



## Implementation of digital financial instruments in the activities of tourism enterprises to increase their competitiveness

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**Abstract.** The relevance of research on digital financial instruments was determined by their online functioning and the ability to instantly carry out transactions and settlements, to be economical and accessible in use. Therefore, the identification of their features and substantiation of priority areas of implementation in the activities of tourism enterprises carried out in the article is of theoretical and practical importance for increasing efficiency and competitiveness. It is important to identify and use the advantages of digital financial instruments to restore Ukrainian tourism enterprises due to the losses of the war. An analysis of monographic and analytical sources, as well as practical experience, was carried out, which allowed to establish that over the past decade, digitalisation and informatisation have become the leading drivers of tourism business development in Ukraine and in the world. The authors analysed the digital priorities of the main and auxiliary activities of the tourism industry, including electronic bookings of tourism products, accommodation and transportation; e- and m-commerce and electronic payments in tourism; digital insurance and lending; development of smart or virtual tourism and customer focus; digitalisation of document management, accounting, analysis, finance and big data. It was concluded that digital financial instruments are not sufficiently represented in this list. Therefore, they were classified into three sets of components: digital technological infrastructure; digital payment instruments; and digital regulatory mechanisms. The factors of their involvement, advantages, and risks were also identified. This made it possible to systematise their use, which will help to increase the efficiency, and thus the effectiveness and competitiveness of the tourism business. The article also drew conclusions about the need for their continuous improvement through the introduction of further innovative developments; integration with traditional financial instruments to increase the effectiveness of the latter and the convincing nature of digital ones; increasing inclusiveness through the spread of

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high-speed Internet, mobile gadgets, deepening digital literacy of the population, innovative education and professional training of employees of tourism business enterprises

**Keywords:** online tourism; digital financial infrastructure; blockchain; digital regulatory financial mechanisms; investment; competitiveness

## INTRODUCTION

Comprehensive research and development of digital financial instruments are actively carried out at all levels of their implementation: academic, regulatory and practical. Their relevance in the current conditions of increased competition in national and global markets is due to their ability to instantly provide transactions, be economical in maintenance, convenient to use, and therefore have a dramatic impact on the efficiency and competitiveness of all areas of life and businesses in particular. However, due to the rapid development of this area, its important aspects remain insufficiently studied or under-researched. The focus is on the ethical and legal regulation of implementing digital financial instruments in business activities; the integration of cryptocurrencies into the financial systems of countries, industries, sectors, and enterprises; the implications of their influence on the economic stability of business entities and overall monetary policy; as well as the associated risks and security of their use. The need for further research is actualised and growing due to the development of new technologies and the need for their safe and effective implementation in the financial sector and practical activities of enterprises and organisations to maintain competitive positions, expand in markets, ensure financial and economic stability, and economic growth in general. This fully applies to agriculture, tourism, hotel and restaurant business, energy and industry, and all other sectors; financial relations of public relations, individuals, and social life in general. For example, the competitiveness of tourism enterprises is determined primarily by their ability to provide services to customers quickly and conveniently, to make various financial settlements, and to have optimised internal business processes. These requirements are best met by the use of online financial instruments, i.e. digital ones. They can ensure that the tourism business is carried out where and when traditional financial instruments cannot be used – where financial institutions and financial relations mechanisms do not operate due to economic inexpediency, war and other uncertainty factors. This once again demonstrates that the topic of this article is relevant and timely.

It should be noted that a number of publications are devoted to the introduction of digital and information technologies, digital financial instruments into business, including tourism activities. Among them are the works of I. Bezugliy & A. Struk (2024), who comprehensively described digital technologies in tourism: digital marketing, chatbots, cloud technologies, the Internet of Things, Big Data and financial support for their implementation. However, these publications do not pay enough attention to digital financial instruments. They require additional research.

Taken together, the combination of digital innovations in tourism and digital financial instruments will enhance the effectiveness of the former due to the special properties of the latter (Lysiuk *et al.*, 2021; Stryzhak, 2022). However, the role and application of digital finance in this task requires additional coverage. O. Havryliuk (2021) examined in detail the tools for activating the tourism business in general, namely e-learning, booking information services, online events (anti-crisis webinars, workshops, online intensives, etc.). However, the use of these and other digital tools also requires innovative financial support, and therefore scientific understanding. This also requires identifying the special properties of digital financial instruments. T. Koliada & Y. Prozorov (2024) in their articles identified the role and prospects of using blockchain technology and cryptocurrencies in the tourism industry in Ukraine. The authors describe the global cryptocurrency market and Ukraine's place in this market, consider the advantages and opportunities for wider use of cryptocurrencies in the tourism industry in modern conditions.

