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QUALIFICATION REQUIREMENTS FOR THE PROFESSIONAL COMPETENCE OF FUTURE TEACHERS OF THE SUBJECT "TECHNOLOGY"

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Annotatsiya: Ushbu maqolada bo‘lajak Texnologiya fani o‘qituvchilarini o‘qitishga metodik tayyorgarligi, texnologik ta’lim yo‘nalishiga qo‘yiladigan davlat ta’lim standarti va malaka talablari bilan aniqlanish jarayonlari hamda talabalar tomonidan o‘quv rejasidagi fanlarni o‘zlashtirishlari orqali ta’minlanishi va bo‘lajak Texnologiya fani o‘qituvchilarini kasbiy kompetentligini rivojlantirish jarayonini ko‘rsatib o‘tganmiz.

Аннотация: В данной статье рассматриваются методическая подготовка к обучению будущих учителей технологии, процессы определения государственного образовательного стандарта и квалификационных требований в области технологического образования, освоение студентами предметов учебной программы. показали процесс оценки и развития профессиональной компетентности будущих учителей технологии.

Abstract: In this article, the methodical preparation of future technology teachers for teaching, the processes of determining the state educational standard and qualification requirements for technological education, and students' mastery of the subjects in the curriculum are discussed. and in the development of professional competence of future technology teachers, we have demonstrated the process of professional competence development based on digitized educational resources.

Kalit so‘zlar: raqamlashtirish, ta’lim, muhit, texnologiya, asoslar, o‘qituvchi, fan, texnika, malaka, bilim, ko‘nikma, rivojlantirish, kompetensiya, kasbiy, mazmun.

Ключевые слова: цифровизация, образование, окружающая среда, технологии, основы, учитель, наука, техника, знание, умение, развитие, компетентность, профессионал, содержание.

Keywords: digitization, education, environment, technology, basics, teacher, science, technique, competence, knowledge, skill, development, competence, professional, content.

Global socio-economic, scientific and technical changes imply the organization and management of a system for training future specialists based on a modular approach in a digital environment, as well as the development of professional competence of future specialists in higher educational institutions. Currently, educational standards of developed countries pay special attention to the formation of global skills of students. In this regard, the modernization of existing educational content, image-building technologies, new pedagogical projects, and a system for assessing the results of mastering based on modular technology are of great importance.

Substantiating the content of education is one of the most important and traditional problems of didactics. Taking into account the social essence and pedagogical affiliation of educational content, it can be defined as a pedagogical model of a social order aimed at the education system. This model has a multi-level hierarchical structure.

The competence system serves to ensure the quality levels of professional methodological training.

The results of the development of professional competence of future teachers of technology are analyzed based on the criteria of active, motivational value, cognitive, active incentive, cognitive, creative special social assessment. As a result, it was scientifically substantiated that a

competent future teacher of technology, a specialist with formed social, personal, extreme, technological, pedagogical psychological, methodological, informational, communicative, professional and methodological qualities, is ready to meet the social order and contribute to the development of society.

In the preparation of future technology teachers, their professional competencies are developed, taking into account the specific features of teaching the subject based on digital technologies. In preparing them for teaching this technology, the knowledge, skills and qualifications they receive in training also play an important role. At a higher level - at the level of general theoretical expression, the content of education is determined in the form of generalized systematic knowledge about the composition, elements, structure and functions of social experience transmitted to students. At the level of the subject of study, an understanding is formed about individual parts of the content that perform specific functions in education.

The principles of forming the content of education from the point of view of general didactic concepts, the problem of the content of education, educational goals, principles of teaching and didactic regularities of the educational process are reflected in the research of pedagogical scientists Yu.K.Babansky, V.Beshenkov, U.Nishonaliyev, N.Azizkhodjaeva, V.Thorzhevsky, B.C.Ledneva, I.Ya.Lerner, N.A.Selezneva, M.N.Skatkin and other scientists.

Reforms in higher educational institutions in the formation of a didactic system for the development of professional competencies of teachers of technology lead to some innovative changes. They are aimed at introducing modern pedagogical technologies into the educational process and advanced technologies into production, creating effective models and mechanisms for training highly qualified competitive specialists. Taking into account such conditions, the importance of maintaining professional competence in the professional training of teachers of technology is increasing. This implies the introduction of a new model of technological education, taking into account the goals of the strategy for sustainable development of society, the state, and the national economy. It also implies the provision of conditions for the development of the potential of future teachers based on the active interaction of the subjects of the educational process with the labor market situation. It is very important to create an environment focused on education and development for the management of project activities of future qualified specialists.

The digital transformation of education leads to a look at the transformation of higher education systems, in particular in Europe and Latin America, as they are countries where technology has developed the didactic system of professional competences of teachers in the context of digital transformation. This agenda aims to offer quality, excellent and equitable education for all, with the right to appropriate training, continuous updating and new opportunities and social challenges: adaptability, creativity, innovation, digital competences and the improvement of educational processes. To this end, various action plans have been developed, consisting of three main principles, corresponding measures:

a) Improving the use of digital technologies in teaching and learning processes: improving Wi-Fi connections in schools, using self-assessment tools and digitally certified diplomas.

b) Acquiring and developing digital skills to support digital transformation:

- creating a platform to improve teaching and learning processes in higher education institutions;
- development of scientific digital skills - open science;
- cybersecurity in education;
- training in digital skills and entrepreneurship.

c) Improving the education system based on research, innovation and good practices that contribute to the formation of a digital culture (digital literacy, digital competencies, inclusion and citizenship).

