

CREATING THE VALUE NETWORK AND CONVERTING THE BUSINESS MODEL OF TECHNOLOGY COMPANIES

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Purpose: The objective of this publication is to understand and explain the relationships between the creation of the value network and the conversion of the business model of technology enterprises that are built on digital platforms.

Design/methodology/approach: To accomplish the assumed objective, the following research methods were used: critical analysis of literature, case study and trend analysis. The research period is the years 2018-2022. The case study deals with the examples of companies that are listed on the Nasdaq Stock Exchange or NYSE: Amazon, Alibaba, and Facebook.

Findings: The results of the empirical research in terms of acquiring knowledge about the relationships between the creation of value networks and the conversion of the business model of the surveyed technology companies show that the surveyed enterprises convert their business models by creating the value network, competing for customers on the market of digital platforms. Understanding the processes of creating the value network in the business model enables long-term competition on the market, which at the same time shapes the development of the enterprise.

Originality/value: The publication deepens the understanding of the dynamic perspective of creating the value network extended to the catalog of stakeholders of the value created, from customers and owners to suppliers, and potentially by other stakeholders, creating the value network. The construct of the value network allows for searching for new areas of value creation, pointing to the network effect, which may, on the one hand, strengthen value generation, and on the other hand, may lead to its destruction.

Keywords: Creation of value networks, business model, technology companies, enterprise management.

Category of the paper: Case study.

1. Introduction

Value creation is one of the principles of the new management paradigm (Zakrzewska-Bielawska, 2011), which is a strategic category in the process of enterprise management

(Oliveira et al., 2012). This means that value creation processes are connected with the formulation of the company's objectives and translate into their effectiveness (Davidow, 2018). Therefore, modern enterprises should redefine their objectives so as to create common value, both for the enterprise and society (Kramer, Porter, 2011). However, changes in the market environment caused by the COVID-19 pandemic and the war in Ukraine have brought about that many enterprises are struggling with the uncertainty of conducting a business and difficulties in the process of value creation.

The situation is different in the case of technology companies that manufacture, develop, and sell products containing a significant element of modern science (Lepak, Smith, Taylor, 2007). A change in the approach to value creation processes in these enterprises contributes to the formation of links between social progress and the company's success (Cyfert, Krzakiewicz, 2016). A new objective can be accomplished by converting the existing business model, in which the value chain will be redefined through innovation, networks or through new markets. Technology companies, in order to satisfy the changing needs of customers, modify the existing business model. In this context, a business model emerges, which is an important component of the value creation process (Dyduch, 2019) and the structure of the innovative and competitive potential of the company, enabling the creation of value (Pralhad, Krishnan, 2010). Business models of digital platforms are of particular importance in the process of creating the value of technology enterprises. Due to the network effects, technology companies built on digital platforms achieve above-average efficiency (Skoczylas, Małe, 2004), which reflects the directions of the business conducted and explains the ways to achieve a competitive advantage.

The distribution of value created by technology companies will depend on the subjective assessment of the end user regarding the novelty, appropriateness, usefulness, and correctness of the exchange item (Amabile, et. al., 1996). Therefore, the study poses a research question: is it possible to identify the relationships between the creation of the value network and the conversion of the business model of technology companies that are built on digital platforms? The business model of technology companies built on digital platforms should consider such a configuration of revenues, costs, and potential profits so as to create value for itself, while strengthening its own market position. Hence, the objective of this publication is to understand and explain the relationships between the creation of value networks and the conversion of the business model of technology enterprises that are built on digital platforms. Referring to the research question, the empirical findings deal with the examples of companies that are listed on the Nasdaq Stock Exchange: Amazon, Alibaba, and Facebook. The research period is the years 2018-2022. To accomplish the assumed objective, the following research methods were used: critical analysis of literature, case study and trend analysis. This study develops the issue of identifying the determinants for creating the value network in the business model of digital platforms, which is important and up-to-date due to the lack of the in-depth theoretical research on the conversion of their business models, which

constitutes a cognitive gap. The above arguments brought about that an attempt of a theoretical analysis was made and a case study was conducted to fill the identified gap by deepening the understanding of the value creation process due to network effects by technology companies built on digital platforms.

2. The significance of creating value networks by enterprises

In the strategic approach to enterprise management, an important area of value generation is the creation of the value network. The idea of the value network assumes that the company together with general partners creates a value network (Brandenburger, Nalebuff, 1996). The theoretical framework for the value network is based on game theory and supplements the analysis of M.E. Porter's (Porter, 1985) five forces with the sixth force of cooptation.

