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ON THE ISSUE OF RESEARCHING WAYS TO IMPROVE INFORMATION SECURITY IN UKRAINE

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Honcharov M.V., Honcharov A.V. On the issue of researching ways to improve information security in Ukraine.

The article explores the current issues of improving the information security system of Ukraine in the context of modern globalization processes and the growth of information threats.

The role of information security as an important component of the national security of the state is analyzed and the main approaches to assessing its condition are determined.

The key criteria for ensuring information security are considered, in particular, confidentiality, integrity and accessibility of information. Considerable attention is paid to the analysis of scientific approaches to the formation of effective state policy in the field of information space protection.

The need to improve regulatory and legal regulation, develop information and communication infrastructure and strengthen the institutional capacity of state authorities in the field of information security is substantiated. The main directions of state policy development are determined, aimed at increasing the resilience of society to information threats, developing international cooperation and implementing modern information protection technologies.

To implement state policy in the areas of protecting the national interests of the state in the information sphere, the implementation of international standards should be encouraged, investments in the development of the state's information sphere should be promoted, which means openness in relations towards the formation of a free market environment, the inclusion and support of the functioning of instruments for the legal protection of intellectual property rights and trade secrets from theft, damage or unlawful use. The generalized goal of such measures is to ensure supremacy in the application of compatible and secure standards.

A study of state policy on information security of Ukraine showed that since this industry is one of the main components of national security, this area requires constant work on improving the regulatory framework, which would effectively and properly balance the relationship between all subjects of national security, determine their limits of responsibility provided for by the Constitution of Ukraine, as well as declared rights and obligations established by regulatory acts.

Key words: information security of Ukraine, ensuring information security, national security, public administration, public information policy, protection of the information space.

Гончаров М.В., Гончаров А.В. До питання дослідження шляхів вдосконалення інформаційної безпеки в Україні.

У статті досліджено актуальні питання вдосконалення системи інформаційної безпеки України в умовах сучасних глобалізаційних процесів та зростання інформаційних загроз.

Проаналізовано роль інформаційної безпеки як важливої складової національної безпеки держави та визначено основні підходи до оцінювання її стану.

Розглянуто ключові критерії забезпечення інформаційної безпеки, зокрема конфіденційність, цілісність та доступність інформації. Значну увагу приділено аналізу наукових підходів до формування ефективної державної політики у сфері захисту інформаційного простору.

Обґрунтовано необхідність удосконалення нормативно-правового регулювання, розвитку інформаційно-комунікаційної інфраструктури та посилення інституційної спроможності органів державної влади у сфері інформаційної безпеки. Визначено основні напрями розвитку державної

політики, спрямовані на підвищення стійкості суспільства до інформаційних загроз, розвиток міжнародного співробітництва та впровадження сучасних технологій захисту інформації.

Для реалізації державної політики на напрямках захисту національних інтересів держави в інформаційній сфері слід заохочувати впровадження міжнародних стандартів, сприяти надходженню інвестицій в розбудову інформаційної сфери держави, що означає відкритість у відносинах на шляху формування вільного ринкового середовища, включення і підтримки функціонування інструментів правового захисту права інтелектуальної власності і комерційної таємниці від викрадення, пошкодження чи неправочинного використання. Узагальненою метою таких заходів є забезпечення верховенства при застосуванні сумісних і безпечних стандартів.

Дослідження державної політики стосовно інформаційної безпеки України показало, що оскільки ця галузь є однією з основних серед компонентів національної безпеки, то ця сфера потребує постійної роботи з удосконалення нормативно-правової бази, яка б ефективно і належним чином урівноважувала взаємовідносини між усіма суб'єктами національної безпеки, визначала їхні, передбачені Конституцією України межі відповідальності, а також задекларовані права та встановлені нормативними актами обов'язки.

Ключові слова: інформаційна безпека України, забезпечення інформаційної безпеки, національна безпека, державне управління, державна інформаційна політика, захист інформаційного простору.

Problem statement. Research into problems in the field of organization and implementation of measures to protect the information field of Ukraine is of paramount importance. As a component of the national security of the state, the information sphere has a powerful influence on all aspects of the functioning of society. Currently, Ukraine is implementing certain provisions of the European Union legislation in the areas of development and implementation of control taking into account a multi-level policy in the information sphere (global; European Union level, national level). Therefore, to deepen the scientific value of the study, it is advisable to analyze the mechanisms of formation and implementation of information policy in countries with a high level of development in order to identify positive practices and apply them to Ukrainian practice.

By improving the organizational principles of state policy in the field of information security of Ukraine, it is predicted to bring it into line with high standards (primarily the USA) regarding the reform of an integral economic and legal sector, namely the information and communication sector. This approach fully corresponds to the constitutional provisions stipulated in Article 9 of the Fundamental Law (regarding the formation of national legislation and the inclusion in it of international legal acts ratified by the Verkhovna Rada of Ukraine).