The articles by V. Kyfyak & O. Kyfyak (2020) and V. Morokhovych *et al.* (2021) pay great attention to the analysis of the impact of online resources on consumer decision-making on the purchase of tours and travel. Therefore, it is of great importance to determine the role of online payments, the possibility of using digital money, digital wallets, online insurance and lending in this process in order to further develop and improve them in terms of efficiency and security. Other publications, on the contrary, relate to the study of purely digital financial instruments without identifying the specifics of their involvement in the activities of tourism enterprises. These are the publications of M. Ihnatenko *et al.* (2024). These authors identify the components and structure of digital financial instruments, their competitive advantages and areas of use. However, it is necessary to continue to determine the systemic impact and synergistic effect of the use of digital financial instruments in the activities of tourism enterprises. In the articles by O. Popelo & A. Tarasenko (2023) and N. Kholiavko *et al.* (2022) consider the structure and types of digital financial instruments, the digitalisation of credit services and financial services in general. However, they require more specificity, taking into account the conditions of the tourism business; types of tourism activities; tourism services and procedures; and risks of uncertainty.

Digitalisation as a key factor in the development of the hotel and restaurant industry and hospitality in the European Union and advanced countries of the world is also pointed out by other authors O. Dzhedzhula &

L. Volontyr (2021) and M. Dubyna & O. Kozlianchenko (2019). However, digital financial instruments are not sufficiently reflected in the schemes or models of its structure in relation to the tourism business. In particular, an informative and in-depth article on the strategic guidelines for financial support for the digital transformation of the tourism business focuses on the digital transformation of the core business itself – the organisation of smart tourism, virtual tours and excursions, virtual bookings, internet marketing, etc (Bezugliy & Struk, 2024).

The study by D. Morozov *et al.* (2023) emphasises the importance of innovation and digitalisation for the development of the tourism industry in the context of the global digital economy. Although Ukraine faces significant challenges in its tourism industry, the country has the potential to introduce digitalisation and become a leader in innovative tourism practices. R. Yankovoi & L. Sembiyeva (2023) investigated the role of financial instruments in supporting and stimulating business innovation. The authors consider venture capital financing, lending, crowdfunding and other mechanisms as key levers for the development of innovative projects and startups, so the reviewed materials require sectoral specificity. This once again makes it important to define the components and types (online financial settlements and payments, digital banking, digital financial platforms for investment) of opportunities (financial, professional, security); directions of using digital financial instruments in the activities of tourism enterprises (operating; investing; organising new types of tourism; restructuring enterprises; distribution in new markets).

Therefore, the issues of involving digital financial instruments in the activities of tourism enterprises are not sufficiently studied in terms of structure, components, areas of implementation, assessment of the impact on efficiency and competitiveness and require in-depth development. It should be noted that there is a significant number of scientific publications on the development of processes, directions and forms of digitalisation of tourism enterprises. However, the participation of digital financial instruments as a factor and, at the same time, a component of digitalisation in tourism at the level of investors, entrepreneurs and consumers required in-depth research. The purpose of the article was to identify systemic features, competitive advantages and risks, and to comprehensively substantiate the directions of implementation of digital financial instruments in the activities of tourism enterprises, taking into account their content, functions, capabilities, and factors of attraction to ensure competitiveness.

## MATERIALS AND METHODS

The theoretical basis of the article is the scientific provisions of the economics of tourism business enterprises regarding their organisation, internal and external business environment; digital technologies and digital finance, primarily their content, structure, principles, feasibility, effects, risks of use; determination and economic assessment of the competitiveness of tourism enterprises, competitive

advantages and risks of their management (Ihnatenko *et al.*, 2024; Razumkov Centre, 2025). In the course of the research, system-structural analysis and synthesis were used to determine the main directions of functioning of tourism enterprises in the context of digitalisation, analysis of information and digital technologies in ensuring their efficiency and competitiveness, and the place of digital financial instruments in their totality.

Also, with the help of system-structural analysis and synthesis, the structure and components of digital financial instruments as a systemic formation are substantiated; the factors, advantages and risks or disadvantages of their use are identified. With the help of factor analysis, the influence of internal and external environment factors on the possibilities and efficiency of attracting digital financial instruments in the activities of tourism enterprises is determined. The historical and monographic methods were used to review scientific publications on the problems of digitalisation of the tourism business in general and the use of digital financial instruments to ensure its competitiveness in particular. The authors also used the methods of economic comparisons and personal observations to identify trends and problems of using digital financial instruments in ensuring the competitiveness of tourism enterprises; assessing their bottlenecks and potential for the future; and strategic implementation priorities, taking into account the losses and damages of the war.