The primary competitive force for enterprises competing within a given sector is created by customers, who are identified with the bargaining power of buyers. Another force is competitors, in the case of whom the risk of substitutes appearing on the market, and suppliers with their bargaining power is important. The next force is constituted by new competitors, providing customers with additional, complementary goods and services, generating increased added value (Brandenburger, Nalebuff, 1995).

It is worth noting that the creation of the value network is an element of the transformation of the chain of traditional values of the enterprise, supplemented with the force of cooptation. In traditional enterprises, customers purchasing products generate revenues, and suppliers provide the enterprise with resources constituting the cost parameter of value flow. Competitors, on the other hand, focus on creating substitutes for products offered by the traditional company. When creating the value network based on the force of cooptation, enterprises compete and cooperate at the same time, and the competition applies to both customers, resources, and suppliers (Hamel, Doz, Prahalad, 1989).

To sum up, it is worth emphasizing that in the case of enterprises creating value networks, the scope of activities of other network participants that may strive to capture a greater proportion of the added value generated should be analyzed (Otolá, Grabowska, 2020). The company operating in the value network is strongly connected with other participants in the network. A change in the scope of activities of one of its participants may result in positive or negative changes in the scope of activities of other members, causing a change in the configuration of added value distribution. The scope of activities can be changed by creating or eliminating links between the participants of the value network, therefore, when preparing to change the scope of activities, it is necessary to go beyond tactics and analyze the market in a broader, strategic perspective.

3. Research methodology and research procedure

The objective of the conducted research is to understand and explain the relationships between the creation of the value network and the conversion of the business model of technology enterprises operating on the basis of digital platforms. The study of the above-mentioned relationships requires a deliberate and selective choice of research methods. The research methods used to achieve the objective are critical analysis of literature, case study, trend analysis. The use of triangulation of research methods is intended to enable the accomplishment of the assumed objective by presenting the description of the studied phenomena and limiting the possibility of errors in the research procedure (Mangan, 2004).

Critical analysis of literature is a method that serves both cognitive and utilitarian purposes. The method of critical analysis of literature can be the basis for the implementation of appropriate research in relation to the set cognitive objectives (Jesson, Lacey, 2006). In addition, this method allows the use of scientific achievements in specific activities through the synthesis and evaluation of the existing achievements in the case of the implementation of utilitarian objectives by the researcher (Andrews, Harlen, 2006).

The premise for conducting the research using the triple case study method is the fact that the issue of the role played by technologies in the processes of creating value networks through network effects is presented in the literature in a fragmentary and dispersed way (Kraus et al., 2022). The current state of knowledge in this field is characterized by methodological multiplicity, and the lack of in-depth theoretical research results in few attempts to identify the impact of technology on the processes of creating the value network in the business model. It is worth noting that the scientific nature of the case study method is evidenced by objective, systematic, organized, rational and structured activities, and their purpose is to ensure the credibility of conclusions (Eisenhardt, Graebner, 2007), therefore developing a theory based on a case study is considered reliable in the literature (Yin, 2009).

The relationship between the creation of the value network and the conversion of the business model of technology enterprises was verified based on trend analysis. Trend analysis studies are widely used to explain the studied phenomena (Popper et al., 2007) and are easy to implement. Trend analysis is designed to reflect the long-term tendency to regular, one-way systematic changes caused by an increase or decrease in the value of the variables under study. The selection of the variables for the empirical research was carried out based on logical premises and was also conditioned by the objective of the research. The variables examined in the first and second stages are: Total Revenue, Cost of Revenue and Gross Profit of the surveyed entities. In order to explain the relationships between the creation of the value network and the conversion of the business model of technology companies, the research procedure aimed at achieving the assumed objective was carried out in two stages. In the first stage, the analysis of the above-mentioned variables will allow the measurement of

value created from the customer's perspective, revealing the processes of creating value networks in the surveyed enterprises (Ranjith, 2016). In the second stage, the same variables will be examined from the perspective of the surveyed enterprises (Kaplan, Norton, 2006), which will enable the assessment of the conversion of the business model, which is of strategic importance for the activities conducted by the surveyed technology enterprises, and the identification of the relationship between the creation of the value network and the conversion of the business model.

4. Description of the sample selection and outline of the activities of the surveyed enterprises

The surveyed technology companies are digital platforms that were selected on the basis of purposeful sampling, in accordance with the following criteria:

- the companies subject to the study were listed on the NASDAQ or NYSE stock exchanges throughout the research period,
- the empirical data of the surveyed enterprises were available on the NASDAQ or NYSE Stock Exchange websites for the entire research period,
- in all cases, individual financial statements are available on an annual basis, in accordance with the assumption that enterprises separated based on the organizational and legal criterion are economically independent and remain in competitive relations.
- the list of enterprises covered by the study is constant throughout the research period,
- the surveyed enterprises can be classified as digital platforms.

