# THEORY AND INSTITUTIONS OF EDUCATION

## LANGUAGE AND LITERATURE E-LEARNING DURING THE COVID PANDEMIC AND THE WAR IN UKRAINE

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**Abstract.** The article focuses on the peculiarities of e-learning during the COVID pandemic and the war in Ukraine. It is highlighted that modern higher education requires the introduction of information and communication technologies into the system of higher education graduate training, which allows to conduct a high-quality educational process in a distance format. The phenomenon of information and communication competence of the student, the future teacher of the field of language and literature, which is an urgent need of modern rapid changes in the conditions and needs of society, is defined. It is emphasised that the solution to the problem of education modernisation in Ukraine through the rapid development of information technologies is impossible without considering and implementing a system of distance learning. It has been proven that ICT can activate and visualise the educational process, making it accessible via cloud technologies, blogs, YouTube, Facebook, Twitter, Google, etc. It is noted that a leading position among ICTs is given by scientists to the electronic textbook, represented by both printed and technical components. The reorientation to SMART education is stressed, which currently meets society's needs for a competent specialist. In the future, the ICT complex will be represented in linguistic and literary disciplines.

**Key words:** electronic education, information and communication technologies, information and communication competence, distance learning, electronic textbook, SMART education.

**Introduction.** Modern higher education requires the introduction of information and communication technologies (hereinafter referred to as ICT) into the system of training of higher education graduates, which "simplify citizens' access to information and data, allow for quick and effective steps to improve production, training, professional and personal development, in particular the development of the education system, require appropriate possession of the necessary level of competence in the field of ICT" (Formation, 212 : 7). Information and communication competence for a teacher of a philological specialty is a must to cope with modern rapid changes in the conditions and needs of the

society. It is a requirement both to higher education institutions of Ukraine and in the global dimension, aimed at constant professional growth and improvement of a teacher in the information and communication sphere, active participation in educational communities and projects, a qualitative combination of resources of international programmes and domestic experience, which ultimately allows them to occupy a worthy place in the education system, because the school needs a teacher who has reached the acme-peaks of pedagogical creativity, is capable of innovative transformations and is ready to constantly improve their professional level with the help of the Internet.

The issue of implementing ICT in education was particularly pressing in 2019, and as the whole world was engulfed by the COVID pandemic, the educational community was faced with the question of how to structure the teaching process. Teachers of secondary schools, educators of institutions of vocational pre-higher and higher education began to master digital platforms new to them, such as Moodle, Zoom, Google Meet, Google Classroom, Padlet, LearningApps, Classtime, Kahoot, Nearpod, Liveworksheets, etc. In response to the full-scale war in Ukraine in 2022, these teachers who had built up IT competence, were able to resume teaching students remotely within a month.

The study of the introduction of ICT into the educational process at higher education institutions revealed that the clarification of theoretical provisions and the development of practical principles for the use of electronic resources, the filling of computer-oriented environments with them, the promotion of increasing the possibilities of realising the teachers and students' access to the resources of the electronic environment, and the regular use of its means in the process of solving educational tasks is an urgent problem of modern pedagogy and linguodidactics. Its analysis can be found, in particular, in the reports of V. Bykov, A. Gurzhii, N. Zakharova, L. Zlativ, G. Korytska, A. Nikitina, L. Skurativskyi, Yu. Shepetko, T. Yasak, and others.

Addressing the issue of modernisation of contemporary education in Ukraine in the direction of the rapid development of information technology is impossible without considering and implementing a distance learning system (hereinafter referred to as DL), the essence of which is represented in studies by both Ukrainian (K. Buhaichuk, I. Vorotnykova, L. Dankevych, V. Kukharenko, N. Rashevska, O. Samoilenko, T. Tikhonova, V. Fandei, etc.) and foreign researchers (I. Allen, E. Banados, B. Kolis, J. Moonen, M. Thorpe, etc.). A significant number of studies show that DL is rapidly penetrating the educational process of higher education institutions, ensuring the active use of ICT that opens up prospects for access to information, adapted to the individual needs of higher education students.