It is substantiated that the use of these research methods should have a logical cause-and-effect relationship and a clear sequence to ensure effectiveness, namely: determining the content, identifying trends and problems of development of tourism business enterprises and their digitalisation; establishing the components and structure of digital financial instruments, directions, volumes and efficiency of their use; assessing the impact of digital financial instruments on the competitiveness of tourism enterprises; strategic prospects and possible risks of their further use to increase the competitiveness of tourism businesses.

## RESULTS AND DISCUSSION

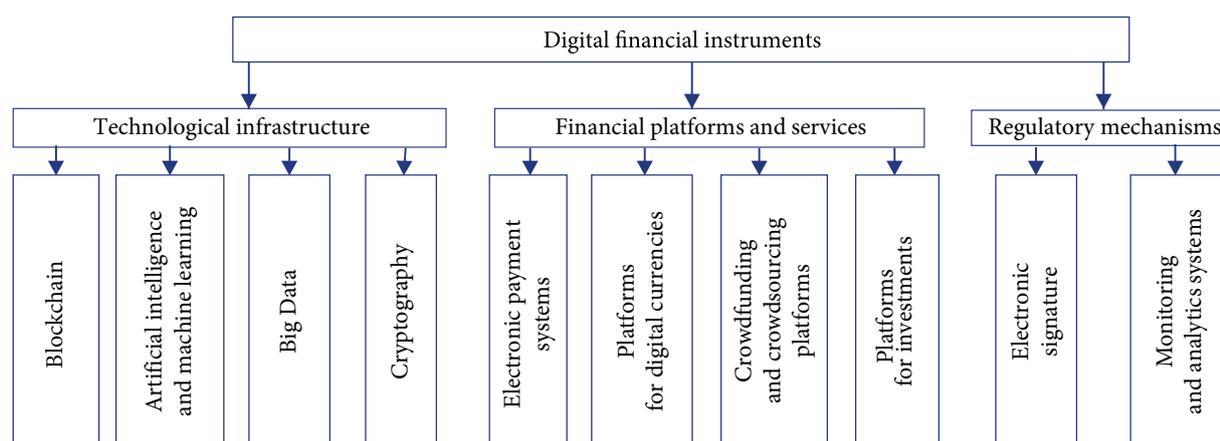
The digitalisation of all areas of life has significantly affected the sphere of tourism, recreation and travel. Pandemics, hostilities, and other risks are contributing to the increasing use of digital and information technologies (IT) in tourism activities – the development of projects and models and areas of smart tourism, virtual tours and educational tourism, etc (Mosiiuk, 2021). It is also about the digitalisation of related services or support services, such as online booking, online marketing, financial payments and settlements. On the other hand, it is in the online sphere that the demands of customers and partners in tourism have largely moved. It has been found that the massive spread of laptops, mobile phones, smartphones and other mobile devices among consumers helps to ensure prompt access to up-to-date tourism information and its effective dissemination among a large number of tourists (Bezugliy & Struk, 2024). This ensures rapid growth of tourist flows,

products and services, and thus the profitability of the tourism business. This encourages tourism enterprises to introduce radical technological innovations in their activities, management and administration. Therefore, according to O. Havryliuk (2021), 61% of their marketing budgets are spent on supporting online marketing channels. For online tourism businesses, this figure has reached as much as 73%. The role of social media and individual travel bloggers in generating demand for tourism products and services and satisfying it is increasing. Currently, 55% of travellers like their information, and another 52% of consumers have booked tours based on photos from social media.

Digital financial instruments are tools that use modern digital, information and communication technologies to conduct financial transactions and manage finances. They include a wide range of solutions that allow for payments and settlements, investments, lending, insurance, asset management, currency exchange, and many other financial transactions in a digital format. Such instruments are significantly changing the traditional financial and investment ecosystem (securities, derivatives, traditional

banking services, insurance, foreign exchange, etc.) These digital financial instruments increase the accessibility and convenience of financial services, reduce the cost of various transactions and speed them up, and increase the efficiency of the tourism business in general. Digital financial instruments include both technologies and models of organising tourism activities. They allow individuals – entrepreneurs and clients, as well as travel operators and agencies, hotel and restaurant complexes, and other accommodation and leisure facilities – to perform financial transactions using innovative new technologies such as blockchain, cryptocurrencies, financial applications, and electronic payment systems (Haponenko & Vasylenko, 2020).