Such assumptions ultimately led to the empirical research being carried out on a sample of three companies listed on the NASDAQ Stock Exchange: Amazon, Alibaba, and Facebook – currently Meta Platforms. The research period was the years of 2018-2022.

- Amazon is a global e-commerce platform. Amazon (AMAZ) is an online electronic retailer. The company creates the value network by offering computer services, consumer electronics, digital content, and other local services such as daily deals and groceries (statista.com/topics/846/amazon, 2023). Amazon was founded in 1994 in Seattle (USA) and is famous for its strategy of discounting products (Ritala, Golnam, Wegmann, (2014), with a low base price. Initially, Amazon's activity focused on the online sale of books (Peprah et al., 2022). Currently, the company is a leader in the Business to Consumer (B2C) e-commerce industry. Amazon's corporate value network includes, among others, Alexa Internet, SoundUnwound, Joyo.com and IMDb. Amazon's portfolio includes Twitch, Zappos, The Washington Post, Kindle e-book reader, Amazon Fire Phone, Amazon Prime, FireTV. Amazon's low-price strategy is based on economies of scale (Keen, Williams, 2013). Amazon, being one of the largest

players in the e-commerce market, can buy significant quantities of specific goods directly from the manufacturer or distributor, which allows it to negotiate significantly lower prices compared to the competitors (Daniel, Kahlun, 2021). In addition, Amazon offers assistance in sales service and provides customers with servers (Amazon Web Services), due to which they can use the virtual cloud without incurring high costs (Wadhwa et al., 2020). When growing, Amazon introduced the virtual voice assistant, Amazon Alex. Moreover, Amazon uses an extensive network of distributors to deliver parcels via courier companies (external - DHL, DPD and FedEx and internal - Amazon Logistics).

- Facebook Inc. changed its name to Meta Platforms (META) in October 2021. Facebook was founded in 2004 and is an international technology company headquartered in California (Menlo Park, USA). The flagship product of the company is a social platform. Currently, the group of Meta Platforms applications that create the value network also includes Messenger, WhatsApp, Instagram, Oculus, Mapillary and Giphy. Changes in the company initiated in 2021 are directed towards the development of the Metaverse (statista.com/topics/9038/meta, 2023). In this regard, the company develops virtual reality (VR) and augmented reality (AR) products and services, among which Reality Labs attracts attention, around which the company concentrates its research and development activities. The introduced change signals the implementation of a new business model (Kraus et al., 2022), which was based on the configuration of the following three components: value creation, value proposition and value capture (Pucihar et al., 2017). The new business model remains in relation to the strategic resources of the company through the configuration of unique activities, resources, and competences (Chen, 2014), the task of which is to support the implementation of strategic goals (Hu, 2011). The main source of the Total Revenue of Meta Platforms is advertising revenue; hence it is important for the company's development to accept the value proposition generated by augmented and virtual reality through a different type of online experience.
- Alibaba (BABA) is a leading platform for global wholesale trade that creates the value network by bringing together many branches of the e-commerce market. Alibaba Group was founded in 1999 in Hangzhou (China). The primary objective of the group is to enable suppliers and customers to freely trade goods from anywhere (Yun et al., 2020). Alibaba is a leader in wholesale, used by sellers and customers around the world (Schmuck, Benke, 2020). Alibaba creates modern sales platforms such as Business to Business (B2B), Business to Consumer (B2C) and Consumer to Consumer (C2C), which are a form of presenting business and sales offers. Alibaba was first listed on the New York Stock Exchange (NYSE) on 19 September 2014. Alibaba Group's main corporate campus include, among others, Taobao Marketplace, Tmall, AliExpress, Alibaba.com, 1688.com, Alimama, Alibaba Cloud, Cainiao Network, Ant Financial.

The company has offices in many places around the world. They play an important role as intermediaries between the largest Chinese sales platform and suppliers and customers who would like to enter the Chinese online market (Zhang-Zhang et al., 2020). Alibaba Group focuses its activities on providing companies with various ways to market products and sell them (Kwak et al., 2019). Alibaba also offers modern technological solutions that enable customers to increase productivity and work efficiency.