**The aim of the article** is to characterise the features and advantages of e-learning in the training of language and literature specialists in the conditions of the COVID pandemic and the war in Ukraine. The purpose of the research requires solving a number of tasks: to find out the prerogatives of e-learning in the conditions of the COVID pandemic and the war in Ukraine; to characterise the features and specific features of distance learning; to justify the benefits of introducing information and communication technologies in the process of training students in the field of language and literature.

**Research material and methods.** Theoretical methods were used in the research: study, analysis and synthesis of pedagogical methodical sources related to the problem under study; methods of comparative analysis, synthesis, abstraction, generalisation, classification and systematisation; empirical methods: interviews with teachers and students; observation of the educational process.

**Results and discussion.** In modern scientific literature, we observe the presence of different interpretations of DL. We will present some of them: Distance education (DE) – a set of information technologies ensuring the delivery of the main amount of material to the student; interaction of students and teachers in the process of learning; providing students with the opportunity to work independently on the material they have learned, as well as assessing their knowledge and skills in the learning process (Vitvytska, 2005 : 200); a complex of educational services provided with the help of a specialised information and educational environment at any distance from educational institutions (Slepkan, 2005 : 131); a universal form of education, based on the use of the possibilities of a wide

range of traditional, new information, telecommunication technologies and technical means, which create conditions for the user to freely choose courses, dialogue exchange with the teacher regardless of distance and time (Higher, 2005 : 211). Therefore, DL is an education characterised by the use of various information technologies (computer software, Internet technologies, etc.); ensuring independent research activities of students using resources from electronic libraries, databases, etc.; creation of independent projects and methodologies; constant communication between the teacher and the student (group of students); taking into account the differentiation of learning (development, implementation and verification of different level tasks, entering the results into an electronic journal).

Researchers (V. Andrushchenko, N. Holub, N. Divinska, B. Korolev, V. Kuharenko, V. Luhovyi, O. Rybalko, I. Serhienko, N. Syrotenko, Z. Slepkan, etc.) have found that DL is characterised by a number of features, namely: *flexibility* allows students to study at a time and place convenient for them, and at an individual pace; *modularity* includes the formation of an individual or group study plan from independent study courses-modules; consideration of *parallelism* ensures training compatible with professional activity; DL guarantees the *completeness of information access* as simultaneous access to many sources of educational information (electronic libraries, databases, knowledge bases, etc.), a large number of users; effective use of technical and transport means, training areas, concentrated and unified presentation of training information and multiple access to it, which reduces the costs of training specialists – this is an element of its *economy*; *mass and at the same time personal orientation, individualisation* provide for the formation of competences necessary for a specific student at the speed he is capable of; *cognitive orientation* enables the identification of greater persistence in acquiring knowledge, organisation, ability to work independently and have skills in working with a computer and telecommunication means; *diagnosticity* includes the assessment of the level of development of skills, professional qualities of users, the construction of an appropriate social and psychological portrait for the purpose of selecting effective methods and means of training; *motivation* creates interest in current knowledge with the aim of its further operational application to ensure a professional career; *humanity* directs education to the individual, taking into account their individual characteristics, creating favourable conditions for the acquisition of knowledge and the development of creative abilities; *social equality* opens equal opportunities for everyone to receive education, regardless of place of residence, state of health, elitism and financial support; *internationality* includes the export and import of world achievements on the market of educational services. Undoubtedly, such characteristics of DL create proper conditions for students in terms of combining education and training, especially for those who live far from higher education institutions; actively provide access to all learning resources available on the Internet; contribute to a quick review of the completed task, and most importantly – provide an opportunity to get education abroad at minimal financial cost.

The authors of the Handbook "Distance Learning" describe the DL models presented by the following groups:

1. External learning, focused on the examination requirements of the higher education institution and intended for students who, for whatever reason, cannot attend an educational institution.

