# Strategic Analysis and Financial Analysis of the Corporation in the Internet Retailing Industry--Taking Pinduoduo as an Example

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Abstract: As information technology develops rapidly, people's lifestyles have also changed, especially their consumption patterns. A noticeable change is an increase in the proportion of online shopping in consumption, which to a large extent has led to the development and prosperity of the online retail industry. This paper takes a rising company, Pinduoduo, as an example. Firstly, this study focuses on strategic analysis, utilizing PEST and SWOT models to anatomize the external and internal environment for the company. Secondly, the paper analyzes its financial situation, including profitability and solvency. Finally, this essay makes reasonable predictions about the industry's future development and makes corresponding suggestions for Pinduoduo based on prospects. This paper could contribute to Pinduoduo and the whole industry by promoting the operations and performance of the corporation and providing lessons for companies in the industry.

### 1. Introduction

# 1.1 Industry Overview of the Internet and Direct Marketing Retail Industry

In recent years, due to the development of information technology and changes in consumer consumption behaviors, traditional retailers have faced more challenges (Piotrowicz, Cuthbertson, 2014). Moreover, they tend to integrate the Internet into their value chain (Reinartz, Wiegand & Imschloss, 2019). Therefore, the Internet and direct marketing retail industry, which offers retail services based on the Internet, television, and online e-shop, has proliferated. The most apparent evidence lies in the change of S&P Composite 1500, which is an effective measurement covering approximately 90% of U.S. market capitalization. Based on 1995, the S & P Composite 1500 Internet and Direct Marketing Retail Index increased 83 times by 2020 (from 0.06% to 5.00%). In addition to market share, the industry's market value had significant growth over the past 15 years. The S&P Composite 1500 Internet & Direct Marketing Retail index implies that the market capitalization has experienced a more than 400-fold increase from 1995 to Nov 2021[1-3], from 3.8 to 1562.75 billion. At the same time, the average general market has witnessed a six-time growth of other industries. It shows that the Internet and Direct Marketing Retail industry's development was far more than the average performance in the last 15 years. Among the top 10,000 companies, the Internet and Direct Marketing Retail industry contained 416 constitutes, based on the financial data exposed on S&P Capital IQ, which was updated on 10th November 2021. As can be seen from the disclosed financial data, the industry has a high concentration. Despite numerous existing companies, the top 15 companies by market capitalization collectively account for 89.5 percent of the market (\$3393542.6 million of \$3791640.6 million). This market situation reflects that market competition mainly exists among giant companies. Due to the highly concentrated market share, it is difficult for small and start-up companies to survive and develop in this industry [4-6].

# 1.2 Company Overview of Pinduoduo

Pinduoduo Inc. (Nasdaq: PDD) is one of China's most popular e-commerce companies based on the mobile Internet. Pinduoduo Inc. operates an e-commerce platform in the People's Republic of China through its subsidiaries. The company operates Pinduoduo, a mobile platform that offers a range of products, including apparel, shoes, bags[7-9], childcare products, food and beverage, fresh produce, electronic appliances, furniture and household goods, sports and fitness items, and auto accessories. The company was formerly known as Walnut Street Group Holding Limited and changed its name to Pinduoduo Inc. in July 2018. Pinduoduo Inc. was incorporated in 2015 and is headquartered in Shanghai, the People's Republic of China, and the funder was Mr. Huang Zheng. Furthermore, in March 2021, the company board announced that Mr. Chen Lei would become the company's president. So far, Pinduoduo's employees have exceeded 7 thousand. In Q3 2016, the annual active users exceeded 100 million, and this number grew more than 200 million in Q1 2017 and more than 300 million in Q1 2018. And based on the financial report of Q2 2021, the average monthly active users in this quarter was 738.5 million. Due to the fierce competition and features of the industry, Pinduoduo has not gained profits since its startup[10-11]. However, the net loss has a decreasing trend, suggesting a promising future. Furthermore, according to the Q2 report 2021, net income attributable to ordinary shareholders in the quarter was RMB 2,414.6 million (US\$ 374.0 million), compared with a net loss of RMB 899.3 million in the same quarter of 2020[12].

