ARTIFICIAL INTELLIGENCE AND ITS ROLE IN EDUCATION

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Abstact.*One of the important factors of artificial intelligence is machine model training and its application in education and other fields. Machine learning is the practice and theory of creating self-learning programs, a large part of artificial intelligence. This article discusses the importance, advantages and disadvantages of artificial intelligence in education.*

Key words: *artificial intelligence, digital education, teaching methodology with the help of SI, thousands of positive aspects of SI, negative effects of SI,*

Programmers teach their algorithms to identify general patterns in specific cases. As a result, the computer makes decisions based on its own personal competence, and not on the instructions given by the person in advance. Many such training methods can be applied to data mining. The first definition of machine learning was given by the American computer scientist Arthur Samuel in 1959. He created the world's first self-learning program, a chess game with elements of artificial intelligence. Through machine learning, computers learn to recognize not only faces in photos and images, but also landscapes, objects, text and numbers. Learning on the computer is also important when it comes to text: grammar checking is now available in any text editor and even on phones. In addition, not only the spelling of words, but also the context, shades of meaning and other subtle linguistic aspects are taken into account. In addition, there are software programs that allow you to write news articles without human intervention (on economic, sports, etc.). It is known that special attention is paid to the education of the young generation on a global scale. Activities to create all necessary conditions for young people to acquire modern education and grow up with high spirituality are being carried out consistently.By the 21st century, science has improved to such an extent that it has become impossible to imagine a single day of our life without scientific achievements and techniques. In particular, concepts such as information society and artificial intelligence have become an important part of our lives. Expanding the use of artificial intelligence technologies, digital In order to improve the system of data collection, storage and processing, a number of works are currently being carried out in our country to train qualified personnel in this field, to support scientific projects in this direction. -is a system or technology that is capable of imitating the behavior of a person and gradually improves it using the acquired information. In general, artificial intelligence is neither a format nor a function, but a process that includes data collection, analysis, etc.When talking about artificial intelligence, it is necessary to analyze its place in business and information technology. The gradual penetration of artificial intelligence into these areas will ensure that the number of artificial intelligence tools increases. Artificial intelligence (AI) is now a very popular term all over the world. It is an emerging technology that

trains machines to think, act or react like humans. So, everyone should be clear about what AI is, how AI works and its main tools and applications. Machines are known to be programmed to imitate human actions, speak and interact like humans, and work non-stop.

However, it is important to know the types of AI, major subfields such as machine learning, deep learning, and natural language processing (NLP) and its applications in various fields and the progress made so far. This article covers all the above areas and tries to make the reader well aware of the important aspects of artificial intelligence. The field of artificial intelligence includes learning from data, reasoning, natural language understanding, perception of images and sounds and various Emphasis is placed on creating software and systems that enable decision-making using data gathered by tools. In supervised learning, machines learn from sample articles labeled by humans, while in unsupervised learning, they learn patterns in data sets without specific instructions. Good learning, the latest development in machine learning, is layered neural networks. involves learning a large amount of data with Here, large amounts of data are fed into algorithms to learn or perform complex tasks. Today, AI software is more sophisticated and sophisticated, from voice assistants to stock market prediction algorithms, natural language processing, and image recognition software. Artificial intelligence deals with robotics and provides machines that automate routine activities.

Artificial intelligence is changing the teaching process in education.

Since the beginning of education, teaching strategies, as well as the relationship between students and teachers, have evolved significantly. Teaching strategies around the world have become an additional framework for managing higher, more effective results. This change will be mainly due to the continuous intervention of technology. On the back of continuous technological advancement, we are witnessing a paradigm shift in the way we teach and teach. the relationship between teachers and students is dynamic, where teachers are extra comfortable and much more able to understand the views of their students. Technology has created a more collaborative learning experience as academics and students navigate the two-person bike for higher performance.

How is artificial intelligence currently being used in education?

A report by Microsoft and McKinsey of more than 2,000 students and 2,000 teachers from Canada, Singapore, the UK and the US shows that AI is already providing innovative ways for teachers and schools to understand how to make things smarter. their students are developing, as well as allowing for rapid, personalized, targeted continuity of content.

The role of artificial intelligence in education

1.Artificial intelligence to evaluate key activities in education, for example

can automate. Although artificial intelligence is never ready to replace human judgment, it is very closed. At this point, academics can tweak almost any type of multiple-choice test and fill-in-the-blank assessment, and automated grading of student writing may not be far behind.

2. Students can get additional help from artificial intelligence teachers. These programs teach students the basics, but so far are not ideal for serving students to learn higher-order thinking and creative thinking, something that real-world educators are still required to facilitate. Still, this shouldn't rule out the possibility that AI tutors will be able to test these things in the future.

3. AI-based software can provide useful feedback to students and teachers

The use of artificial intelligence (AI) technologies in education provides a number of advantages. Below are the main advantages that can be achieved with the help of SI in making the educational process effective and interesting:

1. Opportunity for personalized learning

Artificial intelligence analyzes students individually to help create customized learning plans based on their abilities, strengths, and weaknesses. Assignments, lessons, and resources tailored to each student are provided by artificial intelligence. This increases efficiency, especially when students prefer to learn at their own pace.