From this list, it is clear that digital financial instruments are different in content, functions, and properties; they have their own organisation and functional structure. They can be represented as a system of different components with different functions, with homogeneous aggregates in their structure and construction. First and foremost, these are technological infrastructure; financial platforms and services; and regulatory mechanisms (Fig. 1).



**Figure 1.** Functional structure of the system of digital financial instruments

**Source:** compiled by the authors

The digital technological infrastructure includes important structural components, namely blockchain, a technology for distributed ledgers that ensures transparency, security, and immutability of transactions. Artificial intelligence (AI) and machine learning are tools for predicting financial risks, assessing creditworthiness, and automating financial services. They are developed by IT companies and are actively used by companies in the travel and tourism industry and other businesses. These tools not only optimise operational activities but also help to solve strategic tasks of increasing competitiveness, such as reconstructing the internal structure of tourism enterprises, their mergers and acquisitions, and other forms and directions of restructuring.

Big Data is also a technology for analysing large amounts of data, which allows tourism companies and financial institutions to make informed management

decisions based on the analysis of large amounts of information about financial relations and other activities. Finally, there is a component called cryptography. It is used to ensure the security of digital information and transactions in digital financial systems. These components are quite specific and are used mainly by IT companies, with the exception of blockchain and the digitalisation of large data sets.

The next set of digital financial instruments is formed by digital financial services and platforms. They are represented as electronic payment systems (e-wallets) – platforms for storing and transferring money in digital form, such as PayPal, Apple Pay, Google Pay, Privat24, Mono, MyRaif, etc. These payment instruments are the most commonly used in settlements by domestic tourism companies, including with individuals. Cryptocurrency platforms, i.e. platforms for exchanging, storing and conducting transactions with cryptocurrencies (e.g. Binance, Kraken), are

of great importance in this set. Crowdfunding and crowd-sourcing platforms are also platforms for raising funds or providing loans via the Internet, such as Kickstarter or Peer-to-Peer platforms. Digital investment platforms (Robo-advisors) are automated platforms that help investors make investments based on algorithms and market analysis.

In Ukraine, the first two groups of components of this set are widely used. Online fundraising and investment platforms are much less developed. However, they are well tested and have proven their effectiveness abroad. Therefore, it is advisable to intensify their involvement in the tourism industry right now – to rebuild and restore tourism enterprises in the liberated territories; return relocated enterprises; and create new tourism products in line with changes in consumer behaviour, and thus changes in

supply and demand in the tourism services markets. Their use can bring financial and investment funds in a short time, which, due to the losses of the war, are extremely necessary for domestic tourism enterprises.

The functional structure of the system of digital financial instruments includes a separate group of components in the form of digital regulatory mechanisms. First and foremost, this is an electronic signature, a digital authentication mechanism that guarantees the legal validity of electronic documents and transactions. They also include monitoring and analytics systems – tools for verifying financial transactions, fighting fraud and ensuring regulatory compliance. Digital financial instruments can be classified according to several other criteria, depending on their purpose, use and technology (Table 1).

**Table 1.** Characteristics of digital financial instruments

Digital financial instruments	Description	Example	Value	Advantages	Features
Payment cards	An electronic payment tool used for cashless payments	Pay with a Visa credit card in a supermarket	Simplifies the payment process and provides additional services, such as lending. Reduces the need for cash and increases the security of payments	<ul style="list-style-type: none"> <li>◆ speed and convenience;</li> <li>◆ access to online payments;</li> <li>◆ protection against theft (chips, PINs, 3D-Secure)</li> </ul>	Requires a bank account. Service fees may apply
Bank transfers	A financial transaction involving the transfer of funds between accounts	Payment for supplier services via SWIFT transfer	It ensures secure payments between counterparties. Allows you to make large payments and international transfers	<ul style="list-style-type: none"> <li>◆ high level of security;</li> <li>◆ transaction tracking;</li> <li>◆ possibility of automation</li> </ul>	Long processing time (especially for international transfers). Transfer fees
Electronic wallets	Online services for storing and using digital money	PayPal, Apple Pay, Google Pay	Facilitates online payments and makes them fast and secure. Increases the convenience of payments and reduces the need for physical cards	<ul style="list-style-type: none"> <li>◆ instant payments;</li> <li>◆ additional security levels (two-factor authentication);</li> <li>◆ integration with mobile devices</li> </ul>	Requires internet access. Limited acceptance in some countries
Cryptocurrencies	Decentralised digital assets for payments and investments	Payment for goods with bitcoins (BTC)	Serves as a digital analogue of cash, providing anonymity and security. Reduces dependence on traditional banking systems	<ul style="list-style-type: none"> <li>◆ low fees for international transfers;</li> <li>◆ high degree of confidentiality;</li> <li>◆ no intermediaries</li> </ul>	High exchange rate volatility. Limited use in traditional financial institutions
Mobile payments	Contactless payments via smartphone or special applications	Payment via QR code in mobile banking	Allows you to make payments quickly and securely. Simplifies financial transactions by replacing traditional payment methods	<ul style="list-style-type: none"> <li>◆ high speed and convenience;</li> <li>◆ minimal fraud risks</li> </ul>	Requires a smartphone and internet connection. May be subject to regional restrictions
Digital credit instruments	Online platforms that provide loans without the involvement of traditional banks	P2P lending through the LendingClub and Prosper platforms	Facilitate access to loans, especially for people without a credit history. Allows you to quickly get financing without intermediaries	<ul style="list-style-type: none"> <li>◆ minimum requirements for the borrower;</li> <li>◆ low interest rates compared to banks;</li> <li>◆ automated decision-making</li> </ul>	High risks for investors. Possibility of fraud and lack of refund guarantees

