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INNOVATIVE COMPONENT OF THE BANKING SECTOR DEVELOPMENT IN UKRAINE

Thesis is devoted to the study of the innovative component of Ukraine's banking sector development. It analyzes the state-of-the-art technologies used in the sector to enhance customer service, including virtual branches, online lending, mobile applications, and others that are made possible by technological advancements and evolving customer demands. Particular attention is given to key aspects of implementing innovations, specifically cybersecurity and the use of blockchain technologies. The study establishes that the introduction of innovations is an important element of the development of the banking industry in Ukraine, which allows banks to be competitive in the market. This important issue requires further research to ensure the growth of the economy in the country.

Keywords: *banking innovation, competition, financial market, information technology, economic growth.*

In the context of globalization and rapid development of information technologies, the implementation of innovations plays a vital role in the development of the banking sector in Ukraine. The recent years have been characterized by the intensification of crisis phenomena and a decline in economic growth in the country due to the COVID-19 pandemic and ongoing full-scale invasion. Despite these challenging and uncertain conditions, the banking system in Ukraine continues to operate normally and meets the needs of the population, businesses, and the government as a whole. In addition to their traditional functions, banking institutions actively implement innovative solutions and technologies in their operations. This allows banks to continuously improve their products and services, ensure competitiveness in the market, and enhance their impact on the overall economic growth of Ukraine.

Annually, with the support of Finance.ua and the Ministry of Finance, Ukraine holds the FinAwards, which recognizes the best financial and investment products, client services, IT implementation, advertising projects of the financial services market, as well as the most successful and efficient top managers of financial companies. Based on the results of 2022, the top leaders in the category of leading technologies and innovations were SenseBank (Alfa-Bank); MonoBank (Universal Bank); and PrivatBank and Oschadbank [1].

Among the main innovative technologies implemented by banks in Ukraine, the following important components can be highlighted. Firstly, this is the

development of mobile applications and the development of Internet banking. Currently, among the 67 solvent banks in Ukraine, more than 55% of banks have mobile applications, which allow customers to perform banking operations online, conveniently and quickly. Such operations include money transfers, bill payments, salary deposits, etc. According to the mobile application ratings, the market leaders remain MonoBank (Universal Bank), SportBank (Taskombank), SenseBank (Alpha-Bank), PrivatBank, and Oshchadbank.

Another important innovation component is contactless cards and payments. Contactless cards allow for contactless payments at stores, restaurants, and other locations, which is a convenient and safe way to pay. Payment is made using NFC (Near Field Communication) technology, namely devices equipped with NFC chips. Some banks are also introducing contactless mobile payments. Analyzing the implementation of innovative technologies in Ukraine, it should be noted that currently three contactless payment systems have been introduced in the country, such as ApplePay, GooglePay, and Garmin. Tokenization of payment cards is also important, as it increases the level of payment data protection, ensures confidentiality and security. According to the NBU, the number of tokenized payment cards used for spending operations increased significantly (by 69.7%) in 2021, from 3.9 million in January 2021 to 6.7 million in December. Overall, during 2021, the number of tokenized payment cards used for transactions increased by almost 5% each month. Today, almost every seventh active payment card is tokenized [2].

The National Bank of Ukraine continues to implement innovations in response to customer demand. This includes the implementation of the Instant Payment system, which allows for real-time non-cash transfers of money between bank accounts. Thanks to the "Instant Payment" system, users can transfer funds from one bank to another at any time, including weekends and holidays. Transfers are made instantly, without delays or restrictions outside of bank working hours. This is why it remains a promising direction for development and active implementation.

Remote servicing is also an important component of the innovative development of the banking system in Ukraine. A popular trend in Internet banking is expanding the possibilities for obtaining government services without physically visiting government institutions, using BankID through internet portals and their bank [3]. According to the National Bank of Ukraine, as of the end of 2022, 41 banks are participating in the BankID system. Despite the state of war, the system has been operational without interruptions, and a new feature was introduced at the end of the year - participants gained access to the Personal Cabinet of the BankID NBU System, which simplifies information exchange between subscribers during settlements and directly with the National Bank [2].

Some banks in Ukraine are exploring the possibilities of using blockchain technology to ensure the security and efficiency of banking operations, such as fund transfers and data storage. For example, the National Bank of Ukraine, in collaboration with Ukrainian banks, is implementing an electronic money transfer system based on blockchain technology. This system is called ProZorro, SmartPayments and allows for non-cash payments using digital signatures and blockchain technology to confirm transactions. Another example of the use of

blockchain technology in Ukrainian banks is the creation of a platform for issuing loans based on blockchain technology. Some banks in Ukraine are implementing online lending, which allows customers to apply for loans and receive money without visiting a bank. These services are convenient and fast, attracting new customers. The improvement of the application of blockchain technology in Ukrainian banks, including customer data management, virtual money and e-currencies, ensuring the security of remote transactions, and more efficient data usage, remains relevant.

In the conditions of accelerated digitalization, the implementation of innovations in the field of cybersecurity remains important. Banks in Ukraine are actively working on ensuring cybersecurity and protecting customer data from cyberattacks and fraud. The National Bank of Ukraine constantly monitors and controls the cybersecurity of Ukrainian banks and ensures compliance with cybersecurity requirements at the national level. Ukrainian banks are actively introducing new technologies and measures to enhance cybersecurity. For example, banks use multi-level authentication systems and two-factor authentication, data encryption, information access control, and much more. However, despite this, the risks of cyberattacks on banks remain significant. Therefore, it is important for banks to continue to increase their level of cybersecurity and timely identify and eliminate possible cyber threats. In addition, it is important for users of banking services to follow cybersecurity rules and use reliable passwords and protect their personal data.

The analysis shows that Ukraine's banking sector is developing innovative technologies despite martial law and the pandemic. Internet banking, mobile applications, and remote service are actively used. Although the sector is not as advanced as in developed countries, there is a growing interest in innovation. Future research should focus on blockchain, online lending, instant payments, and security. This will have a positive impact on the banking system's competitiveness, customer service, and the country's economy.

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