# 2. Strategy Analysis

# 2.1 PEST Analysis

Sammut-Bonnici and Galea (2014) have mentioned that PEST analysis is an inclusive method to summarize and describe macro-environment factors for a company, including political, economic, social, and technological. In business planning, based on the conclusions of PEST analysis, companies can fully identify opportunities and threats in the macro environment and make adjustments to strategic planning and business strategies accordingly. And its value lies in providing a basis for judgment of trends, opportunities, and challenges for corporate strategy makers [13].

## 2.1.1 Political

At the Central Economic Work Conference in 2015, the Chinese government announced that supply-side reform would become the focus of economic work in 2016 (Guo, Li, 2018). Meanwhile, a series of policies were introduced, including reducing overcapacity, inventories, and leverage, lowering costs, and supplementing areas of weakness. All of these policies and regulations promote the development of Pinduoduo. The vast majority of merchants selling on the Pinduoduo platform are third-tier and fourth-tier merchants with small size and lack of marketing ways, whose problems of excess capacity and excessive inventory are severe. Furthermore, as they can not survive on Taobao (which has been dominated by famous merchants), they have to find new developing opportunities, for which Pinduoduo provides a good platform [14].

### 2.1.2 Economic

Under the influence of upgrading consumption structure, many firms and innovative entrepreneurs focus on developing high-end industries while ignoring the necessity of low-end industries and the needs of low-end products with lower prices. Another factor is that, according to Liang (2010), as most Chinese live places, small and middle-sized cities have massive demand and unlimited potential. Most Chinese are willing to tolerate delayed shipments and uneven quality for saving money. In addition, although residents' total income in small cities and towns is not as high as that of big cities, their incomes are rising gradually compared with the past period. More

importantly, it is notable that a load of living and buying an apartment is less heavy than that of big cities. Therefore, all these factors lead to a rise in disposable income, which positively correlates with quantity demands.

### **2.1.3 Social**

Studies have shown that the pace of life has increased in recent years. Consequently, people have less leisure time to do physical shopping and prefer the online one. To save time, they have shown a preference for online shopping, and recent years have witnessed a steady increase (Liew, JosephNg, Eaw & Phan, 2020). Additionally, as the educational level increases gradually, there is a noticeable growth of the population who can use the Internet. Therefore, it provides a population foundation for online retailing business.

# 2.1.4 Technological

Firstly, the development of logistics shortens shipping time dramatically, ensuring that customers do not have to wait for a long time. Then, the Internet is becoming increasingly popular in recent twenty years. Thus the ever-increasing population of smartphone users also enlarges the user base. Moreover, the information system and database based on the Internet not only assists sellers in managing their inventories and evaluates their performance but also enlarges the scope of choices for potential buyers.

# 2.2 SWOT Analysis

The SWOT analysis method is a scientific analysis method used to determine the company's competitive advantages, competitive disadvantages, opportunities, and threats, thereby organically combining the company's strategy with the company's internal resources and external environment.

# 2.2.1 Strength

### 2.2.1.1 Concise, targeted users

At the beginning of the Pinduoduo business, it correctly analyzed the Chinese e-commerce market and found the best opportunity to enter the competitive market. The earliest targeted customers are low-end consumers in third- and fourth-tier cities. There is still a big difference compared with Taobao's young and fashionable consumers. Additionally, JingDong is mainly for men and office workers to select electronics. Pinduoduo's particular customer target makes it easy for Pinduoduo to emerge in the domestic e-commerce market, ahead of C2C business platforms like Vipshop and Suning.com that ignore low-end markets.

