



## ORGANIZING DISTANCE LEARNING USING SMART TECHNOLOGIES

Urinbaev Zokir Movlonovich

Basic doctoral student of Samarkand State University

e-mail: mehriddin.usanov.91@bk.ru

### Annotation

Nowadays, not only in economics and politics, but also in education, which is manifested as a completely objective process, attention is paid to the traditions of globalization. This is achieved through the widespread and well-mastered use of new information technologies. The problem of globalization of education is the lack of a single "language of instruction". Accordingly, special projects are being developed to coordinate different educational institutions within the framework of a single concept.

**Keywords:** Internet, SMART technology, distance learning, learning process, information technology.

### Introduction

With the help of educational portals on the Internet, it is possible to create not only e-learning courses, but also e-learning systems with a number of advantages, such as traditional learning opportunities.

SMART technology training technology includes:

- 1) Tasks on the procedure for creating SMART technologies;
- 2) Requirements to the structure of SMART technologies;
- 3) methods of creating a working curriculum for the subject;
- 4) methods of creating textbooks on the subject;
- 5) methods of creating a workshop on the subject;
- 6) Requirements for the decoration of SMART technologies;
- 7) Rules on the procedure for preparing SMART technologies for publication.

As a result of the application of this technology, the number of learners will increase significantly, and the level of teaching effectiveness will increase.

### Methods and Research

The distance form of teaching is becoming more and more convincing, especially in higher education. The distance form of teaching is more economically viable compared to the full-time form of teaching. This, in turn, allows a volunteer to acquire a profession, improve their skills, focus on professional activities, supplement their knowledge with new information at a relatively low material cost.





The teaching process is characterized primarily by the interactivity of its organization in distance learning, that is, the relationship between student and teacher, the interaction of students, the fact that they have a specific area of knowledge. This means that in the distance learning process, the teacher-student interaction will be a set of teaching aids, including an electronic lecture, resource, or course, with a distance separation. In an independent reading system, there is no teacher, it is the student's independent activity. This is the difference between distance learning and independent learning. Independent reading is the ability to work with standalone courses on videotape, courses on television and radio, computer programs and programs on CDs. This includes the learning process based on networked programs where there is no communication between teacher and student. In this case, the use of the term "distance" is inappropriate, because it refers to the student's independent use of educational programs, information and educational resources on different media. The student can work independently with a book, videocassette and online course. The concept of distance is used only when the teacher and the student are separated by a distance. Distance learning is not an analogue of the external form of teaching. Here, unlike the form of distance reading, they are connected using special Internet technology tools. Distance learning is a new form of teaching in the range of full-time, part-time, external forms, and it should be considered as an independent system of teaching. Whatever form is used in teaching and educating a person, he must conform to and integrate the laws of pedagogy, didactics and private methodology. Distance learning or distance learning can be basic or additional. In the next case we can talk about distance pedagogical activity (organization of distance seminars, quizzes, conferences, Olympiads, work with trainee-researchers).

If the distance form of education is considered as an independent system, then the logical conclusion is that it is necessary to create a single information-educational environment, including electronic sources of information, ie virtual libraries, various trainings, consulting services, multimedia didactic tools, methodological associations. So, when it comes to distance learning, we consider the system in which the teacher, the resource (information-methodological support) and the student exist. It should be noted that the concept of distance learning is increasingly recognized in our country and abroad. This, in turn, necessitates the training of didactic support for distance learning - electronic courses, resources, textbooks, information support of the education system, pedagogical technologies, methods and forms of teaching, pedagogical coordinators and tutors. The conversion of lecture texts, resources and manuals into electronic form does not solve the problem, but only complicates the distance learning process. Because it only changes the form of delivery of educational





material. All other components of the system can be performed as in distance learning. It follows that theoretical work, experimental examinations, serious research work are required. Unfortunately for us, as we see on the Internet, most CDs do not meet the elementary requirements of pedagogy. Pedagogical products produced for distance education do not meet the basic didactic requirements. E-courses should take e-resources as seriously as software and resource development.

Below we discuss the conceptual foundations of distance learning.

The distance learning system should be considered in the system of continuing education along with full-time, part-time, external training systems. A personal-oriented approach that reflects the basic principles of pedagogy is recognized by pedagogical communities around the world for all forms of modern education systems. The learning center is not a learning process, but a cognitive activity, learning, which stems from the individual abilities and abilities of the student. The activity of the teacher should be focused on the organization of productive activities of students. Therefore, the main purpose of the education system is the intellectual and spiritual development of the individual, the formation of critical and creative thinking, teaching to work with information.

A personal-oriented approach to distance learning significantly enhances the educational level of the learning process, relying on the great opportunities offered by the Internet.

The process of distance learning should be organized on the basis of such pedagogical technologies that the following opportunities of students are formed:

- Acquire the necessary fundamental knowledge that can be applied to solve specific scientific or practical problems;
- Solve problems with friends in the process of learning;
- Work with additional sources of information needed to address the issues raised;
- Overcoming all existing problems, applying the acquired knowledge in practice;
- Carrying out independent observations using Internet technologies;
- To be able to assess their knowledge levels, achievements, to correct their activities.

On the one hand, all that is said leads to the formation of critical thinking. On the other hand, the choice of pedagogical technologies and organizational forms is required so that the application of the above teaching conditions serves the formation of critical thinking. Let's focus on the concept of critical thinking. It can be briefly described as: "sequentially argumentative, goal-oriented thinking". Critical thinking is characterized by several factors:

- Striving to plan other mental and voluntary activities;
- Flexibility, which is the opposite of dogmatism;





- Endurance, consistency in achieving the goal;
- Preparation for self-correction.