2. University education (on the basis of one university) for students who receive education by part-time and distance learning mode.

3. Education based on the cooperation of several higher education institutions, which allows the development of better educational support for distance learning courses.

4. Training in special educational institutions created to develop multimedia courses for part-time and distance learning.

5. Autonomous learning systems fully implemented with the help of television and radio programmes, additional printed publications.

6. Informal integrated learning on the basis of multimedia programmes, i.e., self-education programmes (Kuharenko, 2002 : 19-21).

The analysed classification of DL includes elements of full-time, part-time and online learning based on ICT and multimedia systems. Such forms involve broad segments of the population who have access to the Internet and are provided with equal conditions for learning, receiving and processing information, and carrying out tasks to test their level of knowledge.

DL models are implemented in two modes (Kuharenko, 2008):

- asynchronous learning, in which students who are distant from the educational institution form groups of the same course and study according to an individual curriculum using teaching materials developed by the educational institution. Such communication takes place in the format of electronic correspondence (e-mail); by exchanging files, holding forums, via viki;

- synchronous learning ("working together") - remotely located higher education institutions, providing teaching, and a group of students studying at the same time (nowadays it can be a virtual learning group, students are not necessarily in the same classroom). Interaction between teachers and students takes place on a real time scale. Forms of work can include discussions, seminars, conferences via chat, internet or video conferencing via Skype. Examination sessions, defence of diploma projects, and laboratory classes can remain face-to-face in such forms. Experience shows that DL minimises direct communication between teacher and student, involves a large number of self-studies by students using various online resources and a small amount of time for checking the work done.

Information and teaching resources for both asynchronous and synchronous learning are published on the university website (MOODLE platform) and are available to students and teachers, adapted for use. Their main components are:

*The course creation component* is an educational information system that includes the following modules: file storage, electronic library, virtual laboratories, test programming module, etc. The course creation component is compiled by the teacher of a particular linguistic subject and is filled with a series of materials: general information about the course, its purpose, main tasks, structure; information card of the teacher who teaches the course; lectures; basic textbooks and teaching aids for the discipline (including those developed by the teacher); distance learning complexes for the discipline (hereinafter referred to as DLC) on the topics of the training course; entrance self-tests, which allow users to check their own level of knowledge and skills and to adapt the course to their needs; a list of questions and their answers; links to websites on the Internet dealing with specific topics of the course (by topics of the academic discipline). DLC is offered as a series of credits. It should be noted that each of them should consist of meaningful parts containing theoretical information on the topic(s), a list of control questions and practical tasks, questions for self-control, methodological instructions, tasks for thematic control, etc. In our opinion, presentations, video material, a glossary of terminology, diagrams and tables on the topic, and a list of main and additional references are also mandatory. DLC resources structured in this way help to organise the students' self-studies.

- *the DL administration component* allows the management of the educational process and includes the following modules: statistics for each teacher and student, a module for managing and organising the educational process;

- *the interaction and communication component* brings together all the tools for synchronous and asynchronous communication (file sharing, forums, chats, etc.);

- *the toolkit* includes a wide range of possibilities for adapting the system to specific needs depending on the characteristics of the group, the subject, etc.;

- *the competence testing system* is responsible for monitoring and controlling the level of students' performance. The quality of the knowledge acquired in the process of DL is determined by the following indicators: a) assessment of the student's knowledge of linguistic disciplines; b) level of systemic competence (e.g. understanding the relationship between different disciplines); c) level of competence in the optimal distribution of resources; d) level of competence in working with information (ability to interpret information, use a computer to process information, etc.); e) assessment of

writing, speaking, listening skills; f) assessment of personal responsibility, sociability; g) assessment of teamwork skills, teaching others and negotiation skills. The assessment of the student's competence can be carried out both in the classroom (speaking, listening and interpreting skills) and online by means of tests, independent tasks, compiling a glossary, etc.; the results are recorded in a register where points for previous types of work are accumulated.