### **2.2.1.2** Lower price

Pinduoduo favors spontaneous sharing and group purchasing, leading to a lower price. Pinduoduo is a pioneer and leader in e-commerce in China, which creates a new customer growth model through voluntary buyer advertising.

#### 2.2.2 Weakness

# 2.2.2.1 Unwarranted quality of goods

To rapidly boost the number of users, Pinduoduo need to lower the entry requirements to attract merchants from various industries to join with a low cost of opening a shop. Additionally,

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merchants have different levels of business values, which may cause commercial credit problems. For example, some sellers who are lack business ethics sacrifice their integrity and sell fake goods to maximize their profits, which significantly discourages consumers from shopping on the platform. At the same time, sellers with the integrity of the business would be negatively affected because of the terrible shopping experience. Consequently, consumers might lose shopping confidence.

# 2.2.2.2 Low profits

In the field of e-commerce, Pinduoduo does not act as a pioneer. It can only rely on model innovation to break market obstacles and compete against robust competitors. Furthermore, most of Pinduoduo's transactions come from low-end consumers who are less financially powerful and more sensitive about commodities costs. Pinduoduo has to strictly follow the low-price model and invest a significant amount of money in the market for continuing stable growth of active customers. Furthermore, Pinduoduo has been unprofitable since going public, which has hampered its development.

# 2.2.3 Opportunity

# 2.2.3.1 Government support

Chinese governments have repeatedly mentioned in the reports (Yue, 2017) that China should actively develop e-commerce, take steps to realize zero inventory, zero waste, zero additional transaction costs, and establish a way of barter based on the Internet of Things and then enter into a new era of e-commerce. This step implies that it has realized that offline transactions can not meet consumer demands from the government level. Thus, online or mobile network transactions are the inevitable choice.

# 2.2.3.2 Development of mobile technology

The popularization of mobile equipment has brought the development foundation for online shopping in China (Zou, 2019). People in small cities and remote areas can also shop via mobile phones, and the number of users of e-commerce platforms is multiplying.

# **2.2.4** Threat

# 2.2.4.1 Strategy can be copied

Scholars (Li and Tran, 2021) have pointed out that in the Internet and direct marketing retail industry, Pinduoduo has many competitors, including several mature platforms such as Taobao, JinDong, and Tmall. These platforms have a significant users base and financial wealth, so they can occupy the market by emulating Pinduoduo's low-price strategy.

# 2.2.4.2 Lack of supervision system

When it comes to e-commerce, Pinduoduo and the Chinese government have not introduced a complete regulation system and still need time to go through the process, even though the E-Commerce Law of China has been introduced (Hong, 2020). When contradictions occur, they are usually solved by negotiating between two parties. Moreover, there is a lack of reference to the relevant laws.

# 3. Financial Analysis

# 3.1 Profitability Measure

In order to measure profitability, this paper study selects Gross Margin, Profit Margin, and Retain on Equity as evaluation standard, and formulas below will be utilized.

 $Gross Margin = \frac{Revenue - COGS}{Revenue}$   $Profit Margin = \frac{Net Income}{Sales}$   $Retain on Equity = \frac{Net Income}{Total Equity}$ 

Table 1. profitability of Pinduoduo

Financial Ratio	2018	2019	2020
Gross Margin(%)	77.9%	79.0%	67.6%
Profit Margin(%)	-77.9%	-23.1%	-12.1%
Retain on Equity(%)	-102%	-32.1%	-16.9%

These ratios indicate the profitability of Pinduoduo. Due to the company's features and Internet Retailing, Pinduoduo maintains its gross margin at an extremely high level. That is because Pinduoduo had many commodities purchased at a lower price and sold by the first party. However, it is noticeable that profit margin and retain on equity have been negative since the company's beginning. This situation implies that other operating costs (except the cost of goods sold) account for a large proportion of the total cost. This is determined by the characteristics of the Internet Retailing industry. In the early stage of establishing the platform, Pinduoduo has to take measures such as consumer subsidies to enter the market, which results in high expenses.

