

Use of Electronic Educational and Methodical Complex in Foreign Language Distance Learning

Zolotilina A.S.

Department of Foreign Languages for Technical Faculties Novosibirsk State Technical University Novosibirsk, Russian Federation Anastasiya.sergeevna.fld@mail.ru

Abstract – Distance learning is a global phenomenon of educational and information culture, significantly affecting the nature of education. Distance learning has steadily become the form of foreign language teaching in a great number of different educational institutions, as one of its main features is independence from geography and distance between tutors and learners. One of the main directions of foreign language learning via the use of distance learning is the development of electronic educational and methodical complexes (EEMC). The aim of this article is to describe the use of an electronic educational and methodical complex in foreign language distance learning in subject "Foreign language" at a nonlinguistic higher educational institution; to give a detailed analysis of its content, structure and list of elements.

Keywords – distance learning, electronic educational and methodical complex, module, structure, block

I. INTRODUCTION

Modern education trends to improve the quality and accessibility of learning, it is necessary to use information and communication technologies that contribute to the enhancement of educational technologies, to create new forms of education (distance learning, modular learning, elearning, etc.), develop electronic educational resources that will be available to all learners via the Internet. The creation of a single information and educational space, the development of electronic educational resources and electronic information resources should be carried out taking into account newest tendency in the modernization of education.

Specialists in strategic problems of education consider distance learning as the educational system of the 21st century [1].The implementation of distance learning in the educational process complements and expands the traditional forms of the educational process organization, as well as allows to increase the number of students without losing the quality of educational services. Distance learning is a process of teaching and educating an individual when a tutor and a learner are geographically separated and the educational process organization includes distance training and instruction [2].

Modern distance learning is based on the use of information and telecommunication technologies, network courses, web-sites, blogs, web-forums, online communication (chat, ICQ, Jabber, Skype), wikitechnologies, video conferences, etc. [3]. Additionally, distance learning is an educational environment where the participants of the global educational social network interact. Distance learning is actively used in teaching a foreign language in a higher educational institution that enables learners to acquire the necessary knowledge independently.

Moreover, modern concepts of foreign language distance learning are focused on strengthening learners' communicative competence. The basis of the communicative competence is speech, language, social and cultural competences [4]. In order to organize a learning process the issues of developing and providing quality teaching and learning materials for independent learning are put in the forefront. In return, all necessary electronic educational, didactic materials specially designed on the basis of original profession-oriented texts (texts, tasks, tables, etc.) are included into the electronic educational and methodical complex.

The use of EEMC in distant learning creates essentially new tools, providing, in that way, new opportunities. Electronic educational and methodical complex is a set of structured electronic educational and methodical materials, united in the computer learning environment, supplying a full didactic cycle of learning and designed to optimize the students' development of professional competences in subject. The implementation of EEMC in the distance learning process can contribute to the students' awareness of the whole picture of the subject, will provide independent learning, individualize learning, develop education control and self-control, and improve the effectiveness of the educational process.

The methodological framework of foreign language distance learning in subject "Foreign language" is an electronic educational and methodical complex developed on the basis of the hypertext structure of the educational material presentation, a modular approach with the use of computer network technologies. It should be noted that the electronic educational and methodical complex is an information and educational resource of the structured learning material presentation of the subject [5]. Furthermore, the modular approach is a set of logically related, but relatively autonomous information modules, the study of each of them can be done independently and separately. A module is a standard educational unit that includes a clearly defined scope of knowledge and skills to be studied for a certain



period of time, or a credit, which is controlled by different assessment tools [6].

The advantages of current EEMC, primarily, integrate the possibility of effective organization of independent work and the activation of the student's role in the learning process. Self-learning is the most effective in such a form when a student acts as an active person. EEMC allows you to collect in one complex almost all the information kit required for the study of the subject. At the same time, it provides the necessary interactivity, visibility, mobility, compactness, low cost of replication, accessibility and a variety of validated tasks and tests.

II. DEVELOPMENT STAGES AND STRUCTURAL BLOCKS

The development of an electronic educational and methodical complex is a complicated and time-consuming process. It goes through certain stages of development.

Stage I:

- curriculum working out;
- evaluation materials preparation;
- teaching and learning aids development;
- testing design.