In the DL system, an important role is played by communication, which takes place in the form of a blog or forum, chat or group conference, including constant work with Internet resources (Information, 2013 : 61). For the purpose of effective online communication of teachers, virtual educational communities (networked pedagogical communities, virtual online educational communities) have been created as "groups of people, participants in the educational process <...>, who are united by common interests, initiatives, interactions related to educational goals and educational content, who communicate constantly and for a long time, using information and communication technologies, common services and software, adhering to the appropriate norms of behaviour in the virtual space" (The formation, 2014 : 21-22). These communities open opportunities for communication and exchange of experience for future teachers of the Ukrainian language with students of various higher education institutions of Ukraine and other countries; conducting online conferences, Olympiads, etc. This form of communication requires perfect mastery of linguistic material and the ability to present it to the audience, ICT literacy, and a high level of linguistic culture.

The effectiveness of DL depends on the learning tools, which are conventionally divided into online and classroom tools.

The first includes: e-mail, bulletin board systems (BBS), the Internet, audio and video conferences with one-way or two-way communication via radio broadcasting, telegraph, telephone, satellite communication or Mosaic – a graphical interface to the World Wide Web, ICQ – a platform for instant messaging (Internet pagers), active channels for subscribing to websites, etc. The second category includes: electronic editions for educational purposes (automated systems for educational purposes, provided with didactic, methodological informational and reference materials on the educational discipline); computer systems for educational purposes (software tools for use in the educational process, which make it possible to: differentiate the learning process; monitor the individual with error diagnosis and provide feedback; provide self-monitoring and self-correction of educational and cognitive activities; reduce learning time by performing complex calculations on a computer; demonstrate visual educational information; model and simulate processes and phenomena, perform laboratory work, experiments and tests in virtual reality); audio and video teaching materials (provide interaction with the student, the purpose of which is to ensure better understanding of the material and self-control of the learning); global wide web (Pedagogy, 2007 : 214). Such advantages of computer-based education increase the purposefulness of the knowledge acquisition process, open the possibility of wide use of reference materials (electronic coursebooks, reference books, dictionaries, etc.), increase the motivation to learn new information, provide a high level of self-education of the student; allow to participate in Internet Olympiads, competitions, etc.

The modernization of the entire education system directly depends on the effectiveness of the introduction of ICT in the educational process, the individual progress of each student and the creation of their own educational environment, highlight V. Bykov and A. Gurzhii. At the same time, innovations must be adapted to each individual, taking into account both traditional and innovative forms, methods and techniques, various information resources (Bykov, 2012 : 48-49). M. Zhaldak emphasises that the appropriate use of ICT contributes to the development of visual and figurative thinking, involuntary and voluntary attention at the stage of perceiving new material; activates educational and cognitive activities; represents a close connection between theory and practice; provides effective demonstration of phenomena that cannot be observed in the classroom; systematises and classifies phenomena with the help of diagrams and tables; forms sustainable motivation for learning;

makes it possible to quickly assess the quality of the learned material (System, 2014 : 58). ICT enables free access to any textbooks, scientific papers, recommendations, articles, questions, tasks, tests, multimedia files and teaching aids necessary for the language and literature training of students; this is an effective and productive step, based on a large number of multimedia tools, intensive accumulation of various information, flexibility and effective cooperation of teachers and students' actions. The opinion of T. Yasak is also unanimous, as she sees their use as an advantage in the educational process, when the educational goal is fully achieved, the role of the teacher is pivotal, and the educational and student's educational and cognitive activity is determined by various types (Yasak, 2012 : 38). We agree with such opinions of scientists and claim that the introduction of ICT into the modern educational space is relevant and indisputable. They are able to activate and visualise the educational process, making it accessible through cloud technologies, blogs, YouTube, Facebook, Twitter, Google, etc.