2. Automatic evaluation and simplification of tasks

With the help of artificial intelligence, the possibility of automatic evaluation of tests and written work will appear. This saves time for teachers and allows them to focus on other important matters. Also, avoiding common human errors in evaluation makes the evaluation process more accurate.

3. Distance learning and fast support

Distance education can be effectively organized through artificial intelligence technologies. SI platforms enable students to learn at a distance, facilitating learning of course materials by students at any time. For example, through chatbots equipped with artificial intelligence, students can get quick answers to questions and overcome difficulties.

4. Interactive learning assistants and chat-bots

Assistive tools and chatbots developed on the basis of artificial intelligence provide additional information and support to readers.These virtual assistants answer students' questions, provide guidance, and help solve problems. As a result, even though the teacher is not always with the student, students have access to additional support.

5. Data analysis and optimization of the training process

Analyzing large amounts of educational data becomes easier through artificial intelligence. These analyzes allow teachers to assess the level of student achievement, identify gaps in the educational process, and change strategies based on them. As a result, the effectiveness of the educational process increases, and difficulties for students decrease.

6. Develop creativity and problem solving skills

Artificial intelligence technologies provide students with interactive activities that develop creativity and problem-solving skills. For example, through virtual labs or simulations, students learn to solve problems they may encounter in a real environment, which prepares them for future careers.

The benefits of artificial intelligence in education are multifaceted. These technologies help create a more accessible, personalized and interactive learning environment for students. It allows teachers to save time and resources, effectively monitor student learning and improve the educational process.

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Summary

The benefits of artificial intelligence in education are multifaceted. These technologies help create a more accessible, personalized and interactive learning environment for

students. It allows teachers to save time and resources, effectively control students' learning and improve the educational process. In conclusion, it can be said that artificial intelligence has become an integral part of our lives. But it also has certain disadvantages. For example, as artificial intelligence advances, so do professional jobs. It is also having a significant impact on healthcare, teaching, law enforcement, emergency responders, social workers, and customer service. Remember, artificial intelligence has never been about creativity. , people who are interested in ideas cannot occupy the profession. Many examples of such areas can be given.

REFERENCES:

1. Axrorjon, Y., Alijon, M., & Iqlima, A. Faol texnologiyalarni oʻsmirlarpsoxologiyasiga ta'siri. Ta'lim fidoyilari, 2022.

2. Yoldashev, A. E. O., Nishonqulov, S. F. O., & Yoldasheva, M. R. Q.Ta'limdagi axborot texnologiyalari. Scientific progress, 2021.

3. Ashurov J.Dj., Zamonaviy ta'lim muhitida raqamli pedagogikaning o'rni vaahamiyati // 2021.

4. Q.A.Bekmuratov. Sun'iy intellekt. Oliy ta'lim muassasasi talabalari uchunoʻquv qo'llanma. - T.: "Aloqachi", 2019

5.Axrorjon, Y., Alijon, M., & Iqlima, A. Faol texnologiyalarni o'smirlar psoxologiyasiga ta'siri. Ta'lim fidoyilari, 2022.

6. Yoldashev, A. E. O., Nishonqulov, S. F. O., & Yoldasheva, M. R. Q. Ta'limdagi axborot texnologiyalari. Scientific progress, 2021.

7. Ashurov J.Dj., Zamonaviy ta'lim muhitida raqamli pedagogikaning o'rni va ahamiyati // 2021.

8. Q.A. Bekmuratov. Sun'iy intellekt. Oliy ta'lim muassasasi talabalari uchun o'quv qo'llanma. - T.: "Aloqachi", 2019.

9) Business Insider Nederland, Consumer-goods giant Unilever has been hiring employees using brain games and artificial intelligence – and it's a huge success, 2017

10) Ziyatovich, M. F., & Islom o'g'li, X. S. (2023). SUN'IY INTELLEKT VA UNING TA'LIM SOHASIGA ALOHIDA MUROJAAT QILGAN HOLDA TURLI SOHALARDAGI QAMROVI. ОБРАЗОВАНИЕ НАУКА И ИННОВАЦИОННЫЕ ИДЕИ В МИРЕ, 16(3), 16-19.

11) Ziyatovich, M. F. (2022). EFFECTIVE USE OF E-LEARNING RESOURCES IN EDUCATION. PEDAGOGS jurnali, 5(1), 132-140.

12) Мамажанов, Р. Я., & Хайдаров, Ш. И. (2022). РАЗРАБОТКА МЕТОДОВ И АЛГОРИТМОВ ДЛЯ РАСПОЗНАВАНИЕ ДОРОЖНЫХ ЗНАКОВ. CENTRAL ASIAN JOURNAL OF MATHEMATICAL THEORY AND COMPUTER SCIENCES, 3(10), 50-57.