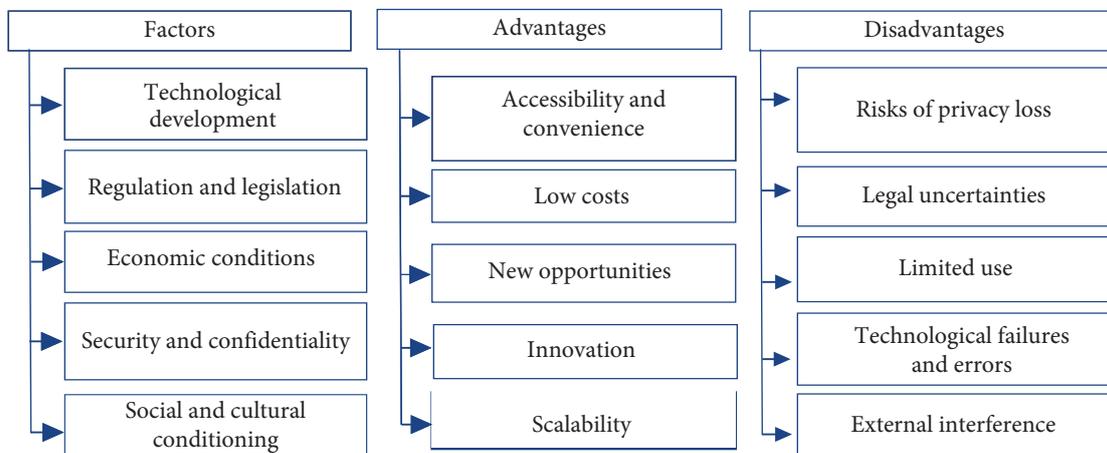
Table 1. Continued

Digital investment instruments	Platforms and services for investing in financial assets via the Internet	Investments through Robinhood, eToro, Binance	They make investing accessible to a wide range of people. They allow spreading risks and generating passive income	<ul style="list-style-type: none"> <li>◆ accessibility even for small investors;</li> <li>◆ high liquidity of assets;</li> <li>◆ automated portfolio management systems</li> </ul>	High risks (especially in the cryptocurrency sector). Requires knowledge and experience in financial planning
Digital insurance	Online services that allow you to apply for and manage insurance policies directly via the Internet	Car insurance through Lemonade or Wefox	Allows you to quickly issue insurance policies without visiting offices. Makes insurance more affordable, convenient and transparent	<ul style="list-style-type: none"> <li>◆ fast online processing;</li> <li>◆ use of artificial intelligence to assess risks;</li> <li>◆ automatic payments upon the occurrence of an insured event</li> </ul>	The list of insurance risks may be limited. Requires digital proofs and documents
Robo-advisers (automated investment management)	Algorithmic platforms that automatically manage investment portfolios	Betterment, Wealthfront	Simplifies the investment process and helps manage assets based on market analysis. Allows beginners to invest effectively without deep knowledge	<ul style="list-style-type: none"> <li>◆ minimal commissions;</li> <li>◆ use of artificial intelligence to select assets;</li> <li>◆ no emotional influence in decision-making</li> </ul>	Does not take into account the unique financial goals of the user. Dependence on algorithms
Online stock exchanges	Platforms for buying and selling stocks, bonds, cryptocurrencies, and other financial assets	Robinhood, eToro, Binance	Allows investors to access global financial markets. Makes investing more accessible and liquid	<ul style="list-style-type: none"> <li>◆ fast transactions;</li> <li>◆ access to a large number of assets;</li> <li>◆ the possibility of using leverage</li> </ul>	High level of risk. Requires knowledge of finance and markets
Personal financial managers	Applications for personal finance control, budget planning, and cost analysis	YNAB, PocketGuard	Help users keep track of their income and expenses. They improve financial discipline and help to accumulate funds	<ul style="list-style-type: none"> <li>◆ automated collection and analysis of financial data;</li> <li>◆ integration with bank accounts and payment systems;</li> <li>◆ flexibility in budget planning and forecasting</li> </ul>	Requires access to personal financial data. May be paid for or have limited functionality in the free version
Corporate financial management systems (ERP systems)	Software systems for automating financial processes in companies	SAP, Oracle Financials	Optimise costs, manage risks and financial flows. Reduce financial losses and increase business efficiency		
Analytical platforms and financial forecasting	Use big data and artificial intelligence to analyse financial trends	Bloomberg Terminal, Tableau	Analyse markets, formulate strategies for investment and financial planning. Value: They help you avoid risks and make informed financial decisions		
Financial apps	Mobile apps or programs for managing personal finances, budgeting, and tracking expenses and income	Mint, YNAB (You Need a Budget), PocketGuard, Money Lover	They facilitate the control of financial flows, help in planning expenses and accumulating savings. They allow users to effectively distribute income, avoid unnecessary expenses, and achieve financial goals	<ul style="list-style-type: none"> <li>◆ automated accounting of income and expenses;</li> <li>◆ integration with bank accounts and cards;</li> <li>◆ payment reminders and the ability to set financial goals</li> </ul>	May require access to financial data Limited functionality in free versions