 TABLE I.
 STRUCTURAL BLOCKS OF ELECTRONIC EDUCATIONAL AND METHODICAL COMPLEX

	Title	Description				
STRUC TURAL BLOCK S OF ELECT RONIC EDUCA TIONA L AND METH ODICA L COMP LEX	1.Organizational and methodological	The main tasks are the organization of independent work of learners, methodological issues of studying the material, explanation of the criteria for the assessment of the course.				
	2. Theoretical	The theoretical material is presented in modules.				
	3. Practical	A set of training exercises for the development of skills and abilities. It contains additional information of the subject area and supports material learning in modules. The main objective of this block is an adequate knowledge assessment through various techniques-tests, tasks, etc.				
	4. Information and analytical					
	5. Testing and assessment materials					

Stage II: preparation and legalization of documentation of electronic educational and methodical complex.

Stage III: testing of electronic educational and methodical complex in the educational process.

Stage IV: correction and approval of electronic educational and methodical complex.

An electronic educational and methodical complex includes various structural units. This section introduces the

list of items of the electronic educational and methodical complex, which can be divided into several structural blocks shown in Table I. [7].

Reviewed structural blocks should provide learners with an opportunity to independently organize the assimilation of the educational material, form their periodic and final academic ranking in subject, result in the development of competences.

III. MODULE STRUCTURE AND CONTENT ITEMS

Training technology is based on the background of certain content items. All necessary required to learn educational material is accumulated in special courses and modules (derived from Latin "modulus" – measure [8]) developed for distance learning. We have chosen a learning module as a content component. It assumes entity and completeness, fullness and consistency of the educational information presentation and how it is structured inside the modules in the form of modular units and educational elements system. A module is a set of elements of a subject or subjects that has a certain logical completeness towards stated aims and results of education and training that is responsible for the development of a competence or a group of competences.

Generally, the module structure can include the following constituent parts.

- Learning material, including necessary illustrations;
- Instructions for its assimilation;
- List of questions and practical exercises;
- Tests, individual works and explanations how to do them.

In short explanatory entry to modules, the learners are given the general information: aims and objectives of the subject learning, organizational and methodological issues, a short summary of topics, forms of control, and a list of basic and additional references, deadlines in a particular module.

The main aim of foreign language distance learning in subject "Foreign language" is the development of the foreign language communicative competence. It is also classified in:

- *Practical aim:* future specialists are trained for the practical use of the foreign language in professional and personal activities.
- *Educational aim*: students acquire and expand knowledge of the studied country in the field of national culture and economy, extend their horizons, develop the mode of thinking, communication and speech.
- *Pedagogical aim:* learners foster their respect for the customs and traditions of the country which language is learnt.

To achieve these aims, the objectives are formulated as follows.



- To form students' foreign language communicative competence as the basis of intercultural professional interaction;
- To form and develop the skills of the professional erudition and experience of the foreign language independent use in order to expand knowledge within the specialty;
- To master functional lexis and terminology through reading vocationally-oriented texts and professional interaction.

V. V. Safonova [9], a Russian linguist, cultural studies scholar and teacher, defines the foreign language communicative competence as a certain level of language, speech and sociocultural expertise, knowledge and skills that allows learners to diversify their speech behavior communicatively appropriate depending on the psychological factors of monolingual or bilingual interaction.

Training technology is organized in the form of a "personal account". Learners and tutors are registered under an individual login and password. Learners study the subject "Foreign language" independently but they are constantly instructed and advised by the tutor. It develops such language skills as reading and writing. Special attention is paid to the two most complex and important aspects such as vocabulary and grammar.

In particular, the efficiency of distance learning commonly depends on four main criteria.

- Operative and efficient interaction between a tutor and a learner, despite the fact that they are distantly separated;
- Used pedagogical technologies;
- Accredited high-quality developed teaching aids and ways of their delivery;
- Productive feedback [10].

As mentioned above, the presentation of the training material is based on a modular approach. Modules combine the learning of educational material of almost all major grammatical structures of the English language and lexical topics. Each module contains the following sections.

A. Theoretical Grammar

A grammar course includes a theoretical grammar material of all subjects established by the curriculum.

B. Grammar Exersices

The practical part consists of a system of training exercises including the common lexis of the school minimum, as well as vocational vocabulary comprising speech cliches and terminology. The aim of the grammar course learning is to repeat and systematize the grammar material of high school course, as well as the introduction, development and consolidation of a new grammatical one.

For instance: Write questions; Choose the correct verb for each blank; Fill in the gaps with the verbs from the box; One sentence has a mistake. Choose the correct sentence (put a \checkmark); Open the brackets and put the verbs in the correct from; Some of the sentences are right but most are wrong. Correct the wrong words; Complete the sentences with a superlative and prepositions.