The state of the development of the problem. The state of the development of this problem. The study of this issue was paid attention to by many scientists and researchers: Bilenchuk P.D., Bilko S.S., Hnatiuk S.L., Hryhorchuk M.V., Dzyoban O.P., Dovgan O.D., Zolotar O.O., Kosilova O.I., Kudin S.V., Lipkan V.A., Loginov O.V., Novitska N.B., Tkachuk T.Yu., Tikhomyrov O.O., Frantsuz A.Y., Tsymbalyuk V.S., Shevchenko A.Ye., Yarema O.G. and others.

The purpose of the study. The purpose of this work is to consider ways to improve information security in Ukraine.

Presentation of the main material. Compliance with the criteria of the modern level of state policy on ensuring information security is a rather complex task, requiring the analysis of a wide range of problems, directions and their interpretation in the organizational and legal field, as a basis for the development and necessary improvement of the national security system. It should be based on a methodology as a research tool for assessing the activities of state administration bodies in providing guarantees of information security not only to a private individual or social groups, but to society as a subject of legal relations in this sphere.

According to S.V. Kovtun, the criteria for assessing the state of information security can be the "information status" of the subjects implementing it (the ability of individuals to use the information space, provision of all necessary means, the level of information education, etc.); the development, accessibility and reliability of information and communication networks; the development, reliability, systematization and convenience of information resources, etc. [1, p. 88].

To characterize the criteria for information security, it is recommended to use the CIA Triad model (English – CIATriad), which provides for the use of three basic qualities of information security, namely: integrity, availability and confidentiality.

Yu.V. Nesteryak believes that in general, the main criteria for international information security, in addition to protecting information resources in order to ensure their confidentiality, protecting data from unauthorized modification or destruction, should also include «ensuring the operability of systems using technology to counter threats» [2, p. 43–45].

In the context of globalization and free circulation of information, the comprehensive nature of the assessment of current threats to national security in the information sphere is of great importance. Such an approach requires, first of all, the identification of effective tools that would correspond to the level of threats arising from the use of information and the functioning of the information resource protection system.

It is for this purpose that it is necessary to form effective management activities, which should be considered in two aspects: management of technical systems and influence on social processes for organizing activities on the way to fulfilling the tasks set [3, p. 113].

We note in passing that the specified topic has been deeply and comprehensively studied from the standpoint of legal aspects, as evidenced by early and more modern results of scientific work, some of which we will refer to as the basis for our future author's generalizations.

V. Shatun and O. Gladun, studying the issues of information security functioning in the structure of national security, note that the events of recent years in our country have shown the inability to resist information wars, since the problems of information policy have not yet been resolved at the proper level [4, p. 179].

A team of scientists consisting of M.F. Kryshchanovich, Ya.Ya. Pushak, M.I. Fleychuk and V.I. Franchuk believe that when choosing criteria for determining the effectiveness of political and state measures in the areas of stabilizing the situation in the field of information security, it is necessary to focus on indicators [5, pp. 154–161], which we will comment on and present in the author's edition.

Among the instruments aimed at establishing law and order in the sphere of information use, it is advisable to consider the possibility of strengthening criminal liability for the intentional public dissemination of knowingly false information, which is committed to sow anxiety, panic and fear among citizens, incitement to offenses and crimes aimed at harming the established order of the functioning of the information environment, as well as failure to comply with lawful orders of representatives of the state and local authorities. Such legislative activity becomes particularly relevant in conditions of martial law, when Russian hostile propaganda uses all possible and available sources in order to undermine the patriotic spirit of the Ukrainian people in their resistance to their aggressive actions, and also carries out cyberattacks and fake postings to form a false information environment outside Ukraine.

Further active work on the development of national legislation in the field of information security, bringing it into line with international requirements, namely, adaptation to the highest standards in ensuring the right of a person and the state to information, and the legality of its use, will clearly contribute to increasing the level of effectiveness of measures to counter threats in the field of information use, as well as increasing Ukraine's authority in the eyes of international partners.

Such an approach will contribute to the formation of true information independence of Ukraine, the establishment of the foundations of information sovereignty, which involves improving the entire information sphere based on the introduction of effective mechanisms of legal regulation, the use of updated and new tools of a technological and protective nature, the dissemination of reliable information about Ukraine on the domestic market and international media resources. The active involvement of media representatives in covering destructive phenomena and events that threaten not only information security, but also encroach on the foundations of national security will also have a positive impact.

At the same time, it should be noted that such activities should be carried out in strict compliance with constitutional guarantees and current legislation, which regulate issues of information security and the procedure for using open and closed databases. A special safeguard for stabilizing positive changes in the field of information dissemination is the task of preventing abuses by representatives of state authorities and local self-government, that is, bringing such work into line with the provisions of Article 19 of the Constitution of Ukraine.

In our opinion, the main burden in resolving this issue should be distributed as follows:

- assessment and analysis of the conceptual foundations of information security, its principles, standards and rules, which would correspond and comply with the provisions of current legislation, as well as establish the principles of a holistic mechanism for protecting the state's information environment;
- systematic monitoring of sources of threats to information security, based on the results of which to identify new objects and update or set new goals;
- the state of resistance of society in view of the scale of the IPSO, the introduction of competitive recruitment for positions in structures responsible for organizing counteraction to hostile and destructive manifestations in the field of information support, etc.