Based on these actions, teachers should acquire the digital skills necessary not only for their personal lives, but also for their professional lives, and as a result, be able to participate in today's digital society, which requires the acquisition of specific skills necessary for teaching and innovation.

Therefore, universities, as scenarios in the socio-educational network for the creation and dissemination of knowledge, are considered key not only for socio-digital transformations, but also for achieving the Sustainable Development Goals (SDGs). These institutions are perceived as an opportunity to provide future generations with the knowledge and skills necessary to confront various global challenges. To this end, the current demand for higher education in the higher education system by 2030, in accordance with the Decree of the President of the Republic of Uzbekistan No. PF-5847 dated 08.10.2019 “On approval of the Concept for the Development of the Higher Education System of the Republic of Uzbekistan until 2030”, requires fundamental changes and changes in curricula, knowledge production in line with the problems, and are important elements in creating the basis for a fair, inclusive and equitable digital society.

The new reality that has forced people to interact remotely has automatically dispelled doubts about the possible use of new technologies in educational processes. People who were previously resistant to the use of new technological aids (mobile phones, tablets, computers, platforms, online learning), technological advances (artificial intelligence, robotics, the Internet, cloud computing, etc.), and who were unaware of didactic strategies have also started to use these additional aids. This leads to collaborative networks that are better suited to the needs of the digital society.

Digital education is any type of learning that is accompanied by teaching practices that effectively use educational resources and teaching technologies. Digitalized education includes the use of a wide range of teaching practices, including integrated and virtual.

The procedure for organizing the digital learning process can be organized by using one or more of the following types:

variable learning;
didactic game or gamification;
complex, that is, theoretical and practical education;
auditorium teaching methodology;
electronic educational resources;
systematic analysis and formation of creative skills;
technical objects and technological processes;
digitization tools: laptops, computers, mobile applications, phones, scanners and video recorders, etc.;
individualized education;
online or distance learning (or e-learning);
open educational resources;
virtual simulators, resources that are closer to reality;

For the digital learning process to be effective, the use of blended learning also gives good results.

Blended learning is a method of teaching using traditional teaching methods, forms and tools with the help of digital educational resources.

Blended learning requires the active physiological participation of the teacher and the student, while allowing the student to control the processes in time and space.

In the scientific research literature, the concepts of "blended learning", "hybrid learning", "technology-enabled learning", "web-enhanced learning" and "blended mode learning" are often used together.

The use of digital educational resources provides teachers with effective pedagogical tools and resources. The use of teaching and learning technologies has the potential to change the educational landscape. Digital learning can empower students to take responsibility for their own learning, encourage critical thinking and develop collaboration.

In order to improve digital learning resources and create an effective learning environment based on teaching tools, we need to analyze the following questions and situations:

Content management: What should we do to manage our content and digital learning resources?

Existing digital resources: What digital learning resources are we currently using effectively? What should we pay attention to in order to change and improve the processes of training future teachers to improve the quality and efficiency of education?

Sources of digital learning resources: Are there gaps and gaps in the modernization of educational content? How do we know which online resources are best for each student for each module and subject? What evidence is needed to make decisions and make choices?

Access to the learning process: Can students use digital learning resources in and out of the classroom?

Collaboration: How do teachers collaborate to support students? How do students collaborate with each other on a peer-to-peer basis?

To identify and implement effective tools and resources for using digital learning resources, school leaders and faculty will need to assess each student's effectiveness in using digital technologies.

To identify the software and applications needed to meet students' digital needs, it will be necessary to analyze the digital learning tools and resources they are currently using. These include:

Video conferencing software for synchronous online communication between teachers and students (e.g., Zoom, Google Meet, Microsoft Teams). When organizing and promoting video conferencing, ensure that teachers have clear guidelines on privacy settings, managing disruptions in video conferencing, and proper use of the video conferencing software.

A learning management system or LMS to organize learning materials and resources for students (e.g., Schoology, Canvas, Google Classroom, Edmodo).

Educational apps and software that align with the district or school's pedagogical and learning goals.

Single sign-on technology to manage access to the system and facilitate student access to digital tools (e.g., Clever, OneLogin, ClassLink).

The use of digitized educational resources provides an opportunity for educational institutions to rethink and change assessment and monitoring requirements, especially when digital learning is implemented in emergencies.

For teachers, assessment provides information about student achievement that can be used to make decisions about future instructional goals and instruction. In a digital learning environment, assessing students' acquisition of knowledge, skills, competencies, and competencies based on levels and criteria may differ from assessing learning in traditional settings, but is especially important in digital learning settings.

Digital learning resources provide opportunities for more authentic and meaningful assessment than can be determined by the results of the assessment process. Non-traditional types of assessment used with digital learning resources should provide flexibility and

individualization for each student, especially when combined with competency-based learning. For example, educational institutions can use adaptive software that determines the correct level of students' mastery of professional competencies and provides lessons and assessments that correspond to this level, and processes based on educational technologies, based on questions that clarify technical objects and technological processes for students.

In conclusion, it can be said that higher education institutions have their own characteristics that should not be ignored. These characteristics become even more important given the different goals and cultures that exist in the world of educational institutions.

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