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**PROSPECTS OF DISTANCE EDUCATION AND  
VIRTUAL UNIVERSITIES IN UKRAINE**

**Abstract.** *The main features and principles of distance education have been characterized, and its advantages have been outlined. The concept of a virtual university has been considered, and the system of its work has been analyzed. The essence of virtual universities is that studying at the faculty is replaced by a list of training courses necessary to obtain a certain educational and qualification level. The university is turning into a global organization, and at the center of the educational process is not the professor who gathers an audience around him, but the student who is served by the professors. In view of this, it should be recognized that the virtual university paradigm significantly changes the cultural environment.*

**Keywords:** *distance education; distance learning; virtual university; information technology.*

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**ПЕРСПЕКТИВИ ДИСТАНЦІЙНОЇ ОСВІТИ ТА  
ВІРТУАЛЬНИХ УНІВЕРСИТЕТІВ В УКРАЇНІ**

**Анотація.** *Охарактеризовано основні ознаки та принципи дистанційної освіти, окреслені її переваги. Розглянуто поняття віртуального університету, проаналізована система його роботи. Сутність віртуальних університетів полягає в тому, що навчання на факультеті замінюється списком навчальних курсів, необхідних для отримання певного освітньо-кваліфікаційного рівня. Університет перетворюється на глобальну організацію, а в центрі навчального процесу знаходиться не професор, що збирає навколо себе аудиторію, а студент, якого обслуговують професори. З огляду на це слід визнати, що парадигма віртуального університету суттєво змінює культурне середовище.*

**Ключові слова:** *дистанційна освіта; дистанційне навчання; віртуальний університет; інформаційні технології.*

**Introduction.** The emergence and active spread of remote forms of self-training is an adequate response of the education systems of many countries to the world's globalization processes. That is why the need for research and implementation of the experience of the world's leading universities in the implementation of distance learning is intensifying. The study of distance education development in higher educational institutions of different countries makes it possible to trace the originality of its formation for adaptation in the educational space of Ukrainian high schools. Taking into account the indicated trends, everyone who aspires to be a qualified and highly paid specialist cannot use only the knowledge acquired in the course of studying at school or university, but must constantly update his knowledge base with the help of the achievements of modern science and technology.

The basis for defining the concept and essence of distance education is laid in the works of Ukrainian researchers V.Yu. Bykov, O.V. Vasylenko, P.V. Dmytrenko, T.M. Kalyuzhna, K. Korsak, V.V. Kolos, V.M. Kuharenko, Yu.A. Pasichnyka, P.V. Stefanenko, B.I. Shunevych, and others, who substantiated the conceptual foundations of the distance education system.

The works of L.B. Lukyanova, R.V. Sharan, G.O. Kozlakova, E.A. Kubicheva, V.E. Krasnopolsky, Yu.I. Mashbyts, T.V. Yashchun, and others are devoted to solving the

psychological and pedagogical problems of the effective use of information technologies in the education system.

However, distance education and distance learning are multidimensional phenomena, variable in time and technology, and therefore, encourage scientists to further research, description, and analysis.

**Setting objectives.** Lifelong learning was recognized as one of the main principles of modern higher education in the final communique of the meeting of the Bologna Process observers (Prague, 2001). Implementation of this principle is possible due to the intensive application of distance learning as a progressive pedagogical technology based on modern achievements in the field of information and telecommunication technologies.

**Research results.** Distance learning (DL) is widely used in the USA, Western European countries, Australia, and other developed countries. DL is used for basic higher education, retraining, advanced training, postgraduate education, and various courses. All the mentioned terms share common features such as the use of information technologies to provide educational services; the possibility of communication between the student and the teacher online; remote access to educational materials.

The project of the world's first distance education university was launched in 1960 in Great Britain and was named Open University. The Open University was founded by the Queen of Great Britain herself, and the speaker of the House of Commons was appointed chancellor (rector), that is, everything was done to make the university both massive and prestigious at the same time. The name of the university was chosen to show its accessibility due to the low price and the possibility of not often attending classroom studies. Now, about 200,000 students study at the university annually.

The French National Center for Distance Learning (CNED) was founded in 1969. The scale of its activities is evidenced by the following data: the number of training courses – 2.5 thousand, the number of users – 350 thousand, branches in 120 countries of the world, and 5 thousand teachers participate in the development of training courses and educational activities.