Table 2. profitability of Meituan

Financial Ratio	2018	2019	2020
Gross Margin(%)	22.6%	32.6%	29.1%
Profit Margin(%)	-178.3%	2.3%	4.1%
Retain on Equity(%)	-502.1%	2.5%	5.0%

Meituan is another rising e-commerce platform. Based on the ratios, Meituan has a much lower gross profit, ranging from 20% to 30%. This figure suggests that the cost of goods sold accounts for a large proportion of the price. Furthermore, regarding profit margin, Meituan was net loss status at first but has started to gain profits since 2019. Moreover, a positive retain on equity indicates investment in Meituan would pay off, even though the rate is relatively low, 2.5% and 5.0%, respectively.

Table 3. profitability of Amazon

Financial Ratio	2018	2019	2020
Gross Margin(%)	40.2%	41.0%	39.6%
Profit Margin(%)	4.3%	4.1%	5.5%
Retain on Equity(%)	28.3%	21.9%	27.4%

Amazon, which is the biggest company in Internet and direct marketing retail industry, performs better in profitability ratios. The gross margin of Amazon maintains at the level of 40%. And positive profit margin implies that the company has made profits for an extended period. Additionally, higher retain on equity compared to other companies suggests that investing in Amazon will bring higher returns for investors.

Table 4. profitability of the industry average

Financial Ratio	2018	2019	2020
Gross Margin(%)	31.6%	26.9%	27.7%
Profit Margin(%)	-9.3%	-9.5%	-3.3%
Retain on Equity(%)	-2.2%	11.3%	10.5%

The table above shows that Pinduoduo's gross margin in the last three accounting years was much higher than the industry average. Specifically, Pinduoduo has a ratio fluctuating at 70% while the industry average is around 30%. This figure means that cost of goods sold in Pinduoduo does not take up a large proportion of business. The reason is mainly that the corporation has many products purchased and sold by the first party, getting rid of intermediaries who charge price differences. Additionally, it can identify some hot products and do supply chain control and quality improvement. However, Pinduoduo has not gained net profits in the last three accounting years regarding the profit margin. Considering its brand image that uses high marketing expenses and lower prices to attract more consumers, as well as the feature of the industry, there is still a noticeable gap between Pinduoduo and industry average performance. When it comes to retain on equity, Pinduoduo has taken steps to increase the ratio rapidly and reduce the gap between itself and other competitors. However, due to the negative net income, its retain on equity is much lower than the average figure. Comprehensive analysis shows that Pinduoduo's profitability is relatively weaker than the industry's intermediate level due to operational strategies and development processes. Nevertheless, the good news is that Pinduoduo's performance in this field has made gradual progress.

# 3.2 Liquidity and Solvency Ratios

In addition to the profitability measure, this paper discusses the liquidity and solvency, which are vital for companies to survive in the competitive market. The following relevant ratios and formulas would be utilized and analyzed.

 $Current Ratio = \frac{Current \ Asset}{Current \ Liabilities}$   $Quick Ratio = \frac{Current \ Asset - Inventory}{Current \ Liabilities}$   $Debt \ Asset \ Ratio = \frac{Total \ Liabilities}{Total \ Asset}$   $Equity \ Ratio = \frac{Total \ Liabilities}{Total \ Equity}$ 

Table 5. solvency ratios of Pinduoduo

Financial Ratio	2018	2019	2020
Current Ratio	1.7	1.6	1.8
Quick Ratio	1.0	1.0	1.1
Debt Asset Ratio	56.4%	67.6%	62.1%
Equity Ratio	129.4%	208.6%	164.1%

