

THE USE OF BLENDED LEARNING METHODS IN A HIGHER EDUCATION INSTITUTION

The article establishes the theoretical principles of improving the quality of higher pedagogical education by means of information and communication technologies in the conditions of European integration and the necessity of forming the digital competence of future professionals in a Higher Education Institution.

The methodological principles of the application of the model of mixed learning are defined: complexity, scientific strategy, consistency, fundamentalism, nonlinearity, unity of social and individual professional, link between theoretical knowledge and practice, reflexive creativity. It is proved that the process of Blended Learning involves taking into account a number of general didactic principles: awareness, activity and independence of students, scientific approach and accessibility of the content of education, adaptability, mobility, visibility, systematic approach and consistency of learning, stimulation and motivation, taking into account the individual characteristics of students, interactivity, openness of the educational process, emotionality of learning and its connection with life, etc.

The article describes the experience of Vasyl Stefanyk Precarpathian National University in using the method of Blended Learning while teaching students. It highlights the main directions of activities of University scientists in the framework of the international project of the EU program Erasmus+ KA2 "Modernization of Pedagogical Higher Education by Innovative Teaching Instruments (MoPED)" (№586098-EPP-1-2017-1-UA-EPPKA2-CBHE-JP) on the introduction of innovative technologies in the conditions of the reformation of the education system in Ukraine.

Key words: Higher Education Institution, information and communication technologies, e-Learning, Distance Learning, Mixed Learning, Online Learning, educational process.

The article establishes the theoretical principles of improving the quality of higher pedagogical education by means of information and communication technologies in the conditions of European integration and the necessity of forming the digital competence of future professionals. The author emphasizes that in connection with the development and practical use of new information and communication technologies (ICTs), education undergoes significant changes, and in particular the e-Learning methods nowadays are the subject of wide introduction in the education system of foreign countries. The tools and technologies of information and communication networks, in particular the Internet, which form the computer technology platform of the learning environment of the modern educational system, have become further developed. This brings forth the problem of preparing teachers for the modernization of higher education institutions' training on the use of methods and means of formation of the informational educational environment, the creation of an appropriate information resource.

The digital competence of the individual is considered as a system of knowledge, skills, attitudes that are necessary for the use of information and communication technologies and digital media for task fulfillment, problem solving, communication, information management, cooperation, creation and distribution of

content, etc. Therefore, the author considers the digital competence of the teacher as the information literacy, the culture of using data and communication in the information space, the ability to create relevant digital content and to apply innovative educational resources. Accordingly, digital competence also implies the awareness of legal and ethical principles regarding the use of various electronic resources, digital technologies, the ability to critically assess the reliability of the information received and to properly use digital media for personal, professional or social purposes.

Among the innovative teaching tools, the article singles out the Blended Learning method and outlines the features of its application in higher education institutions. The author finds that Blended Learning is a focused systemic process of interaction between subjects of learning, which organically combines traditional and distant learning models, occurs in the classroom and beyond it, in synchronous or asynchronous modes, implies the widespread use of ICT in the work with students.

The methodological principles of the application of the model of mixed learning are defined: complexity, scientific strategy, consistency, fundamentalism, nonlinearity, unity of social and individual professional, link between theoretical knowledge and practice, reflexive creativity.

It is proved that the process of Blended Learning involves taking into account a number of general didactic principles: awareness, activity and independence of students, scientific approach and accessibility of the content of education, adaptability, mobility, visibility, systematic approach and consistency of learning, stimulation and motivation, taking into account the individual characteristics of students, interactivity, openness of the educational process, emotionality of learning and its connection with life, etc. The author singles out specific characteristics regarding the principles of traditional and distance learning of students. Thus, if traditional learning is aimed at solving the problems of training, education and development of a young person in their organic interconnection, then in the distance education, the priority principle involves creative character of learning (research) activity when solving the tasks of self-education and self-development. Systematic and consistent approach in electronic learning, according to the author, is focused on

the individual learning path, and the principle of scientific approach is aimed at meeting the needs and demands of students, free choice of their own activities, respectively. Accessibility and visibility in traditional education are replaced by the principles of taking into account the student's individual characteristics during development of e-Learning courses, as well as virtualization and systematic structuring of the content of education.