C. Vocabulary

This section includes tasks on mastering common (everyday, social, sociocultural) and professional vocabulary and terminology, speech clichés, idiomatic expressions within the framework of lexical topics.

For example: Complete the five conversations. For questions 1-6, choose the correct letter A, B or C.; Which of these expressions are used for opening (o) or closing (c) conversations?; Put this conversation in the correct order; Match the sentences and pictures; Complete the phrases; Match the photos and the activities.

D. Reading

It contains the tasks for reading and translation of authentic texts, which provide learners with knowledge and practical skills of scanning, reading for specific information, skim reading of the texts from everyday household, socio – cultural spheres of communication, profession-oriented texts. Such tasks allow learners to develop and improve literacy skills, as well as understand the main content of educational texts, highlighting important information.

For instance: Read the text again. Summarize the main idea of the text; Approve or disapprove the following statements. Begin your sentences with: "Yes, that's right", "No, I'm afraid that's not so". Give your reasons; Look through the text carefully and find English equivalents for the following Russian phrases.

E. Writing

In this section the tasks make students learn how to describe phenomena, events, state facts, make written messages, perform written exercises, applying the studied grammatical rules; fill in a questionnaire, forms, etc.

For example: Read this pen-friend letter and write a reply, answering all the questions; Write a project-summary of your family. Decorate your project with pictures of your family. Make up and write a story on one of the topics; Read the information about a girl who wants a weekend job. Complete the information on the job application form; Write a short summery of your family. Decorate your project with pictures of your family. Use the questions below to help you.

F. Test yourself

The tasks of this section are accumulated, structured and modeled identically as practice exercises of each module. The purpose of this section is to consolidate the lexical and grammatical material, prepare and revise for a final test or an exam.

For instance: Choose the correct translation of the sentences; Choose the correct preposition; Choose the correct item; Put the words in the correct order to make sentences; Complete the opposites; Complete the chart. A theoretical material and practical exercises are presented in different forms: "question-answer" task, in the form of crossword puzzles, charts, tables, etc. using the studied vocabulary. After studying each module learners take a mid-term test. It helps to identify weaknesses in order to work more actively on them.

IV. SCOPE OF TESTING AND FEEDBACK

The evaluation of the effective using of the electronic educational and methodical complex in foreign language distance learning in subject "Foreign language" is acquiring knowledge assessment. It means how well learners possess the foreign language communicative competence; study specific language material; develop language and speech skills in reading, writing and translation; independently use the foreign language in professional and personal activities, which is presided by the results of entry, formative, midterm and summative assessment.

An assessment phase involves the evaluation of the initial (at the beginning of foreign language learning) and planned foreign language communicative competence, which is required to form within the distance learning in subject "Foreign language" on the basis of point rating system and includes as follows.

- An entry assessment of the initial foreign language communicative competence of students in the form of a complex test.
- A formative assessment of the level of learners' knowledge of a specific language material and development of language and speech skills in reading, writing and translation, conducted in the form of an individual work.
- A midterm assessment of mastering speech and language skills for a certain period of time. The object of evaluation is communicative skills in such types of language activities as reading, writing, as well as language skills development within the scope of topics. It involves the implementation of an individual work with the elements of testing.
- Final assessment of a foreign language communicative competence is to be taken in the form of an exam. The object of the evaluation is the achievement in developing of a certain level of learners' (low, medium, high) foreign language communicative competence. It is an individual work with the elements of testing that measures the development of language skills.

Another criterion of the effectiveness of using EEMC is feedback. Feedback in a broad meaning is a review, answer, a response to some action or event [11]. In the pedagogical literature, the concept of "feedback" is defined as the information of what has been studied by learners and how they are learning at the moment as well as how well the tutor has implemented the learning objectives [12].

N.D. Galskova [13] describes "feedback" as a continual element of the educational process, including foreign

language learning. The ability of the tutor to use feedback in teaching, in particular, foreign languages training is considered as one of the most important criteria of the effective learning process. Feedback will be effective if the following two conditions are reviewed: for the tutor is the ability to ask questions; for the learners is the opportunity to find out how well they understand the learning material.