Thus, it can be argued that ensuring the proper state of information security in Ukraine has become a serious problem that reaches the most vulnerable elements in the structure of society, namely the

individual, communities of people, state institutions, local governments and other economic entities. At this stage of historical development, it is necessary to apply comprehensive measures of a nationwide nature, using the tools of lawmaking, state building and legitimate coercion to fulfill the requirements of the established procedure for using and accessing information and information resources.

We are also convinced that the formation of a competitive and sufficiently resistant to sources of internal and external threats information security system of Ukraine, as well as the development of effective strategies and tactics to counter various information threats should become priority tasks for state authorities, non-state institutions and organizations and the conduct of scientific research.

Given the above, it is possible to identify the main vectors along which state policy in the field of ensuring information security should develop. In our opinion, it is appropriate to include the following areas:

- 1) establishment and expansion of constitutional guarantees for the protection of the human right to information;
- 2) improvement of the system for countering information threats in the field of information security as part of measures to maintain national security;
- 3) creation of reliable instruments for protecting the economic interests of Ukraine with the support of technological and media resources of the information sphere.

In this regard, it is necessary to clearly understand the role and importance of a comprehensive approach to solving this triune task, since the separate or segmental implementation of individual components will not bring the expected result in ensuring compliance with proper information order in all spheres of life of Ukrainian society.

To implement state policy in the areas of protecting the national interests of the state in the information sphere, the implementation of international standards should be encouraged, investments in the development of the state's information sphere should be promoted, which means openness in relations towards the formation of a free market environment, the inclusion and support of the functioning of instruments for the legal protection of intellectual property rights and trade secrets from theft, damage or unlawful use. The generalized goal of such measures is to ensure supremacy in the application of compatible and secure standards.

A study of state policy on information security of Ukraine showed that since this industry is one of the main components of national security, this area requires constant work on improving the regulatory framework, which would effectively and properly balance the relationship between all subjects of national security, determine their limits of responsibility provided for by the Constitution of Ukraine, as well as declared rights and obligations established by regulatory acts [6, p. 145-150].

In particular, it is advisable to develop the Law of Ukraine «On Economic and Information Security of Ukraine», as well as the Concept of Legislation in the Field of Economic and Information Security, as well as the corresponding Program for the Preparation of Regulatory and Legal Acts Related to Ensuring the Effective Functioning and Protection of the Right to Use Information by Participants in the Economic Sphere and Relevant to This Activity by Subjects of Governmental Powers and Representatives of Ukrainian Society. Such actions will contribute to the regulation of legal relations in the information sphere on the principles of democracy, which, in turn, will make it possible to avoid chaos and unsystematicity in the indicated areas in order to maintain the proper level of the rule of law.

Conclusions. Taking into account the above, it became possible to propose specific options for actions aimed at achieving high international requirements for entering global information networks. Such actions may include:

- 1) strengthening the influence in the sphere of regulatory and legal relations of state authorities as managers of protection mechanisms in the dissemination of information;
- 2) developing a program for forming a list of regulatory and legal acts of state authorities and acts of local self-government in order to bring them into a single accounting system with the provision of appropriate access to users (within the permitted limits);
- 3) accelerating the implementation of the latest information and communication technologies, developing appropriate programs to provide citizens with the opportunity to receive high-quality information protected from unauthorized modification;
- 4) ensuring the organization and conduct of various information campaigns among the general public;
- 5) strengthening cooperation with various national and international public organizations.

Therefore, the current stage in the development of Ukraine in the areas of information security protection requires an increase in the level of state participation in these processes, the organization and provision of control over all subjects of the information sphere from the standpoint of assessing the legality of their use and utilization of information.

REFERENCES:

1. Kovtun S.V. Information security: textbook. Kharkiv: Publishing house of KhNEU, 2009. 368 p.
2. Nesteryak Yu.V. International criteria for state information security: theoretical and methodological analysis. Bulletin of the National Academy of Sciences of Ukraine. 2013. No. 3. P. 40–45. URL: file:///C:/Users/%D0%90%D0%BD%D0%B4%D1%80%D0%B5%D0%B9/Downloads/Pubupr_2014_1_11.pdf (access date 03/14/2026).
3. Ways to improve the system of state management of ensuring national security of Ukraine: monograph. [G.P. Sytnyk, V.I. Abramov, O.G. Bortnikova, M.M. Shevchenko and others]; [ed. G.P. Sytnyka, V.I. Abramova]. Kyiv: NADU, 2012. 536 p.
4. Shatun V. T. Information security is an integral component of the national security of Ukraine. Scientific works of the Petro Mohyla Black Sea State University of the Kyiv-Mohyla Academy complex. 2016. T. 267. Issue. 255. P. 174–180.
5. State policy of ensuring the national security of Ukraine: main directions and features of implementation.: monograph. [M.F. Kryshchanovych, Ya.Ya. Pushak, M.I. Fleychuk, V.I. Franchuk]. Lviv: Spolom, 2020. 418 p.
6. Honcharov M. V. Theoretical and legal foundations of information security regulation in Ukraine: dissertation ... candidate of legal sciences: 12.00.01. Irpin, 2023. 215 p.

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