5. Results of the conducted empirical research

The processes of creating the value network are the basic element of building the business model and competitive advantage of the company. The current state of knowledge in the field of management science indicates that the company should concentrate its activities on creating the value network for the client (MacDonald, Ryall, 2004). Therefore, enterprises operating on the basis of digital platforms, in order to satisfy the changing needs of customers, should modify the existing business model by identifying variables affecting the creation of value.

5.1. The first stage of the research procedure

Acquiring knowledge about the relationship between the creation of value and the conversion of the business model of the surveyed enterprises requires the observation of socio-economic phenomena. A special category of variables are the Total Revenue, Cost of Revenue and Gross Profit of the surveyed entities. These listed variables are of strategic importance for the continuation of the company's operations. In a situation of competition for a competitive advantage, these variables become the carrier of the value created for the customer. In the first stage of the research procedure, the Total Revenue, Cost of Revenue, and Gross Profit of the examined entities will be subject to comparative analysis.

The analysis of the trend lines of the examined variables becomes an important element of the decision-making process in the surveyed enterprises. This is due to the fact that trend analysis allows for assessing the level of value created in the network from the customer's perspective. When examining the level of Total Revenue in the surveyed enterprises, it is noted that in the base year, Amazon generates the highest Total Revenue in the analyzed period. In addition, the growth in Total Revenue in Amazon is highly dynamic, which suggests that the pandemic has become a factor positively affecting network relations for Amazon. Amazon has taken the opportunity to meet its customers' needs better by providing services through a digital platform, thus the mechanisms for exchanging value between the enterprise and the customer have enabled Amazon to create above average customer value through network effects.

Total Revenue in Meta Platforms (formerly Facebook) was much lower than in the case of Amazon. In 2018-2021, Meta Platforms was characterized by the growth in Total Revenue. However, the growth rate in 2022 was slower. This may indicate that there has been a shift in value towards new forms of doing business in Meta Platforms, which translates into a decrease in the growth rate of Total Revenue, and the pace of change suggests a lower potential for the growth of value created in the network.

Alibaba Group saw an increase in Total Revenue throughout the period under review. However, both the Total Revenue level and the growth rate are the slowest compared to the two previously discussed companies in the years 2018-2021. It should be noted that Alibaba Group is systematically and steadily increasing its share in the network service market. It is worth pinpointing that in 2022, the dynamics of the value chain creation processes in Alibaba Group may suggest that the surveyed company focuses its activities on increasing customer satisfaction. The development of the Total Revenue level in the surveyed enterprises is presented in Figure 1.

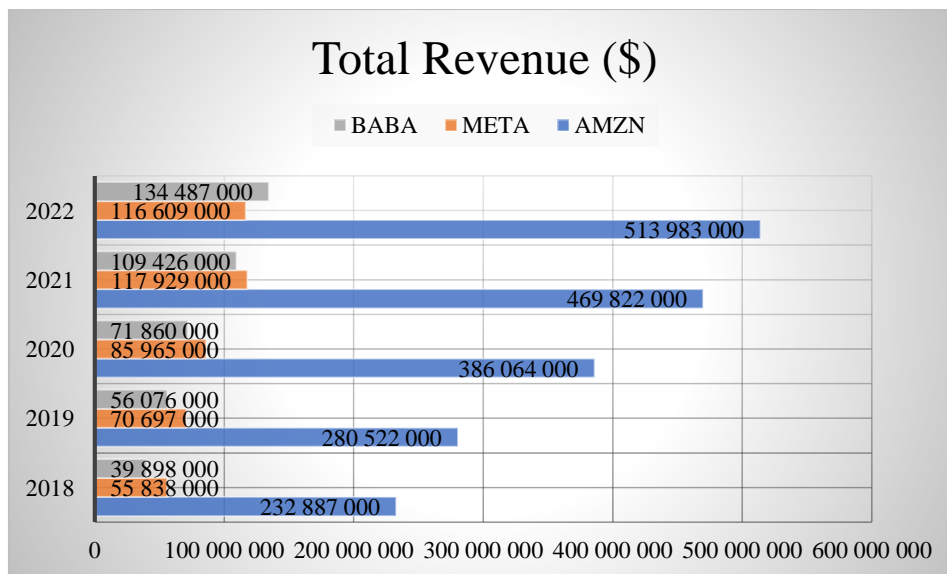


Figure 1. The Total Revenue level in the surveyed enterprises in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/>.

When analyzing the development of Cost of Revenue in the surveyed enterprises, it is noted that the level of Cost of Revenue is the highest in Amazon. Moreover, the growth rate of Cost of Revenue is also the fastest in the case of Amazon. Alibaba Group keeps Cost of Revenue at a relatively low level. It is worth noting that Meta Platforms is characterized by a very low level of Cost of Revenue, and the growth rate of this variable is slower compared to the other two companies. The low level of Cost of Revenue in Meta Platforms may indicate cost discipline and the monitoring of tax-deductible costs. The development of the level of Cost of Revenue in the surveyed enterprises is presented in Figure 2.