The current ratio, which is higher than 1.5, suggests that even if there is a debt dispute, the company can pay it off immediately. When it comes to the Quick Ratio, a measure of short-term solvency, Pinduoduo maintained a reasonable level (1.0 to 1.1). Meanwhile, accounts receivable account for a small proportion of current assets, so the uncertainty of accounts recovery will not affect the solvency of the enterprise. Additionally, the debt asset ratio shows that Pinduoduo tries to keep a relatively higher number to take advantage of financial leverage and make more profits for shareholders. Furthermore, it is noticeable that Pinduoduo has an exceptionally high equity ratio and utilizes an aggressive financial structure, and borrows an exceeding amount of money, which is

much more than the amount of shareholder equity. This kind of high financial leverage would result in higher revenue and high risk because the company has to make payment of all debts at first if it suffers from a funding crisis.

Financial Ratio	2018	2019	2020
Current Ratio	2.3	2.2	1.7
Quick Ratio	1.9	1.8	1.3
Debt Asset Ratio	28.3%	30.3%	41.4%
Equity Ratio	39.5%	43.4%	70.6%

Table 6. solvency ratios of Meituan

The relatively high level of current ratio and quick ratio of Meituan indicates that this company attaches importance to short-term solvency, keeping enough current assets to guarantee payment for current liabilities. The debt asset ratio shows that this company uses conservative financial leverage, implying a stronger long-term solvency ability. The equity ratio is kept at a reasonable level, approximately 40% to 70%, implying that Meituan uses a neutral financial structure and development plan.

Financial Ratio	2018	2019	2020
Current Ratio	1.1	1.1	1.1
Quick Ratio	0.8	0.9	0.9
Debt Asset Ratio	73.2%	72.4%	70.9%
Equity Ratio	273.5%	262.9%	243.9%

Table 7. solvency ratios of Amazon

It is remarkable that it has a lower current ratio and quick ratio when it comes to Amazon. Amazon maintains these ratios at around 1.1 and 0.9, respectively, for a long time, which means its liquidity assets are weaker, resulting in weaker short-term debt solvency. Additionally, the debt asset ratio of over 70% indicates that more than half of funds come from borrowings. Finally, in terms of equity ratio, the high figure of Amazon suggests that external borrowing is the primary source of funds for the company's operations. As a consequence, operating with debt can enable shareholders to obtain more profits during economic prosperity. However, at the same time, it will also increase the risk of bankruptcy and debt repayment.

Financial Ratio	2018	2019	2020
Current Ratio	1.3	1.2	1.2
Quick Ratio	1.2	1.2	1.2
Debt Asset Ratio	55.7%	57.6%	60.1%
Equity Ratio	125.7%	135.8%	150.6%

Table 8. solvency ratios of industry average

Based on the data collected in the Capital IQ database, it is evident that Pinduoduo has a relatively higher current ratio and slightly lower quick ratio. Considering that a quick ratio of 2 is generally believed to be more appropriate, Pinduoduo has done a better job in this respect than most companies in the industry, maintaining a ratio closer to 2 in the last three years. It suggests that the company performs better in dealing with short-term debt and is less likely to affect operations due to short-term debt. In terms of quick ratio, Pinduoduo manages to stay above a reasonable bottom line, which is 1.0, even though the company's figure is lower than the average of the industry.

As for the debt asset ratio, the industry average remains at 50 to 60 percent, which is an appropriate rate. However, Pinduoduo's ratio is slightly higher. This comparison implies that the company's management is slightly aggressive in terms of corporate development and investment. They want to make full use of borrowed funds to develop the company quickly, although they need to bear a slightly higher financial risk for this. At the same time, they want to control financial risks within an

acceptable range.

Finally, it is noticeable that the industry average and Pinduoduo's ratio both exceed 1.0, proving that most of the company's funds come from external borrowings rather than shareholders. More specifically, Pinduoduo's ratio is mildly higher. This ratio reflects that the basic financial structure of most e-commerce companies is not stable enough to guarantee the repayment of long-term liabilities effectively. In other words, most companies in this field, including Pinduoduo, choose to use an aggressive financial structure.