We take into account the opinion of O. Semenog regarding the importance of incorporating a computer-based educational and methodological system into the process of linguistic and professional training of future teachers of the Ukrainian language. This is an integral system of "information support for interrelated components of professional training – educational and cognitive, scientific research activities, of a set of practices based on cultural studies, personality and competence-based approaches. Its primary goal should be to enhance, the informational and research competences of philology students" (Semenog, 2005 : 217-218). The researcher suggests creating course webpages, web manuals, presentations, an electronic dictionary, etc. The same views are expressed by H. Korytska, who emphasises the peculiarities of language teaching in the conditions of electronic linguodidactics, which is aimed at filling the content of education with "new methods, teaching aids that would modernise the educational process, increase its productivity, and contribute to the improvement of linguodidactics as a science" (Korytska, 2016 : 15). In the opinion of the scientists, the proposed ICT system helps to create such an educational environment that would optimise the learning process, promote its effectiveness, help increase the efficiency of information perception through the integration of linguistic subjects, ensure an increase in the share of independent work, and develop the educational and research activities of future teachers of language and literature.

The analysis of the scientific literature shows that one of the leading positions among ICTs is given by scientists to the electronic textbook (hereinafter ET), which is presented both in print (textbook, educational and methodological manual (recommendations)) and technical (audio and video recordings, films, media texts, presentations) components. ET provides a new approach in the design and presentation of educational texts, didactic material, the creation of qualitatively new forms of control over the process of development of language and literature training of students. According to Yu. Shepetko, ET is a multimedia teaching tool of the "new generation, containing systematised information from the course in accordance with the curriculum, taking into account the modern professional direction of the course, built on the general didactic, linguistic and didactic principles of teaching the Ukrainian language and aimed at the formation of linguistic, speech, communicative, sociocultural competences of students" (Shepetko, 2012 : 17). In our opinion, in the modern educational space, ET is an indispensable means of learning, which includes educational components containing systematised scientific information on linguistic disciplines. It ensures the student's activity in acquiring new knowledge with the help of information presented by text, graphics, music, video, photo and other material; offers practical tasks and methodical comments for their implementation; is a means of checking the acquired knowledge.

ET has many advantages over other teaching aids, to which L. Skurativskyi includes: the possibility of quantitative and qualitative placement of educational information in it, since it has the ability to cover larger theoretical material and more practical tasks in accordance with the level of language and linguistic competence of students, the speed of processing educational material and individual

characteristics of each student; ensuring constant revision of the information learned in previous courses; presentation of different types of dictionaries (interpretive, phraseological, orthographic, orthoepic, dictionaries of lexical and phraseological synonyms and antonyms). The scientist emphasises the active use of not only textual material, but also tables, diagrams, algorithms, which will contribute to better processing and memorisation [Skurativskyi, 2005 : 7-8]. Unlike a printed textbook, the ET can be quickly changed, and at the end of each topic, test tasks are offered for checking and self-assessment.

In our opinion, the primary function of the ET resource is informative: providing a variety of representations of a significant amount of material, lexicographic and reference sources; the possibility of using different methods of saving and processing educational material, which allow improving the perception of the information received. The quality level of visual presentation of material through the use of multimedia is significantly increased when using texts, audio, video recordings or presentations. A peculiar feature of ET is the possibility of constant updating of educational information (Ruskulis, 2014 : 432). The defined prerogatives of ET over printed sources convince of the importance of its maximum use in the process of formation of lexical competence of future teachers of Ukrainian language during the study of linguistic disciplines. ET allows to saturate the information content of the courses with additional scientific facts not presented in textbooks, to create a bank of practical tasks in linguistic disciplines, taking into account their interdependence and interconnection.