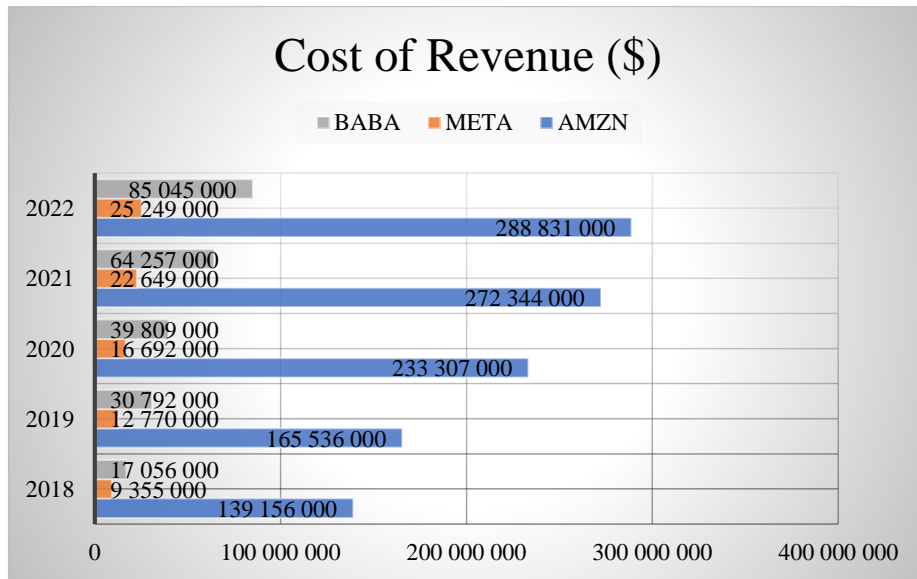


Figure 2. The Cost of Revenue level in the surveyed enterprises in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/>.

When analyzing the growth in Gross Profit in the surveyed enterprises, it is noted that Amazon has the greatest ability to generate Gross Profit. Meta Platforms generates high Gross Profit by keeping Cost of Revenue low, which did not prevent the company from a decrease in the level of Gross Profit in 2022. On the other hand, the level of Gross Profit in Alibaba Group is the lowest compared to the other two companies. However, it is characterized by an upward trend throughout the research period. The development of the Gross Profit level in the surveyed enterprises is presented in Figure 3.

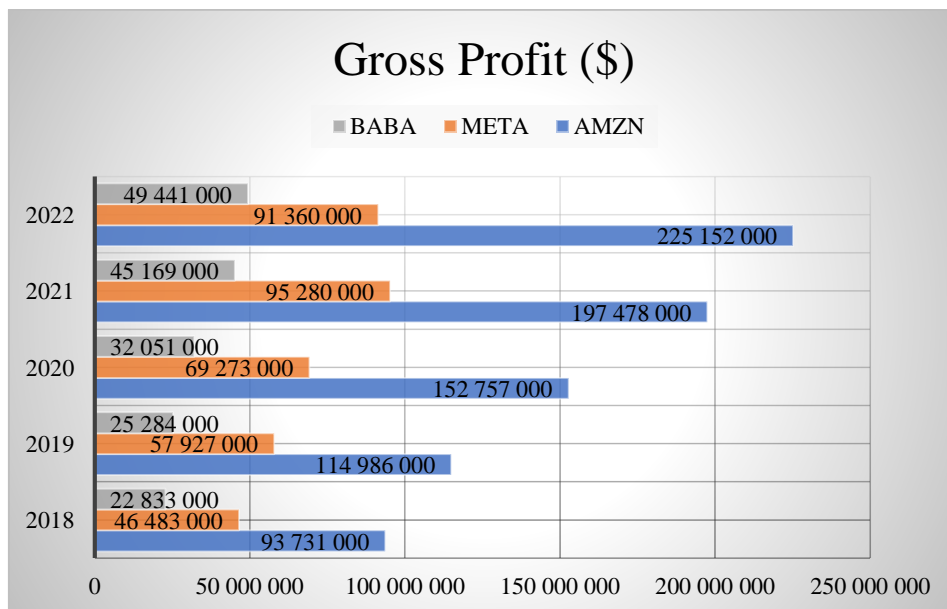


Figure 3. The Gross Profit level in the surveyed enterprises in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/>.