# 4. Future Prospects and Suggestions

# **4.1 Prospects**

Considering the rapid development of the market economy, a series of changes would possibly appear in the future. Thus, it is beneficial for companies to make reasonable predictions about potential market changes in the future, assisting to have competitive advantages. Therefore, this paper makes the following predictions for the industry.

# 4.1.1 E-commerce sales increase stably.

According to relevant statistical data, the e-commerce industry has grown in recent years (Xi, Zhen, Cao & Xu, 2020). Mobile phones and computers are rapidly spreading globally, which means that the potential users of the online retail industry will gradually increase. Meanwhile, given the enormous effects of the Covid-19 pandemic, physical stores will be hit like never before, including a sharp drop in the number of customers and sales; thus, online shopping would probably play a significant role on the Internet retailing industry. Meanwhile, with the development of logistics, which helps online retailing platforms shorten the delivery time, consumers are more willing to choose online shopping.

# **4.1.2** More Competition in the industry.

As the market of online shopping increases, the e-commerce industry will usher in a critical period of development. It can be predicted that competition will further intensify, companies will adopt measures to redistribute market shares, and industry concentration will be further strengthened. More specifically, competition could occur in advertising, supply chain management, product quality, post-sales services, and other aspects. Therefore, all companies must adjust their business strategies in time and take various measures to adapt to the new industry environment.

# 4.1.3 Social e-commerce become a new consumer trend.

Social e-commerce is a branch of retail e-commerce, referring to social networking sites, micro-blogs, social media, and network media to purchase and sell goods through social interaction and other means. Considering the gradual saturation of the traditional online retail market, existing companies would find it difficult for small companies to enter, and it is difficult for existing companies to have significant changes in their market share. By contrast, data show that the number of active social commerce consumers would reach more than three billion in a short time (Dabbous, Aoun Barakat, & Merhej Sayegh, 2020). Therefore, social e-commerce may become a decisive factor in changing the pattern of the e-commerce industry.

# 4.2 Suggestions

Taking into account Pinduoduo's financial analysis and the above forecasts, Pinduoduo should

appropriately adjust its strategy to improve the company's operating conditions and adapt to the future trends of the industry. Therefore, this study has summarized the following suggestions for the company.

# 4.2.1 Establish a comprehensive regulatory system.

Due to the need for platform expansion, Pinduoduo implemented a loose merchant access policy in the early stage, resulting in the uneven quality of products and sellers. Therefore, the probability of consumers suffering from an awful shopping experience is greatly increased. Moreover, according to scholars (Wu, Liu & Cui, 2021), it is detrimental to the platform's retention of customer stickiness and further development. Pinduoduo should pay more attention to product quality supervision, including stricter entry barriers for merchants, more user-friendly after-sales service, and more reasonable and convenient channels for consumer rights protection. All these steps could enhance the online shopping experience and satisfaction.

# 4.2.2 Optimize cost structure and business model.

In the previous platform development process, in order to enter the market smoothly, Pinduoduo adopted a strategy of low-price competition, attracting consumers by offering products at prices lower than other competitors. However, it can be seen from the company's cost structure that this marketing model determines that the company has to spend many marketing expenses, mainly including subsidies and advertising expenses. The high marketing expenses have promoted the growth of the number of customers and caused huge losses. Therefore, to make sustainable profits, Pinduoduo must take measures to change its cost structure to achieve a balance between user growth and net profit acquisition. For example, when user growth slows down, appropriately reducing sales expenses, advertising expenses, and other kinds of expenditure can reduce the company's total costs and release greater profitability.