It is highlighted that the implementation of the Blended Learning model with an emphasis on the singled out principles in higher education will allow expanding the educational opportunities for students, encouraging them to identify their own position, personalizing learning, and transforming the style and image of the teacher. After all, modern e-technologies are not only aimed at ensuring students' activity, they also enable the management of this process, unlike most traditional educational environments. Creation and use of the latest digital educational content involves an integration of sound, moving image, text, which creates a substantially new research environment for learning (research) activities with extremely bright opportunities, and, consequently, the level of activity and involvement of a student in the learning process.

The author describes the models that are often used in the application of Blended Learning method in higher education institutions (by C. Christensen):

1. Rotation Model requires the alternate use of the learning in which a teacher and a student (or a group) interact directly, and the learning in which the interaction between subjects of learning is carried out using ICT. It is divided into Station Rotation Model or In-Class Rotation Model, Lab Rotation Model, Flipped Classroom Model, and Individual Rotation Model.

2. Flex Model of learning process is based on distance learning.

3. Self-Blend Model or A La Carte Model allows students to supplement traditional lessons with topical online courses.

4. Enriched Virtual Model implies the independent learning of the main part of the educational material by the students using e-courses; accordingly, the consultations with the teacher, if necessary, take place face-to-face or (and) in online mode.

It has been found that the analysis of existing models of Blended Learning requires the choice of an effective ratio of various methods, techniques and forms of learning organization used, that is, the establishment of an optimal combination of traditional technologies and methods of e-Learning. During the preparation of teachers for the use of Blended Learning, it is important to model the pedagogical situations in which students can gain some practical experience, identify and successfully implement an individual learning path through the interactive opportunities of all participants in the educational process.

The article describes the experience of Vasyl Stefanyk Precarpathian National University in using the method of Blended Learning while teaching students. It highlights the main directions of activities of University scientists in the framework of the international project of the EU program Erasmus+ KA2 «Modernization of Pedagogical Higher Education by Innovative Teaching Instruments (MoPED)» (№586098-EPP-1-2017-1-UA-EPPKA2-CBHE-JP) on the introduction of innovative technologies in the conditions of the reformation of the education system in Ukraine.

The Blended Learning Model at Vasyl Stefanyk Precarpathian National University, according to the author, is implemented in the context of the combination of traditional and distance learning. For this purpose, the Educational and Scientific Center for Quality of Educational Services and Distance Learning (<http://www.d-learn.pu.if.ua/>) was created in the structure of the University in 2004 with the goal of implementation of the modern ICTs of learning, primarily the distance learning, in the educational and research process. The main tasks and directions of the Center's activities are as follows: introduction and management of the distance learning system at the University; preparation and management of the work of local administrators of distance learning; marketing of educational and scientific-methodical services of the University in the field of distance learning; training of developers and tutors of distance learning courses; carrying out scientific, methodical and pedagogical research on the theory and practice of distance learning; monitoring and implementation of innovations in the field of software and hardware for distance learning; ensuring cooperation of the University with national and international educational institutions and other participants at the e-Learning market.

On the EduPRO platform for e-Learning, students have access to the uploaded learning resources from almost all disciplines studied at the University. It is proved that the process of Blended Learning ensures the expansion of learning and research opportunities of higher education students and the interactive communication between the teacher and students. In a certain way, this stimulates the formation and development of the necessary system of key competencies, abilities to solve various professional tasks. It is important that the elements of online learning enable the independent work of students on learning or consolidate the material in a convenient place, at the required pace, at any time, etc.

The article concludes that several years of the implementation of the innovative Blended Learning at the University increase the effectiveness of the educational process on the acquisition of professional competences by students; the diversification of types of control and pedagogical communication in education; the enhancement of the motivation of educational activities of future specialists; the opportunities for learning the latest methods and forms of work with students; the level of organizational culture in professional training, etc.



«The article has been prepared in the framework of the Erasmus+ project "MoPED – Modernization of Pedagogical Higher Education by Innovative Teaching Instruments", No. 586098-EPP-1-2017-1-UA-EPPKA2-CBHE-JP. This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein».