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## PROSPECTS FOR THE USE OF BLOCKCHAIN AND CRYPTOCURRENCIES TECHNOLOGY IN BELARUS

### ПЕРСПЕКТИВЫ ИСПОЛЬЗОВАНИЯ ТЕХНОЛОГИИ БЛОКЧЕЙН И КРИПТОВАЛЮТЫ В РЕСПУБЛИКЕ БЕЛАРУСЬ

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#### ABSTRACT

*BLOCKCHAIN, DISTRIBUTED REGISTRY  
TECHNOLOGY, SMART CONTACT, DIGITAL  
CURRENCY, CRYPTOCURRENCY, CRYPTO  
ECONOMY, MINING, BITCOIN, RATE,  
PROSPECTS*

*The article examines the essence  
and significance of blockchain and  
cryptocurrency technology, as well as  
the prospects for their use in Belarus  
today.*

#### АННОТАЦИЯ

*БЛОКЧЕЙН, ТЕХНОЛОГИЯ РАСПРЕ-  
ДЕЛЕННОГО РЕЕСТРА, СМАРТ-КОНТАКТ,  
ЦИФРОВАЯ ВАЛЮТА, КРИПТОВАЛЮТА,  
КРИПТОЭКОНОМИКА, МАЙНИНГ, БИТ-  
КОЙН, КУРС, ПЕРСПЕКТИВЫ*

*В статье рассматривается сущ-  
ность и значимость технологии  
блокчейн и криптовалюты, а так-  
же перспективы их использования  
в Республике Беларусь на сегодняш-  
ний день.*

As the term "distributed registry technology" implies, blockchain technology is based on the ability to create and share unique digital records without a centralized proxy [4].

A distributed database of this technology, consisting of blocks that include transactions (not necessarily financial), allows to preserve all information about the transactions, as well as to protect the data from unauthorized change or hacking. This solution looks more reliable than the traditional implementation: the database is the central server responsible for security system administrator.

Because of its characteristics, blockchain offers the world unprecedented opportunities to distribute rewards for economic activity with much less risk of

intercepting them and without the hidden costs [4].

Cryptocurrencies were the first mass testing of blockchain technology (distributed registry technology). The use of cryptocurrencies in monetary relations allows to increase the security and control ability of private money to be issued.

Cryptocurrency, in the vast majority of cases, is not secured by any goods and is not guaranteed by the state. Thus, its value is determined simultaneously on the basis of individual perception and how it is assessed by other members of society, i.e. the level of trust in it. Existing only in the form of code and having limited opportunities for direct exchange for goods (the function of the means of payment) cryptocurrency is nevertheless used as money. Its uniqueness in relation to fiat money is also that its limited turnover and regulation are actually ensured without the participation of the state government.

Compared to the traditional monetary system, it is difficult to "reprint" digital money and thus cause inflation to administratively limit/prohibit the use and conduct of transactions with cryptocurrencies.

To date, the scale of the use of cryptocurrencies does not give reason to believe that most subjects of the world economy are moving away from the use of fiat money in favor of cryptocurrencies. So far, there are about 1000 cryptocurrencies with a total market capitalization of \$211.7 billion, with the United States having \$114.4 billion or 54 % of bitcoin supply[3].

Everyone registered in the system can become the owner of the cryptocurrency. To do this, it is enough to create an electronic wallet, verify a personal account and keep credentials in a safe place. The wallet is ready to be deposited as soon as the registration is completed.

One way to buy cryptocurrency is mining. Mining is the use of software and technology to ensure that the registry of transaction blocks (blockchain) operates by entering into a distributed registry (according to predetermined rules and principles) information about transactions committed between users.

Despite the technical limitations and difficulties associated with the mining and circulation of cryptocurrencies (low transaction processing speed, risk of system stability, etc.), individual states are already experimenting with digital money, as well as blockchain technology. However, the importance of the prospects for using cryptocurrencies for individuals, the state, and the business vary [3].