# 4.2.3 Try to explore new social marketing model.

The characteristic of Pinduoduo is group-buying mode and inviting new users to help through old users and get discounts from them (Chang, Wong, Libaque-Saenz, & Lee, 2019). This marketing method can help the company quickly grab market share in the early stages. However, this social relationship model should not be excessive due to its commercial nature. After a period of time, frequent sharing helps to deplete users' social relationships, and precipitation of social relationships can solve this problem to a certain extent and promote communication and interaction between users. For example, it is better to add unique logos to friends who have participated in assistance many times, providing them with more discounts. Furthermore, it is reasonable to form a theme community and invite people who often participate in group activities to join, add logos to products recommended by friends, gather people who need to share, and so on.

# 5. Conclusions

In summary, Pinduoduo is a promising and rising corporation, even though it has not made any profits since its startup. Compared to other domestic and international companies, its profitability is a disadvantage. However, the gap is narrowing, and the company's profitability shows an increasing trend, which suggests a bright future. Pinduoduo maintains a good performance in short-term solvency when it comes to solvency. Nevertheless, its long-term solvency is not stable because of the significant borrowing funds, which ensures high profits and high risks for shareholders. At the same time, it is foreseeable that the future e-commerce direct sales market will be full of variables. The new sub-market will become a unique growth point for the entire industry, market share will be further expanded, and competition will become more intense. Pinduoduo should try to make

progress in product quality management, cost structure, and marketing model to adapt to potential changes and strive for future success.

#### References

- [1] Chang, Y., Wong, S. F., Libaque-Saenz, C. F., & Lee, H. (2019). E-commerce sustainability: the case of Pinduoduo in China. Sustainability, 11(15), 4053.
- [2] Dabbous, A., Aoun Barakat, K., & Merhej Sayegh, M. (2020). Social commerce success: Antecedents of purchase intention and the mediating role of trust. Journal of Internet Commerce, 19(3), 262-297.
- [3] Guo, Y., & Li, T. (2018). Research on Supply Side Structural Reform in China from the Perspective of Multiple Streams Theory. Open Journal of Social Sciences, 6(12), 104-110.
- [4] Hongfei, Y. (2017). National report on e-commerce development in China. Inclusive and Sustainable Industrial Development Working Paper Series WP17.
- [5] Hong, X. (2020). E-Commerce Dispute Settlement Innovations and Challenges in China. China Legal Sci., 8, 133.
- [6] Liang, C. (2010). The present situation of and prospects for e-business in China. Journal of InteractivE Advertising, 11(1), 74-81.
- [7] Liew, W. J., JosephNg, P. S., Eaw, H. C., & Phan, K. Y. (2020). JomAugmented Reality Effect Towards Online Shopping Platforms. In 2020 IEEE International Women in Engineering (WIE) Conference on Electrical and Computer Engineering (WIECON-ECE) (pp. 29-32). IEEE.
- [8] Li, M., & Tran, C. T. L. T. T. (2021). A Case Study of Pinduoduo Strategy Based on SWOT Analysis. In 1st International Symposium on Innovative Management and Economics (ISIME 2021) (pp. 337-346). Atlantis Press.
- [9] Piotrowicz, W., & Cuthbertson, R. (2014). Introduction to the special issue information technology in retail: Toward omnichannel retailing. International Journal of Electronic Commerce, 18(4), 5-16.
- [10] Xi, G., Zhen, F., Cao, X., & Xu, F. (2020). The interaction between e-shopping and store shopping: Empirical evidence from Nanjing, China. Transportation Letters, 12(3), 157-165.
- [11] Reinartz, W., Wiegand, N., & Imschloss, M. (2019). The impact of digital transformation on the retailing value chain. International Journal of Research in Marketing, 36(3), 350-366.
- [12] Wu, J., Liu, L., & Cui, T. (2021). What drives consumer website stickiness intention? The role of website service quality and website involvement. International Journal of Services Technology and Management, 27(3), 189-208.
- [13] Sammut-Bonnici, T., & Galea, D. (2014). PEST analysis.
- [14] Zou, B. (2019). Feasibility study on building a mobile e-commerce platform for fresh agricultural products in China under the background of internet plus. Ekoloji, 28(107), 647-658.