It should be noted that in our work the feedback is considered as the form of control. In the methodical literature, there are different control functions in foreign language learning. A. A. Mirolyubov [14] classifies control functions as training, diagnostic, corrective, coordinating and evaluative. As for foreign language learning one should take into account the structure of the pedagogical process itself. In our work, tutor's feedback is coordinating; it carries out diagnostic, evaluative and corrective functions. Feedback aimed at learners is educational and performs corrective, evaluative and motivational-stimulating functions. The obtained information allows the tutor to evaluate the learner's educational activity and his self-assessment of language activity.

V. RESULTS AND DISCUSSION

An experimental proof testing was carried out to estimate the effectiveness of the implementation of the designed EEMC in the learning process in the subject of "Foreign language" and measure learners' development level of the foreign language communicative competence in a nonlinguistic higher education institution.

An indicator of the efficient use of EEMC in foreign language distance learning is the control of knowledge acquisition, which allows to assess the level (low, average, high) [15] of foreign language learning (level of foreign language proficiency), and, consequently, the level of expertise.

In our work, these levels are characterized as:

The first (low) level is the beginners' level. It is characterized by the development of basic skills in such types of language activities as reading (reception) and writing (production) on the basis of initial level of language knowledge and skills.

The second (average) level is the level of elementary communicative competence. It involves the development of the ability and willingness to communicate with a native speaker in a limited number of standard communication situations, understanding a general idea, as well as extract information from simple written texts, write an informal or formal letter.

The third (high) level is the level of advanced professionally-oriented communicative competence. It allows you to practically use a foreign language in the relatively natural conditions of professional interaction without formidable difficulties and considerable restrictions, for example, to read authentic texts, to be able to interact with a native speaker in non-standard situations of communication.



The measured parameters were evaluated on a five-point scale: high level -5-4.1 points (100%-82%); average -4-3.1 points (81%-61%); low -3-0 points (60%-0%).

During the experimental testing, summative, formative and control experiments were carried out in experimental (distance learning using an electronic educational and methodical complex in subject "Foreign language") and control (traditional in-class learning) groups.

To assess the effectiveness of vocational foreign language learning and, consequently, the development level of expertise, the following criteria are indicated: the level of knowledge acquisition (in such parameters as types of language activities (reading, writing), as well as grammatical system and structures of the language; the level of the development of lexical proficiency. The criterion is a standard, rule, or test by which something can be judged; measure of value [16].

During the experimental proof testing it was found out that foreign language learning with the use of the electronic educational and methodical complex in the subject of "Foreign language" activates cognitive interest and stimulates the further study of the foreign language. It happens because it allows mastering the foreign language more qualitatively and productively, providing an opportunity to raise and augment learners' intellectual level. The results of the experimental learning are shown in Table II.

 TABLE II.
 EXPERIMENTAL LEARNING RESULTS

	Experimental Group				Control Group					
	Points				Points					
Criterion	5	4	3	2	a v e r a g e	5	4	3	2	ave r age
Language activities (reading, writing); Grammar proficiency	5	3	2	-	4,3	2	4	4	-	3,8
Lexis proficiency	3	4	3	-	4	1	5	4	-	3,7
Average grade			4,15		·			3,75		

The data obtained during experimental learning indicate that there is a positive increase in the cumulative quality average score of the experimental group. The application of the developed electronic educational and methodical complex in foreign language distance learning fostered:

• changes in the level of learners' cognitive activity, which is an integral part of the effective assimilation of essential educational information;

- an increase in the level of motivation in foreign language learning using distance learning technologies;
- the satisfaction of the needs for self-expression, selfactualization and self-realization;
- the growth of the involvement to work online and possibility of using the Internet to obtain various kinds of background information;
- the development of skills of independent learning.

Thus, the statistical data show that the educational material is more efficiently learnt via the use of the electronic educational and methodical complex. Language knowledge and skills are developed, as well as it increases the level of vocabulary and terminology proficiency in everyday and professional activities, and, consequently, develops the foreign language communicative competence.

VI. CONCLUSION

To summarize, distance learning is a very effective form of foreign language learning, as it acts as an entire system and may regulate a great variety of interrelated elements and forms of teaching and learning at a distance by means of information and communication technologies. In this paper, we present a comprehensive overview on electronic educational and methodical complex and its use in distance learning. The use of EEMC in distance learning has a great potential for foreign language learning. The experimental learning data show that the use of EEMC in foreign language distance learning can significantly improve the level of foreign language proficiency and develop the necessary competences. It also becomes an important reason for increasing the motivation of learning, developing of selfactivity and independence in obtaining knowledge, as well as acquiring skills and generally leads to the improvement of effectiveness and quality of education.

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