The formation of the legal framework for the regulation of crypto-economy in Belarus began with Decree No. 8 "On the development of the digital economy" signed by the President of the Republic of Belarus on December 21, 2017.

In particular, the document defined such key concepts as "cryptocurrency", "mining", "blockchain", "smart contract", "crypto-platform operator" and others.

In addition, the rights of legal entities and individuals to own cryptocurrencies were regulated and the primary development institution in this area, the High Technology Park (HTP), was defined.

Thus, the first steps have been taken to form an institutional environment and regulatory field for cryptocurrency and blockchain activities.

According to the Decree, the leading institution responsible for developing regulatory principles in the field of cryptocurrency transactions is the High Technology Park.

Other state bodies of Belarus are also moving quickly enough in adopting the necessary regulations for the development of cryptoeconomy. Thus, in February 2018, the National Bank of Belarus amended the regulation on the rules of internal control carried out by banks, which allowed banks to open accounts to crypto-economy entities, including miners.

In 2018, the development of the Decree in Belarus was amended to the banking legislation, which establishes the procedure of banks with tokens (including cryptocurrencies), operators working with these assets. The Ministry of Finance of the Republic of Belarus, with the participation of experts, created a standard for the financial accounting of crypto assets. Thus, participants of economic relations reflect these assets in accounting (created and placed token – obligation; acquired in any way, including mining – an asset). It is worth noting that this standard is the best international experience.

In regulating the activities of the crypto-platform operator (crypto-exchange) in Belarus, the requirements for the activities of Forex companies were taken as the basis [3].

One of the essential rules implemented in the Belarus legislation is the five-year tax break. The taxation principles apply to transactions with cryptocurrencies until 2023, after 2023 the same tax principles apply to the same as for the asset, the rights to which the token certifies. In addition, there are exemptions from currency controls. [3].

In 2015, a company of enthusiasts created the first blockchain company in Belarus. The Cryptosode project was created with the aim of building the first major bitcoin mining center. Cryptosode quickly became the leader of mining in the region: today, the company owns mining farms in Belarus and China.

By the 2030s, different versions of distributed registry technologies, or blockchain, could significantly change everything from online financial transactions to ways to vote and address product manufacturing issues. Widespread use of blockchain technologies may be a turning point in history, but so far, these technologies themselves and the possibilities for their application are at an early

stage of development [5].

Belarus has made great strides in the legal implementation of everything related to the digital economy and, in particular, blockchain.

Although blockchain is moving in the material world in modest steps, it makes great strides in its "native" digital environment. By becoming the basis for bitcoin and other cryptocurrencies, blockchain has attracted billions of dollars in currency and other assets, although not without some cost adjustments. Blockchain has great potential for application in the financial industry and many prospects for the benefit, including the possibility of expanding the availability of financial services and markets by providing access to them without the need to contact the bank [5].

## Reference

1. Бабкин, А. В., Буркальцева, Д. Д., Пшеничников, В. В., Тюлин, А. С. Криптовалюта и блокчейн-технология в цифровой экономике: генезис развития // Научно-технические ведомости Санкт-Петербургского государственного политехнического университета. Экономические науки. – 2017. – № 5. – 2017. – С. 9–22.
2. Конорев, Н., Мазуров, С. Перспективы применения технологии блокчейн в Республике Беларусь // Банковский вестник. – 2017. – С. 66–71.
3. Криптовалюта и блокчейн как атрибуты новой экономики. Разработка регуляторных подходов: международный опыт, практика государств-членов ЕАЭС, перспективы для применения в Евразийском экономическом союзе. – М.: ЕЭК 2019. – 74 с.
4. Шваб, К., Дэвис, Н. Технологии Четвертой промышленной революции // К. Шваб, Н. Дэвис. – М.: Эксмо, 2018. – С. 333.
5. Myfin.by [Электронный ресурс]. – Режим доступа: <https://myfin.by/>. – Дата доступа: 24.02.2020.