Source: developed by the authors

It should be noted that in order to predict and plan further involvement of digital financial instruments in the activities of tourism enterprises in order to increase their efficiency and competitiveness, it is necessary to constantly monitor the factors that accompany their use. The

factors that influence the use of digital financial instruments by tourism business enterprises should be grouped in a certain way and supplemented by the competitive advantages and risks of digital financial technologies themselves (Fig. 2).



**Figure 2.** Factors, competitive advantages and disadvantages of using digital financial instruments in the tourism business

Source: developed by the authors

The factors of using digital financial documents by tourism business enterprises include:

- ◆ **Technological development.** One of the main factors affecting the use of digital financial instruments is the rapid development of technologies, such as information technology, programming, the Internet, mobile applications, blockchain, artificial intelligence and big data. A lack of technological infrastructure or insufficient digital literacy may limit the use of digital instruments. Ukraine has a strong tech sector. Even despite the war, the country is consistently ranked among the world’s leading IT countries (Samoiliuk, 2025). Here, especially in Kyiv, Lviv, Odesa, and other relatively safe cities in the Western region, there are offices of leading companies in the industry, including those with billions of dollars in capitalisation; there is a recognised scientific school of developers and programmers; and a high level of training of innovative personnel.

- ◆ **Regulation and legislation.** Institutions and the legal environment are an important factor in the use of both digital and traditional financial instruments. Traditional instruments are regulated in a more stable manner and have a clearly defined legal framework, while digital instruments may face greater legal uncertainty, especially in countries where the regulation of cryptocurrencies and blockchain technologies has not yet been adapted. However, in Ukraine, digital tools for social life have comprehensive state support and development (Roik, 2023; Perebyinis, 2025).

For example, in the country, digital applications can be used to open bank accounts, reissue cards, and perform other financial transactions faster than in advanced countries. The Ukrainian digital application Diia is unparalleled in terms of the number of applications, services offered,

and ease of use. Its use significantly eliminates corruption, bureaucracy, and the shadow economy in general; reduces administration time and unproductive related material and moral costs; improves the quality of governance; and promotes inclusion and social equality in society. This is especially important in times of war, as it saves Ukrainians, despite all the financial and economic advantages, from risks and dangers of life, abuse, etc.

- ◆ **Economic conditions.** In developed economies, digital financial instruments are usually more widely used due to the greater availability of internet banking, mobile applications and innovative financial platforms, and the existence of a system of innovative education, training and retraining. In an environment of economic instability, traditional financial instruments such as bonds and shares may be more attractive due to their stability. However, Ukraine has established successful online banking and travel agencies, fast and inexpensive internet and mobile communications, and accessible platforms for online bookings of all types of transport, hotels and tours around the world.

- ◆ **Security and privacy.** Digital tools require a high level of cybersecurity to ensure the safety of transactions and data storage. Distrust in the security of digital platforms can limit their use, especially in regions with a high incidence of cybercrime. Ukrainian experts are constantly working on programmes to improve and increase the level of digital security and information protection, countering not only economic hackers but also Russian military cyber criminals.