Modern computer didactic programs (electronic resources, computer assignments, textbooks, hypertext information systems, archives, catalogs, reference books, encyclopedias, test and formative training programs) are created on the basis of multimedia technologies resulting from the intersection of many areas of knowledge. It allows the use of quality graphics, audio-video schemes, formulas, auxiliary presentations, presentation of the studied course in the form of a series or branched chain of dynamic images. Multimedia - systems ensure that the transmission of didactic material is highly convenient and visual, which serves to increase interest in learning and fill gaps in knowledge.

The following technical means and technologies are used in distance learning: trainer, tester and means of communication.

Teaching aids include glossaries, search tools, e-learning manuals, video lectures, and more.

Test tools include test questions, self-checking tools.

The means of communication are forums, mail, audio and video cassettes.

A typical lecture course in traditional teaching involves: lectures, comments (interpretation of teaching material by the speaker), assessment in oral, final exam.

The capabilities of the electronic resource can be expanded using modern means of animation and video. These can be video lectures on the training course, demonstrations of production processes, speeches of famous scientists, lectures and more.

When creating an electronic resource, it is necessary to create a database and enter data into it.

In this case, there are some ways to access the database and perform actions on the materials contained in it.

Didactic programs for modern computers (electronic resources, computer assignments, multimedia didactic tools, hypertext information systems, electronic archives, electronic catalogs, reference books, encyclopedias, test and formative training programs) are among the multimedia teaching aids. Multimedia ensures that the transmission of didactic material is highly convenient and visual, which in turn increases students' interest in learning.

We will focus on the didactic problems of using new information technology tools in the distance learning system.

Informatization is one of the leading factors of socio-economic development, it is an objective process in all spheres of human activity, including education.





Informatization of education is a system of processes, methods, software and hardware as an integral part of this process. The purpose of informatization of education is to ensure the global acceleration of intellectual activity through the use of new information technologies. The development and application of new information technologies is one of the ways to overcome the negative aspects in education.

Thus, one of the important factors influencing all the main directions of reforming the education system is its informatization. Informatization of education, in turn, is a necessary condition and an important stage of informatization of the country. New information technologies serve as the basis for the transition of society from the industrial (industrial) stage to the information stage. New information technology means the collection, collection, processing, storage, transmission of information, microprocessor technology, telecommunication systems and modern means of information exchange, software, hardware and devices based on audio and video technology. We will focus on the role of e-conferences in distance learning. E-conferencing allows you to receive (at least) the text of a message or data transmitted by "conference" participants at different distances from a computer monitor, while the workplace is equipped with devices, such as e-mail. The software depends on the status of the electronic conference use.

Analysis of information processes in distance learning educational institutions shows that the main requirements of the higher education system to the telecommunications system in general should provide:

- 1) Exchange of scientific-educational and practical production information in the form of texts, graphics, speeches, images, reflecting educational-methodical and administrative information;
- 2) Remote access to catalogs and files of remote electronic libraries, user files, databases and knowledge warehouses;
- 3) Use of remote computing resources and remote laboratory workshops;
- 4) Conducting teleconferences and videoconferences for the organization and conduct of the educational process, as well as directing the work of professional working groups, joint publications of authors, electronic publications, teleconferences and teleconferences;
- 5) To create an opportunity to exchange a certain part of information in a confidential form.

Currently, there are problems with the use of computer networks not only due to lack of economic and logistical factors, but also due to the lack of information about the procedure and didactic possibilities, technical, economic and other aspects of using computer networks as a means of teaching.





## Conclusion

Such cases require the creation of a computer network model.

Computer networks have a number of didactic features. Special technical information is required to distinguish between the technical and organizational features of the operation and structure of computer networks. The educator-researcher should know the properties and aspects of computer networks in such a way as to help create an adequate pedagogical understanding of computer networks. This is the goal of creating a computer network model. One of the main directions of the process of informatization of modern society is the informatization of education. Informatization of education is considered in the broadest sense as a methodology, providing the practice of effective use and creation (processing) of new information technology tools aimed at the psychological and pedagogical implementation of learning objectives. In addition, information serves as a basis for the development of distance learning systems.

## List of Used Literature

1. Основы облачных вычислений U/ IBM developerWorks(Технические материалы) Режим доступа:<http://www.ibm.com/developerworks/ru/library/cl-cloudintro/index.html>.
2. Misevicien, R. Application of Cloud Computing at KTU // Informatics in Education, 2011, Vol. 10, No. 2. - URL: [http://www.mii.lt/informatics\\_in\\_education/pdf/TNFE194.pdf](http://www.mii.lt/informatics_in_education/pdf/TNFE194.pdf).
3. Khamidov J.A., Khujjiyev M.Y., Alimov A.A., Gaaffarov A.X., Khamidov O.A. Opportunities and results to increase the effectiveness of multimedia teaching in higher education// Journal of Critical Reviews. - ISSN- 2394-5125 Vol 7, Issue 14, 2020.
4. Usanov M.M. Using of Cloud Technologies in the Process of Preparing Future Specialists for Professional Activity // International Journal of Trend in Scientific Research and Development (IJTSRD).- Volume 4 Issue 5, August 2020. Available Online: [www.ijtsrd.com](http://www.ijtsrd.com) e-ISSN: 2456 – 6470.
5. Усанов М.М. Современная Информационно-Образовательная Среда Как Основа Модернизации Системы Образования / Глобальная наука и инновации: Центральная Азия (см. в книгах) 4 (1), 61-65.
6. Усанов.М.М. Образовательные аспекты использования облачных сетевых сервисов при обучении будущих инженеров / Испанский журнал инноваций и честности. 26 января 2022 г.с-13-19.

