

METHODS FOR DEVELOPING STUDENTS' INDEPENDENT LEARNING SKILLS THROUGH THE USE OF DIGITAL EDUCATION TECHNOLOGIES

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Annotation. This article outlines the theoretical, pedagogical, and methodological foundations for developing students' independent learning skills through the use of digital educational technologies in the modern educational process. Today, digital transformation is significantly influencing the content, forms, and methods of education, requiring students to shift from being passive recipients of ready-made knowledge to active participants capable of independently organizing their own learning activities.

From this perspective, fostering skills such as independent information seeking, information filtering and analysis, purposeful use of digital resources, practical application of acquired knowledge, and self-monitoring and evaluation of results is considered a key pedagogical task.

Keywords: digital education, digital educational technologies, independent learning, independent learning skills, digital competence, information literacy.

Аннотация. В данной статье рассматриваются теоретические, педагогические и методические основы развития у учащихся навыков самостоятельного обучения посредством использования цифровых образовательных технологий в современном образовательном процессе. Сегодня цифровая трансформация оказывает значительное влияние на содержание, форму и методы обучения, требуя от учащегося превращения из субъекта, легко воспринимающего знания, в активного субъекта, способного самостоятельно организовывать свою учебную деятельность.

С этой точки зрения, одной из важных педагогических задач является формирование у учащихся навыков самостоятельного поиска информации,

систематизации и анализа информации, целенаправленного использования цифровых ресурсов, применения полученных знаний на практике, контроля своей деятельности и оценки ее результатов.

Ключевые слова: цифровое образование, цифровые образовательные технологии, самостоятельное обучение, навыки самостоятельного обучения, цифровая компетентность, информационная грамотность.

Annotatsiya. Mazkur maqolada zamonaviy ta'lim jarayonida raqamli ta'lim texnologiyalaridan foydalanish orqali o'quvchilarning mustaqil ta'lim olish ko'nikmalarini rivojlantirishning nazariy, pedagogik va metodik asoslari yoritilgan. Bugungi kunda raqamli transformatsiya ta'lim mazmuni, shakli va metodlariga sezilarli ta'sir ko'rsatib, o'quvchining bilimlarni tayyor holda qabul qiluvchi subyektdan o'z ta'lim faoliyatini mustaqil tashkil eta oladigan faol subyektga aylanishini talab etmoqda.

Shu nuqtayi nazardan, o'quvchilarda mustaqil ravishda ma'lumot izlash, axborotni saralash va tahlil qilish, raqamli resurslardan maqsadli foydalanish, o'zlashtirilgan bilimlarni amaliyotda qo'llash, o'z faoliyatini nazorat qilish va natijalarini baholash ko'nikmalarini shakllantirish muhim pedagogik vazifalardan biri hisoblanadi.

Kalit so'zlar: raqamli ta'lim, raqamli ta'lim texnologiyalari, mustaqil ta'lim, mustaqil ta'lim olish ko'nikmalari, raqamli kompetensiya, axborot savodxonligi.

One of the key factors in society's development in the 21st century is a person's ability to independently acquire new knowledge and skills, analyze existing information, and adapt it to their own activities. The rapid increase in the amount of information and the integration of digital technologies into everyday life and professional activities pose new challenges for the education system. A modern school student should not only master the knowledge set out in the curriculum but also be competent in independently searching for new knowledge, processing it, and applying it in practice. In the traditional education model, the teacher was the main source of information, and the student was the receiver of knowledge, but in modern education, these roles are gradually changing. Students have the

opportunity to learn using various electronic textbooks, video lessons, educational platforms, virtual labs, e-libraries, and other digital resources. As a result, the boundaries of time and space in the learning process expand, creating new opportunities for students to engage in independent learning. Digital learning technologies are also increasing the possibilities for personalizing and differentiating education. It's possible to design learning tasks based on each student's knowledge level, interests, learning pace, and individual needs. This serves as an important methodological foundation for systematically organizing students' independent learning activities. The goal of this research is to develop effective methodological foundations for fostering students' independent learning skills through the use of digital learning technologies. To achieve this goal, the following tasks were set: to identify the pedagogical essence of independent learning skills; to study the didactic possibilities of digital learning technologies; to determine methods for organizing students' independent learning activities; to develop a system of independent tasks based on digital tools; to set criteria and indicators for assessing independent learning skills and to substantiate the pedagogical effectiveness of the methodological approach.

