

CURRENT ISSUES OF USING MODERN DIGITAL TECHNOLOGIES IN EDUCATION

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ABSTRACT

This article is devoted to the analysis of the key challenges and problems that arise when introducing digital technologies into the educational process. The article considers such issues as digital inequality, insufficient training of teachers to use new tools, as well as information overload of students.

Keywords: Digital technology, digital inequality, teacher training, information overload, cybersecurity, privacy.

INTRODUCTION

Modern digital technologies have become an integral part of the education system, opening up new opportunities for teaching and learning. However, with their active implementation, certain problems arise that require attention from educators, administrators, and researchers. In this article, we will consider the key problems of using digital technologies in education and possible ways to solve them.

1. Digital Inequality

One of the most pressing problems is the digital inequality, which manifests itself in the gap between students with access to modern technologies and those who do not. In rural or economically disadvantaged areas, students may not have access to computers, the Internet, or modern digital resources. This puts them at a disadvantage compared to students from urban schools or high-income families.

Research shows that the digital divide is exacerbated by distance learning, which has become relevant during the COVID-19 pandemic. Students who lack access to digital tools are forced to miss classes or have difficulty completing assignments, which reduces the quality of their education.

Solution: To overcome this inequality, government support is needed in the form of programs that provide students with computers, internet, and necessary software. An example of a successful implementation is the "One Laptop per Child" program, which provided low-cost laptops to schoolchildren in developing countries [1].

2. Teacher training

Digital technologies require new skills and knowledge from teachers. However, many teachers, especially in older age groups, do not have sufficient digital literacy to effectively use modern technologies in the teaching process. This leads to the fact that even with the availability of digital tools, they may be used ineffectively.

Teachers often experience stress and overload when it comes to mastering new technologies. As a result, many teachers return to traditional teaching methods, leaving digital technologies

aside. Thus, the problem of insufficient teacher training becomes one of the main barriers to the introduction of technology in education. Solution: An important measure to address this issue is to organize professional development courses for teachers to help them master modern technologies. Such courses should cover not only technical skills but also pedagogical methods that allow for the effective use of digital technologies in the educational process [2].

3. Information overload

With the rapid growth of educational resources and digital platforms, students and teachers are faced with the problem of information overload. The large amount of available data, courses, and materials can lead to students being at a loss for choice and unable to focus on key topics.

With the Internet offering endless access to information, students may have difficulty concentrating and filtering relevant data. This can reduce motivation and interest in learning, as they try to master everything at once instead of systematically studying topics.

Solution: To combat information overload, it is important to develop students' information handling skills, including critical thinking, the ability to search for and select relevant sources. Teachers should provide structured curricula and specific sources to guide students in their learning activities [3].

4. Cybersecurity and data privacy

The use of digital technologies in education also raises issues of cybersecurity and data privacy. Educational platforms collect and process a huge amount of information about students: from their personal data to their academic performance and activity on the platform. There is a risk of data leakage or its use without the consent of students.

In addition, students become more vulnerable to cyberattacks and online fraud. Online learning platforms can be hacked, which puts the security of educational processes at risk.

Solution: Educational institutions must implement data protection systems and train both teachers and students in the basics of cybersecurity. It is important to develop and maintain strict privacy policies and ensure compliance with international data protection standards [4].

5. Issues with student motivation and engagement

Digital technologies can both stimulate and reduce motivation to study. On the one hand, tools such as gamification, virtual reality, and interactive platforms can increase students' interest in learning. On the other hand, the lack of personal contact with the teacher in a distance learning environment can lead to a decrease in student motivation and engagement.

Many students report that online learning creates a feeling of isolation and lack of support. This is especially true for younger students who need constant feedback and interaction with teachers [5].

To increase student motivation, it is important to combine digital technologies with active interaction between the teacher and students. Using interactive formats such as online discussions, group projects, and real-time feedback helps to maintain student motivation and engagement.

CONCLUSION

The use of modern digital technologies in education provides many opportunities to improve the learning process, but it also poses a number of challenges. Digital inequality, insufficient teacher training, information overload, cybersecurity issues, and decreased student motivation are just some of the challenges that educational institutions face. Addressing these issues requires a comprehensive approach that includes not only technological changes, but also the development of digital literacy, curriculum adaptation, and support for both teachers and students.

REFERENCES

1. Zubov, A.V. Information technology in linguistics: Textbook / A.V. Zubov. - M.: Academia, 2017. - 576 p.
2. Information technology and computing systems: Computer graphics. Management and decision making. Informatics in medicine / Ed. S.V. Emelianov. - M.: Lenand, 2006. - 116 p.
3. Isaev, G.N. Information technology: Textbook / G.N. Isaev. - M.: Omega-L, 2013. - 464 p.
4. Korotaev, M.V. Information technology in geology / M.V. Korotaev, N.V. Pravikova, A.V. Apletalin. - M.: KDU, 2012. - 298 p.
5. Kurilova, A.V. Information technologies in professional activity. Textbook / A.V. Kurilova, V.O. Oganessian. - M.: Academia, 2008. - 224 p.