- ◆ **Accessibility and convenience, and socio-cultural relevance.** Digital financial instruments provide a high level of accessibility and convenience of financial relations

for users. They allow financial transactions to be carried out at any time and from anywhere in the world. This is an important factor for relocated businesses, other legal entities and individuals seeking speed and convenience, or for whom the use of traditional financial instruments is not possible. This factor also implies the availability of the Internet, a sufficient number of mobile communication devices, and people's willingness to use them. In countries with a high level of social trust in digital technologies, the population is more likely to use digital financial instruments. At the same time, in countries with a low level of trust in online platforms and/or a large number of older residents, traditional financial instruments may remain dominant in financial transactions. However, while the drivers for the development and adoption of digital financial instruments are favourable, their advantages and disadvantages require further study and consideration.

The advantages of digital financial instruments are: economic feasibility (they require less maintenance costs compared to traditional ones, which require special premises, service specialists and costs for their operation and maintenance); instantaneous execution; accessibility and convenience, as digital financial instruments allow financial transactions to be carried out anytime and anywhere, having access to the Internet or mobile applications. This greatly simplifies the process for users compared to traditional instruments that require a physical presence in financial institutions.

The next advantage is low costs, as digital financial instruments often do not require the costs of maintaining physical offices, a large number of employees, and therefore heating and lighting. Therefore, when used, digital financial instruments can offer more competitive prices and reduced fees compared to traditional financial institutions, services, and instruments in general. Digital platforms also provide instant or near-instant transactions, which is important for tourism businesses and individuals when the speed of financial transactions is of great importance.

It is important to continue to implement innovative developments in digital financial instruments and to develop other new opportunities on this basis. Digital financial instruments often use advanced technologies, such as blockchain, cryptocurrencies, and smart contracts, which allows for the creation of new and improvement of existing digital financial products and services that are not available through traditional financial mechanisms. A significant advantage is scalability, as digital instruments can serve a huge number of clients simultaneously without the need to increase the number of physical offices and employees.

The disadvantages of digital financial instruments are the risks of loss of personal data, trade secrets, theft of funds and other fraud. There is a certain legal uncertainty when digital financial instruments (cryptocurrencies, mining, apps, etc.) face legal and regulatory challenges due to the lack of clear rules, restrictions and standards. Currently, not all users have access to the Internet or sufficient digital skills to use digital tools. This may limit their use among older age groups. Technological failures, errors or attacks

can lead to the loss of access to accounts or funds, which can be a major problem for users.

However, the favourable factors, significant competitive advantages and continuous improvement of digital financial instruments far outweigh their risks and disadvantages. Therefore, their implementation has more and more areas of manifestation in the activities of tourism enterprises. This includes making payments, transactions, and obtaining online loans through digital applications, payment systems, cryptocurrencies, and platforms in the online business or e-commerce of tourism enterprises. They significantly increase the competitiveness of tourism enterprises due to quick access to financial resources, instant payments, reduced service costs, and customer convenience. Thus, it contributes to an increase in sales, the number of transactions, and comfort for consumers and partners.

Blockchain technologies, digital payment platforms, and cryptocurrencies help to monitor international and domestic supplies and purchases in tourism, hotel and restaurant businesses, and thus income and expenses, as well as debts; reduce currency conversion costs, improve the reliability of partnerships, and enhance the image and business reputation of tourism and other businesses. Payments through mobile applications, online booking, and digital payment processing contribute to the growth of tourist flows, improve customer service, and service administration.

Digital financial instruments such as microfinance, crowdfunding, P2P lending, and smart contracts have significant potential to increase the competitiveness of tourism businesses. They are still underutilised in the tourism industry. However, if integrated with traditional financial instruments (stocks, bonds, financial grants and donor funds in 2022-2024), their use would be a significant investment basis for rebuilding tourism and hospitality businesses due to the losses and damage caused by the war.

According to forecasts, if the current trends continue, the share of digital technologies in all sectors of Ukraine's national economy will reach 65% in 2030 (Capital Times, 2022). Therefore, the other areas of implementation of digital financial instruments in the activities of tourism enterprises, namely: financial settlements with partners, government agencies, customers; formation of capital and other financial assets; support of internal business processes; use in strategies to increase competitiveness and development will be important strategic priorities in the future. This points to the need to continue their further research and substantiation.

## CONCLUSIONS

Digital financial instruments play a key role in the modern development of business activities in tourism, providing businesses with significant advantages in various aspects. Their use allows not only to reduce costs and increase the efficiency of financial transactions, but also greatly simplifies the processes of access to finance and international transactions through crowdfunding, crowdsourcing

cryptocurrencies, etc. They provide speed and convenience in making payments, as well as facilitate the automation of many business processes, which allows for a focus on the development of strategic areas of tourism businesses.

