

Підсекція 4.2. Інформаційні технології у цивільній безпеці

BLOCKCHAIN TECHNOLOGY IN CIVILIAN SECURITY

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The adoption of blockchain technology in civil security represents an important step towards increasing citizen security and protecting citizens' rights and freedoms. Blockchain technology is a secure, decentralised system that can be used to exchange and store data without the possibility of tampering [1]. This makes it an ideal tool to improve law enforcement and provide a more reliable system of civil security.

The purpose of this paper is to explore the applicability of blockchain technology to civil security in Ukraine, in order to identify the main benefits and potential challenges of using this technology to improve the security of citizens, and therefore the entire country [2].

The report focuses on the main benefits of using blockchain technology in civil security, as well as the possible problems and challenges associated with its implementation. Initially, the paper discusses the theoretical background of blockchain technology and how it works [3]. It then explores the main benefits of blockchain technology in civil security, such as transparency, reliability, security and the ability to create decentralized systems. Then, the potential challenges and problems in the implementation of blockchain technology in civil security in Ukraine are discussed, such as limited access to the technology, the high cost of implementation, legislative and regulatory issues [4].

As a result, based on the analyzed information, it is concluded that blockchain technology can be an important tool to improve civil security in Ukraine. It allows the creation of secure, transparent and reliable data management systems that can help improve the efficiency of law enforcement, protect citizens' personal data and combat corruption and smuggling. However, successful implementation of blockchain technology requires sufficient effort on the part of government agencies and professionals to address the potential problems associated with its use. It is therefore proposed to draw attention to the potential of blockchain technology to improve civil security, and to insist on additional research for its subsequent implementation.

References

1. Zohar A. Bitcoin: Under the Hood. Communications of the ACM, vol. 58, pp. 104-113, 2015.
2. Kshetri N. Blockchain's Roles in Meeting Key Supply Chain Management Objectives. International Journal of Information Management, vol. 39, pp. 80-89, 2018.
3. Narayanan A., Bonneau J., Felten E., Miller A., Goldfeder S. Bitcoin and Cryptocurrency Technologies: A Comprehensive Introduction. Princeton Uni Press, 2016.
4. Crosby M., Pattanayak P., Verma S., Kalyanaraman V. Blockchain Technology: Beyond Bitcoin. Applied Innovation, vol. 2, pp. 6-10, 2016.