The pedagogical meaning of the concept of independent learning. Independent learning reflects the student's purposeful activity aimed at expanding their knowledge, reinforcing existing knowledge, and acquiring new knowledge. In the process of independent learning, the student acts as a subject of the educational activity, having the opportunity to plan their work in completing a certain task, select necessary resources, process information, and evaluate their results. To effectively organize independent learning, a student needs to develop a range of skills. These include setting goals, managing time properly, searching for information sources, analyzing data, approaching problems from different perspectives, drawing conclusions, and self-monitoring. These skills form the foundation of independent learning.

The pedagogical potential of digital learning technologies. Digital learning technologies are a set of tools that serve to present educational content

electronically, interact with students, monitor the learning process, and create opportunities for individualized learning. One of the main advantages of digital technologies is that they allow students to quickly access educational resources. Using e-textbooks, video lessons, audio materials, animations, interactive tasks, and virtual experiences helps students learn the topic in different ways.

Additionally, the digital environment lets students organize their learning at their own pace. For example, if a student has trouble understanding a particular topic, they can rewatch a video lesson, study extra online resources, or redo interactive exercises.

Another important feature of digital technologies is that they provide instant feedback. Through online tests and automated tasks, students can check their knowledge and spot their mistakes. This process helps them develop self-monitoring skills and the drive to improve their own learning. Mustaqil ta'lim olish ko'nikmalarining tarkibiy tuzilishi. The skills for students to learn independently can be described based on several components.

This kind of task develops multiple skills at once: searching for information, analyzing, selecting, summarizing, using digital tools, and presenting results.

Using the project method in independent learning is also considered effective. Students can create a small project on a specific topic based on digital sources. During the project, they identify the problem, collect information, analyze it, come up with a solution, and present their results.

Digital portfolios and self-assessment. Using a digital portfolio is one of the effective tools for monitoring students' independent learning activities. A digital portfolio allows students to systematically compile the work they have done over a certain period. A portfolio can include independent assignments, projects, electronic presentations, creative works, test results, self-assessment materials, and reflective writings.

In today's digital learning environment, using AI-based tools can also expand students' opportunities for independent learning. These tools can be used to generate questions on a topic, get explanations for concepts that aren't clear,

summarize learning materials, brainstorm ideas, or check one's own knowledge. However, during the process of using artificial intelligence, the student's independent thinking should come first. Instead of directly accepting ready-made answers, the student needs to verify the received information, compare it with other sources, and form their own conclusions.

For this reason, assignments based on the use of AI tools should focus not on "getting the ready answer," but on "analyzing and justifying the answer."

Criteria for assessing independent learning skills. The following criteria can be used to evaluate students' abilities to learn independently:

Motivational criterion refers to interest in gaining knowledge independently, understanding educational goals, and the desire to work on oneself. The information criterion refers to independently searching for necessary information, selecting digital sources, and assessing the reliability of the information. Cognitive criteria involve analyzing, comparing, summarizing, and drawing conclusions from information. Practical criteria involve applying acquired knowledge to practical tasks and effectively using digital tools. Reflective criteria involve evaluating one's own activities, identifying mistakes, and planning future work. Based on these criteria, students' ability to learn independently can be determined at low, medium, and high levels.

A high-level student independently sets educational goals, chooses the necessary resources, critically analyzes information, effectively uses digital tools, and evaluates their own results. A mid-level student is capable of completing independent tasks but still needs the teacher's help at certain stages.

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