According to the scheme of presentation of the material in ET, M. Fitsula distinguishes the following types: textbook; hypertext (presentation in the form of a "tree"); reference (presentation of material in the form of a reference book); game (presentation of material in the form of a business game). The educational material in EP is presented either statistically (changes under the influence of student's administrative commands) or dynamically (changes under the influence of software settings); it can be monochrome and polychrome, without sound support, or with it (Fitsula, 2006 : 103). We believe that the most effective are the ET that are those that are built on a hypertext basis, which allows access to hyperlinks presented in the form of a QR code, tag cloud, mind map, etc. and are accompanied by audio, video and media support of educational information. The identified advantages of ET expand the required amount of information flow; allow to return to what has already been learnt without leaving the previous page; allow to listen to audio recordings and watch media and video clips, depending on the topic, thus facilitating the perception of educational material. In the training of students of language and literature, EP should also serve as a means of establishing integrative links.

A significant advantage of ET is an unlimited number of different exercises (stylistic, transformational, experimental, constructive) and tasks with elements of curiosity, on the culture of speech, which will more fully satisfy the cognitive capabilities and needs of students. This will more effectively develop language and general educational skills, cognitive interest, and therefore interest in independent work on improving their thinking, culture of their speech (Semeniv, 2005 : 4). The same opinion is expressed by L. Skurativskyi, who draws attention to the fact that ET "opens new opportunities for improving literacy in the process of systematic use of information technologies" (Skurativskyi, 2005 : 9), as it provides separate modules for testing students' literacy, offered in two versions: a) within the school curriculum; b) fully academic, creating the necessary conditions for perfect mastery of spelling norms by all who wish. ET is a means of forming practical skills in the form of questions, exercises and tasks for test control; it takes into account integrative and systemic links of linguistic courses; it is a way of diversifying the educational process; it ensures consistency, continuity, and systematic acquisition of knowledge during individual or group work; it adapts the teaching material according to the level of preparation of the student (group), taking into account individual and psychological characteristics; it allows using references to additional sources (dictionaries, methodical guides and recommendations, etc.); it provides a high level of accuracy of spelling;

it can be used by anyone who wants to use it. ), it provides a high level of visualisation (audio and video materials, diagrams, tables, algorithms).

The prospects for using ICTs in offline lessons are opened by the interactive SMART Board, which enables the teacher to support lectures and practical studies with visual materials (fragments of TV programmes, films, cartoons); sound recordings (podcasts); multimedia materials, statistical images (diagrams, tables, elements of electronic textbooks), etc.

The rapid development of ICT poses a challenge to modern higher education institutions, directing them to reorientate towards SMART education, which currently meets society's needs for competent specialists. According to M. Sosnova, the Smart-education paradigm is easily managed and provides speed and ease of adjustment in accordance with the student's requests, promotes an active exchange of experiences and ideas (Sosnova, 2019). At the same time, the teacher manages the learning process, guiding students to search and analyse information in an interactive educational environment. Smart education enables a higher education student to actively participate in online conferences, listen to video lectures and video courses, record and distribute their own video materials, and present scientific research.

In the world practice, according to the research of O. Semenihina, SMART education is defined by the following trends: the prerogative role of the DE; personalisation of the educational process; gamification as the implementation of game technologies; saturation with interactive textbooks supported by multimedia technologies; learning through video games (Semenikhina, 2013), consideration of which will help to interest the student, engage him/her with the educational material, encourage creative problem solving, independent learning of the information volume of disciplines, implementation of educational and research activities, familiarisation with the best pedagogical experience of teachers, which is an obligatory component of practical training.

**Conclusion.** The effective introduction of ICT in combination with traditional means can optimise the educational process in higher education institutions in a distance format during the COVID pandemic and the war in Ukraine. This can provide individual and differentiated approaches to student training, increase the role of self-education, expand the worldview of learners as subjects of the educational process in connection with the unceasing development of society in all its diversity, to raise the independent work and educational and research activities of students to a new level. It can also guarantee receiving quick feedback and an objective assessment of the student's achievements, directing the entire educational process to SMART education.

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