When interpreting the obtained data, it can be concluded that Amazon and Meta Platforms have a significant ability to create value networks. The obtained data provide grounds for indicating that Alibaba Group has the ability to create the value network, however, the level and rate of change of the examined variables suggest that the methods of achieving revenue streams may be insufficient for the future development of the enterprise.

5.2. The second stage of the research procedure

In the second stage of the research procedure, the analysis of Total Revenue, Cost of Revenue and Gross Profit will be carried out from the perspective of the surveyed enterprises. The research will enable the assessment of changes in the business model and show the relationship between the creation of the value network and the conversion of the business model of the surveyed enterprises.

When analyzing the Amazon business model, it is noted that the pandemic period was conducive to generating a high level of Total Revenue. Despite occupying the leading position on the market of the provided network services, it is noted that in the Amazon company, the growth in Cost of Revenue is controlled and its growth rate is slower than the growth rate of Total Revenue. Such an action translates into the level of Gross Profit in Amazon, which was systematic and even throughout the research period. The development of the level of the examined variables in the Amazon company is presented in Figure 4.

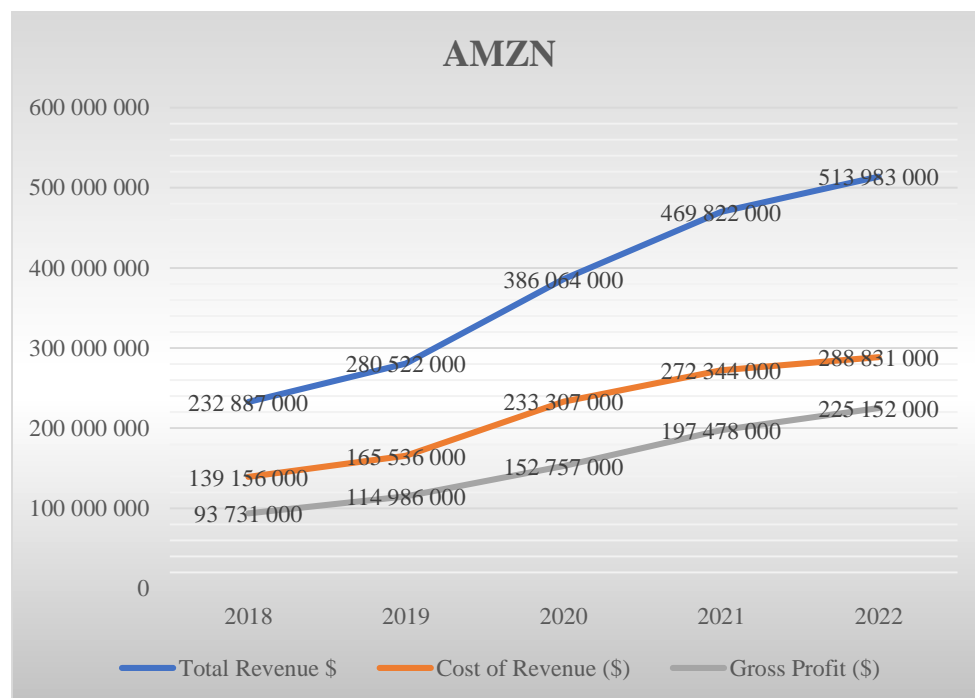


Figure 4. The level of the variables studied in the Amazon company in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/amzn/financials>.

When considering the business model of Meta Platforms, it is noted that despite the dynamic upward trend of Total Revenue until 2021, the level of Cost of Revenue is not high and is characterized by slow growth. This means that Meta Platforms generates a high level of Gross Profit. The increase is proportional to Total Revenue, which means that during the pandemic, the company generates revenue streams that translate into high gross profit, which is not appropriated by decisions made in the field of operating costs. In 2022, a downward trend can be noticed in both Total Revenue and Gross Profit, while Cost of Revenue is increasing, which suggests that the company had problems in the area of tax-deductible cost management. The development of the level of the examined variables in the Meta Platforms enterprise is presented in Figure 5.