Digital financial instruments significantly change business operations and create new opportunities for the development of the tourism business. They significantly accelerate all business processes, reduce unproductive time spent by both tourism business owners and employees, and customers. The use of digital financial instruments has significantly increased the level of comfort in the provision of travel services. Digital financial instruments also significantly reduce current cash costs, improve access to and generation of investment sources, and optimise financing processes and financial transactions. The prospects for their use are determined by the development of technologies such as blockchain, cryptocurrencies and artificial intelligence. However, in order to maximise their potential, it is necessary to address the issues of accessibility and trust in digital technologies, especially in regions with less developed digital infrastructure or among users with low levels of digital literacy. It is also about the need to continuously improve their components with functions of protection against risks and dangers. This means strengthening digital privacy protection in the field of digital finance; improving the digital development of financial instruments to increase reliability against possible intrusions by unauthorised persons, cyber thieves and other cyber criminals; and protecting against possible theft and withdrawal of funds. Preventing and avoiding cyberattacks by unfriendly countries is of great importance; ensuring military and national security in general.

Reducing the cost of developing and using digital financial instruments is also important for the future. Thus, when making digital payments, it is advisable to reduce bank interest rates, which can still be quite significant. These conclusions and proposals should be supplemented by a proposal on the need for innovative training, advanced training of employees of tourism enterprises for the effective use of digital financial instruments in their operational activities and in the future in solving strategic tasks. Given the rapid development of digital financial instruments in general, it is of national importance to promote the improvement of digital financial literacy of the population; the development of skills to access digital financial instruments; motivation and stimulation of the use of contactless payments and other digital financial opportunities. To this end, it is necessary to develop high-speed Internet, increase accessibility to digital financial transactions through national and global communications innovations. Thus, further research should focus on developing specific strategies for integrating advanced digital financial technologies, such as blockchain and artificial intelligence, into the tourism sector, as well as on creating comprehensive digital financial literacy programmes to overcome the existing challenges of accessibility, security and trust.

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## Імплементация цифрових фінансових інструментів у діяльність підприємств туристичного бізнесу для підвищення їх конкурентоспроможності

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**Анотація.** Актуальність досліджень цифрових фінансових інструментів визначається їх функціонуванням в режимі онлайн та здатністю миттєво здійснювати транзакції і розрахунки, бути економічними та доступними у використанні. Тому здійснене у статті виявлення їх особливостей та обґрунтування пріоритетних напрямів імплементації у діяльність підприємств туристичного бізнесу мали теоретичне та практичне значення для підвищення ефективності та конкурентоспроможності. Важливе значення мало визначення та використання переваг цифрових фінансових інструментів для відновлення українських туристичних підприємств через втрати війни. Було проведено аналіз монографічних та аналітичних джерел, а також практичного досвіду, що дозволило встановити: протягом останнього десятиріччя цифровізація та інформатизація стали провідними драйверами розвитку туристичного бізнесу в Україні та у світі. Було проаналізовано цифрові пріоритети основної та допоміжної діяльності туристичної галузі, зокрема електронні бронювання туристичних продуктів, місць розміщення і транспортування; e- та m-комерцію та електронні розрахунки у туризмі; цифрове страхування та кредитування; розвиток смарт- або віртуального туризму й клієнтоорієнтованості; цифровізацію документообігу, обліку, аналізу, фінансів і великих даних. Було узагальнено, що цифрові фінансові інструменти у цьому переліку представлені недостатньо. Тому було здійснено їх класифікацію з виділенням трьох сукупностей складників: цифрової технологічної інфраструктури; цифрових платіжних інструментів; цифрових регуляторних механізмів. Також визначено чинники їх залучення, переваги та ризики. Це дозволило систематизувати їх використання, що сприятиме посиленню ефективності, отже, й ефективності та конкурентоспроможності туристичного бізнесу. Також отримано висновки про необхідність їх постійного удосконалення на основі впровадження подальших інноваційних розробок; інтеграції з традиційними фінансовими інструментами для підвищення дієвості останніх та переконливості цифрових; підвищення інклюзивності на основі поширення швидкісного інтернету, мобільних гаджетів, поглиблення цифрової грамотності населення, інноваційної освіти й фахової підготовки працівників підприємств туристичного бізнесу. Стаття має практичну цінність для науковців, викладачів, студентів, практиків туристичного бізнесу

**Ключові слова:** онлайн туризм; цифрова фінансова інфраструктура; блокчейн; цифрові регуляторні фінансові механізми; інвестування; конкурентоспроможність