Other old centers of distance education in Europe are the National University of Distance Education (UNED) in Spain (58 study centers in the country, 9 abroad) and the Baltic University (BU) with headquarters in Stockholm, which unites 10 countries of the Baltic region. In 1987, the European Association of Distance Teaching Universities was founded, which later grew into the European Open University, which includes 17 organizing members from 15 countries.

Analyzing the peculiarities and principles of the organization of the distance learning system, the president of the National Academy of Sciences of Ukraine, academician of the National Academy of Sciences of Ukraine V.H. Kremen noted that distance learning is a tool for solving modern tasks of education modernization.

The system of distance learning in Ukraine is currently at the stage of active development and provided a reasonable approach (use of world experience, combination of advanced technologies of distance learning with the best technologies and methods of classical forms of education) it can have many prospects [4].

Distance education has a number of advantages over other forms of education. Thus, practically without leaving home or without leaving your workplace, you can maintain regular contact with the teacher using telecommunication technologies, including video communication, and receive structured educational material presented in electronic form. An insignificant part of the educational process of distance education in terms of time and volume can be carried out face-to-face (exams, practicals, laboratory work, etc.) [6].

The main characteristic features of DL, following the above-mentioned Concept of Distance Education Development, are:

- flexibility: pupils, students, and trainees receiving distance education mostly do not attend regular classes, but study at a convenient time and in a convenient place;
- modularity: the distance education program is based on the modular principle; each separate course creates a holistic view of a separate subject area, which makes it possible to form a curriculum that meets individual or group needs from a set of independent courses-modules;
- parallelism: training is carried out simultaneously with professional activity (or with training in another direction), that is, without separation from production or another type of activity;
- large audience: simultaneous access to many sources of educational information for a large number of pupils, students, and listeners, communication using telecommunications between students and teachers;
- cost-effectiveness: effective use of training areas and technical means, concentrated and unified information presentation, and use and development of computer modeling should lead to a reduction in the costs of training specialists;
- social equality: equal opportunities to receive an education regardless of the place of residence, state of health, and social status [1].

Of particular importance for the characteristics of distance education is its quality, which should not be inferior to the quality of face-to-face education, since the best professors and teaching staff are involved in the preparation of didactic tools and the most modern educational and methodological materials are used; the introduction of specialized quality control of distance education for compliance with its educational standards is foreseen [2].

Organizational structures engaged in distance learning in the field of higher education can be conditionally divided into the following models:

- Supplementing traditional university education. The vast majority of higher education institutions providing distance education are traditional universities, institutes, and colleges. Such institutions offer some disciplines or even entire programs as part of distance education. Students of this form of education are enrolled in an educational institution according to the traditional scheme, and work with the same teachers as full-time students. The difference is only in communication: teachers create sites on the Internet that complement their courses and provide access to knowledge to students who are outside the educational institution.

- Consortia. There are various agreements under which several educational institutions (universities) are united through a state or regional network in order to provide distance education programs to those who wish to do so. The right to grant a diploma (certificate) or credit hours is reserved by the educational institution, not by the consortium. An example of such a model of a distance learning organization is the so-called Educational Network of the State of Maine (The University of Maine System, created on the basis of the University of the State of Maine in 1988 to serve the higher educational institutions of this state.

- Agreements between higher education institutions, teachers, and providers regarding the provision of distance education services. Unlike consortia, the right to provide a document on education under such agreements belongs to the structure that arises as a result of the signing and implementation of the agreement, and not to the institutions that signed the agreement. As an example of such a structure, there is the Governors State University, which today cooperates with 25 local colleges throughout the country, providing "adult" students with the opportunity to obtain a higher education at the bachelor's level, being at home.

- Virtual universities. This type includes higher education institutions that provide most of their programs using modern technology. Examples of such organizational structures are the Open University and the Internet University of Information Technologies.

In Ukraine, supplementary distance learning courses for basic university education prevail, and virtual universities.

The modern society of the world's developed countries is increasingly acquiring features of the information society, where information and knowledge are the main products. The information society is characterized by the following features: increasing the role of information and knowledge in society's life; increasing the share of information communications, products and services in the gross domestic product; creation of a global information space that ensures effective information interaction, access to global information resources and satisfaction of people's needs regarding information products and services.

In the information society, knowledge turns into the crucial factor of social development. For most developed countries, the rate of basic long-term growth of the economy depends on the support and expansion of the global knowledge base, which has become possible in the conditions of the information society. Today, these countries are building their knowledge-based economies; millions of jobs related to the use of the latest knowledge are created there.