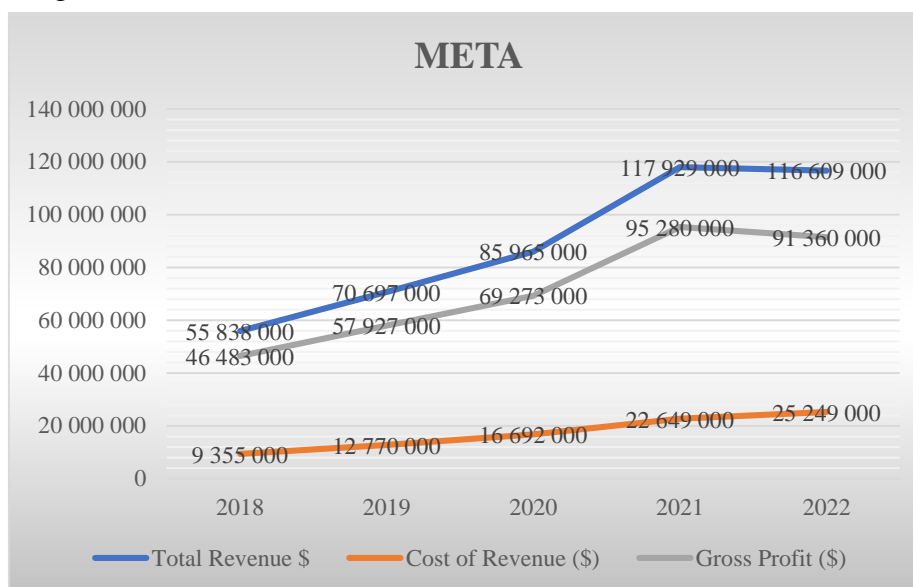


Figure 5. The level of the variables studied in the Meta Platforms company in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/meta/financials>.

When examining Alibaba Group's business model, an interesting trend emerges. In 2018, the level of Cost of Revenue was lower than the level of Gross Profit. In the years 2019-2020, Cost of Revenue slightly exceeded the level of Gross Profit. The years 2021-2022 are characterized by a greater discrepancy between these two variables, although in the last of the analyzed periods it is characterized by a strong increase in Total Revenue, which proves that Alibaba Group met the expectations of its customers in a way that encourages further cooperation. The development of the level of the examined variables in the Alibaba Group enterprise is presented in Figure 6.

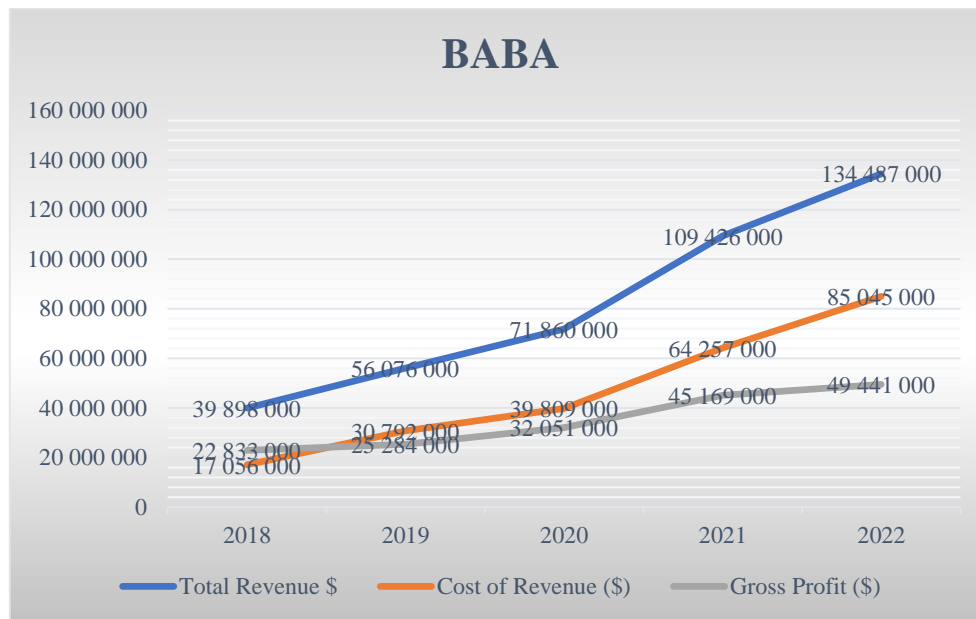


Figure 6. The level of the variables studied in the Alibaba Group company in the years 2018-2022.

Source: Own study: <https://www.nasdaq.com/market-activity/stocks/baba/financials>.

Summarizing the results of the empirical research in the field of acquiring knowledge about the relationship between the creation of the value network and the conversion of the business model of the surveyed technology companies, it should be noted that the surveyed enterprises convert their business models since they compete for customers on the market of digital platforms. The trend analysis of the Total Revenue, Cost of Revenue and Gross Profit relationships leads to the conclusion that the surveyed companies used the pandemic as an opportunity to generate Total Revenue growth. However, the level of Cost of Revenue was not subject to managerial control in all cases, which translated into the development of the Gross Profit level in the surveyed enterprises.

