dominant market position of large retailers, and high channel fees make suppliers' profits drop.

REFERENCES

- [1] Rochet J C, Tirole J. Defining Two-Sided Markets[J].2004.
- [2] Caillaud, Jullien. Chicken&Egg: Competition among Intermediation Service Providers[J]. The RAND Journal of Economics, 2003, 34(2):309~328.
- [3] Weisman D, Kulick R B. Price Discrimination, Two-Sided Markets, and Net Neutrality Regulation[J]. Social Science Electronic Publishing, 2010, 13.
- [4] Shen Y. Platform retailing with slotting allowance and revenue sharing[J]. Journal of the Operational Research Society, 2017(8):1~13.
- [5] Ren F. Research on slotting allowance decision in the two-echelon supply chain with retailer-led[C].International Conference on Logistics Systems and Intelligent Management. IEEE, 2010:25~29.
- [6] Xiong Yan. The Bilateral Market Theory of Industrial Organization——A Literature Review[J]. Journal of Zhongnan University of Economics and Law,2010(4):49~54.
- [7] Zhan Cheng. Research on the Welfare Effect of Retailers Price Discrimination Based on the Perspective of Bilateral Markets[D]. Jiangxi University of Finance and Economics, 2014.
- [8] Li Fei, Hu Saiquan, Zhan Zhengmao. The formation mechanism of retail channel fees: a multi-format and multi-case study based on the Chinese market context[J]. China Industrial Economics, 2013(3):124-136.
- [9] Qu Zhentao, Zhou Zheng, Zhou Fangzhao. Competition and regulation of e-commerce platforms under network externalities: a study based on the theory of bilateral markets[J]. China Industrial Economics, 2010(4): 120~129.
- [10] Yang Xu. Research on the generation mechanism and pricing mechanism of retail channel fees under the framework of bilateral markets[D]. Dongbei University of Finance and Economics, 2013.
- [11] Zhang Yao. Research on Price Discrimination of Retail Platform Enterprises in Bilateral Markets[D]. Shenyang University of Aeronautics and Astronautics, 2013.

- [12] Ma Nili. Analysis of Causes of Channel Fees in Retail Industry[J]. Enterprise Research, 2011(16):21~23.
- [13] Hu Xueqing. The definition, rationality and pros and cons of "passage fee"[J]. Shanghai Economic Research, 2008(8): 50~56.
- [14] Yue Zhonggang, Zhao Bo. Research on Channel Fees Based on the Perspective of Bilateral Markets[J]. Journal of Shanxi University of Finance and Economics, 2008, 30(7):12~16.
- [15] Zuo Wenjin. The formation and pricing strategy of channel fees under the framework of bilateral markets[J]. Business Times, 2017(10):24~26.
- [16] Song Shendong. Research on Channel Fees and Regulations Based on the Perspective of Bilateral Markets[J]. Economic Perspective, 2013(18): 73~75.
- [17] Xie Peihong, Chen Dejin. Review and Prospects of Research on Profit Models of Channel Fees for Large Retail Platform Enterprises[J]. China Circulation Economy, 2016, 30(6):75~82.
- [18] Sun Dianguo. Large-scale retailers dominate the two-sided market operation mechanism of shopping mall retail formats[J]. Journal of Hebei University of Economics and Trade, 2015, 188(1):102~106.
- [19] Yang Zhenying. Analysis of Retailer Channel Fee Regulation Based on Bilateral Market Theory[J]. Times Economics and Trade, 2013(7):52~53.