The economy of developed countries is determined even less by the wealth of natural resources or cheap labor and more and more by the application of knowledge and scientific innovations. In this regard, the demands of society itself for the education, scope, and extent of knowledge of a specialist and an average citizen have noticeably changed and continue to change; it applies to Ukraine as well. The information society requires a new level of education and new approaches to providing and receiving it. These requirements are due to the more active involvement of people in processes that require a high level of specialized education, as well as the constant need for retraining of employees, since technologies are developing very quickly and, accordingly, knowledge quickly loses relevance. A modern higher educational institution must promptly change educational courses, and methods of teaching these courses, and anticipate changes in the demands of consumers of educational services.

New educational technologies have led to the creation of distance learning and a new generation of educational institutions – virtual (electronic) universities, which should make education more accessible and raise it to a qualitatively new level. The very term "virtual university" is used to denote any organization that provides educational services using modern means of informatization: personal computers, telecommunication networks, information systems, and technologies. At the same time, some universities provide interactive learning within their university courses, while others offer courses exclusively online. The essence of virtual universities is that studying at the faculty is replaced by a list of training courses necessary to obtain a certain educational and qualification level. The university is turning into a global organization, and at the center of the educational process is not the professor who gathers an audience around him, but the student who is served by the professors. Because of this, it should be recognized that the virtual university paradigm significantly changes the cultural environment. Therefore, it is essential not to overestimate the role and place of the student in the educational process and to preserve the relevant moral guidelines and traditional ideas about the purpose of education so that the student does not feel like a client to whom everyone is obliged to serve [3].

The idea of a virtual university as an institution that uses computers and telecommunications instead of buildings and transportation for student-faculty interaction in university courses was first published by Tiffin J. and Rajasingham L. in the monograph "In search of the virtual class. Education in an information society" (London, N.Y., 1995). At the

same time, in 1995, the Open University of Catalonia became the first virtual university that carried out studies exclusively with the help of computers and telecommunications [8].

A number of other universities have been involved in pioneering initiatives and experiments since the late 1980s, which first took place in a joint project between the University of Victoria in New Zealand, the University of Hawaii, Ohio State University, and Waseda University. The essence of the project is to conduct classes and courses at the international level with the help of telecommunications. This led to the concept of the global virtual university (Tiffin, Rajasingham (2003) "The Global Virtual University", London-New York, Routledge).

As can be seen, virtual universities are created, as a rule, thanks to the efforts of several educational institutions, which can be located not only in different corners of the same country but also on opposite sides of the world. This makes it possible to attract the best scientific and pedagogical personnel to the development of educational programs and courses, and the student, in turn, can independently choose which university diploma he wants to receive as a result.

Thus, it should be emphasized that the distance learning system and virtual universities in Ukraine should have a future, despite the subjective attitude of each of us to global informatization processes [9]. Otherwise, taking into account the dynamics of the increase in the number of the population that has access to the Internet, after some time we will be able to face the problem when domestic youth will get all the opportunities to study at a Western university without leaving home, and Ukrainian higher education institutions will remain aloof from these processes. Therefore, it is necessary to work on the creation of virtual universities in Ukraine, and it is essential to approach the solution to this problem as carefully as possible.

First, as we have already noted, it is necessary to centrally develop uniform standards for distance education, as well as introduce mandatory accreditation of distance education institutes, virtual universities, and certification of distance courses and evaluation systems that will be used by higher educational institutions for distance learning. Secondly, it is necessary to determine an exhaustive list of specialties for which training cannot be conducted entirely by remote technologies. Thirdly, it is necessary to retrain and improve the qualifications of personnel for working with distance learning technologies. In addition, the study, which will be completely transferred to a distance form, may lead to the fact that other persons will perform the tasks instead of the student, and he will receive the diploma as a result [7]. Therefore, in our opinion, when conducting distance learning and in the activities of virtual universities, one should not refuse to conduct the final control of knowledge in the form of direct contact between the student and the teacher. Only then this form of education will become an effective means of acquiring knowledge for those people who are capable of independent work.

**Conclusion.** Solving the new tasks set before the education system of Ukraine through the processes of state formation, and radical changes in the social and political life of society requires the development of an adequate organizational structure for the education system, which would ensure the transition to the principle of "education throughout life." The solution to this problem can be found through the distance learning system. As can be seen from the research, the role of the student increases during distance learning, and the teacher only helps him organize the educational process. The creation of distance education centers in higher educational institutions made it possible to organize the training of university teachers in the development of distance courses and help in the implementation of such courses in the educational process.

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