6. Discussion

As a consequence of the considerations on the creation of value networks in technology companies competing for customers on the market of digital platforms, it follows that the surveyed enterprises graduate the value created by customers in their business models in a different way. This is reflected in the formation of the Total Revenue trend line. The market leader is the Amazon company, which suggests that it best satisfies the needs of its customers. The Meta Platforms company incurs low expenditure on the implementation of operating activities, which is reflected in the level of Cost of Revenue. In the case of Alibaba Group, it is noted that it is Gross Profit oriented, which brings about that the gross financial result, reflecting the effectiveness of the adopted growth strategy of the company, plays an important role here.

It is worth emphasizing that in the conditions of a pandemic, when the system of competitive and cooperative forces changes on the market, technology companies operating on the basis of digital platforms should modify not only their sales processes by engaging external companies in network cooperation, but also reorient their operational activities in order to control costs. Thus, an important role in the process of creating the value network in the business model of enterprises operating on the basis of digital platforms should be played by the cooperation of all participants of the value network.

In the classic approach, the process of creating value is generated by the operational activity of the company. In the case of network cooperation, the process of creating value increases through cooperative relationships, allowing access to many resources, thus becoming the source of relational advantage. In such a situation, enterprises operating on the basis of digital platforms may attempt to increase the created value network in two ways. First, they can increase their own value through activities such as branding or using resources more efficiently. Secondly, they can limit the part of the created value that they distribute to other participants in the network. It should be remembered that enterprises operating on the basis of digital platforms are structures composed of many entities. Therefore, the strategy of technology companies operating on the basis of digital platforms in terms of creating the value network should take into account such a configuration of its participants to create the greatest possible value for themselves, while strengthening their own market position.

The volatility of the competitive environment of technology enterprises built on digital platforms brings about that the processes of creating the value network result in the need to convert the current business model, the task of which is to permanently strengthen the development potential that distinguishes the company from the industry. The competitive environment of technology companies operating on the basis of digital platforms affects the processes of creating the value network, which means that the current business model does not fulfill its functions. Hence, there is a need to convert the business model, taking into account changes in customer needs and preferences in terms of value proposition. Therefore, it is important that the processes of creating the value network in the business model are continuous.

7. Summary and conclusions

The usefulness of the conducted considerations results from the lack of the in-depth description of the relationships between the creation of the value network and the conversion of the business model of technology enterprises built on digital platforms. In conditions of turbulence in the environment, understanding the processes of creating the value network in the business model enables long-term competition on the market, which at the same time shapes

the development of the company. This work was based on the assumption of the existence of relationships between Total Revenue, Cost of Revenue and Gross Profit, which help determine the processes of value creation and provide information on the conversion of the business model of technology companies built on digital platforms. Based on the conducted analysis, a set of consistent information was obtained, enabling the multilateral assessment of relationships occurring in the process of creating the value network in the business model. The results of the conducted research suggest that the analysis of the processes of creating the value network from the company's and customer's perspective, based on the variables shaping the business model of the surveyed technology companies, allows for understanding and explaining the relationship between the creation of the value network and the conversion of the business model based on the diagnosis of revenue streams against costs.

Adopting a dynamic perspective of creating the value network expands the catalog of stakeholders of the value created, from customers and owners to suppliers and potentially, by other stakeholders, thus creating the value network. It follows that the construct of the value network allows for the search for new areas of value creation, pointing to the network effect, which may, on the one hand, strengthen the generation of value, and on the other hand, may lead to its destruction. Achieving the assumed objective of the work fills the perceived cognitive gap and contributes to the development of the theory of management science in the field of creating the value network and converting the business model of technology enterprises built on digital platforms. The basis for this achievement is empirical studies of enterprises, conducted using a variety of methodology, which indicate directions for converting the business model and creating the value network. The considerations highlighted in this study made it possible to accomplish the adopted objective and to state that the value creation processes are evolving, and the measurement of these processes allows for the protection of the created value network and enables its growth in changing conditions. The conducted considerations allowed the formulation of the following conclusions:

- the complexity of processes of creating the value network indicates the importance of searching for new solutions in enterprise management,
- the determinants of value creation are evolving towards network orientation,
- the process of value creation in the network provides unique value for both the customer and the company.

To sum up, it should be stated that the multifaceted nature of the problem of creating the value network in the business model and the interdisciplinary nature of the considerations brought about that the study presents selected aspects of the applicability of the proposed solutions. The issue of creating the value network in terms of business model conversion is important and up-to-date due to its impact on strategic decision-making in terms of the effectiveness of management of the surveyed enterprises.

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