

## **DEVELOPING MECHANISMS FOR DEVELOPING THE TOURISM INDUSTRY BASED ON ARTIFICIAL INTELLIGENCE**

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<b>ABSTRACT</b>	<b>KEYWORDS</b>
<p>This article examines the mechanisms for developing the tourism sector based on artificial intelligence technologies. It highlights the role of artificial intelligence in tourism systems, particularly in data analysis, the provision of personalized services, and the improvement of service quality through chatbots and intelligent recommendation systems. The study also emphasizes the importance of artificial intelligence in effective tourism management, forecasting tourist flows, and the rational use of resources. In addition to outlining the advantages of implementing these technologies, the article analyzes existing challenges and explores the prospects for the application of artificial intelligence in the tourism industry of Uzbekistan.</p>	<p>Artificial intelligence, tourism, digital technologies, intelligent systems, chatbots, recommendation systems, data analysis, forecasting, personalized services, tourism management.</p>

### **Introduction**

#### **Anotatsiya**

Mazkur maqolada sun'iy intellekt texnologiyalaridan foydalangan holda turizm sohasini rivojlantirish mexanizmlari tahlil qilinadi. Unda sun'iy intellektning turizm tizimidagi o'rni, xususan, ma'lumotlarni tahlil qilish, shaxsiylashtirilgan xizmatlar ko'rsatish, chatbotlar va aqlli tavsiya tizimlari orqali xizmat sifatini oshirish imkoniyatlari yoritilgan. Shuningdek, turizmni samarali boshqarish, turistlar oqimini prognozlash va resurslardan oqilona foydalanishda sun'iy intellektning ahamiyati ko'rsatib o'tilgan. Maqolada ushbu texnologiyalarni joriy etishdagi afzalliklar bilan birga

mavjud muammolar ham tahlil qilinadi hamda O‘zbekiston turizm sohasida sun’iy intellektdan foydalanish istiqbollari yoritiladi.

**Kalit so‘zlar.** sun’iy intellekt, turizm, raqamli texnologiyalar, aqlli tizimlar, chatbotlar, tavsiya tizimlari, ma’lumotlar tahlili, prognozlash, shaxsiylashtirilgan xizmatlar, turistik boshqaruv.

## **Аннотация**

В данной статье рассматриваются механизмы развития туристической отрасли на основе технологий искусственного интеллекта. Освещается роль искусственного интеллекта в системе туризма, в частности возможности анализа данных, предоставления персонализированных услуг, повышения качества обслуживания с помощью чат-ботов и интеллектуальных рекомендательных систем. Также показано значение искусственного интеллекта в эффективном управлении туризмом, прогнозировании туристических потоков и рациональном использовании ресурсов. В статье наряду с преимуществами внедрения данных технологий анализируются существующие проблемы, а также раскрываются перспективы использования искусственного интеллекта в туристической отрасли Узбекистана.

**Ключевые слова.** искусственный интеллект, туризм, цифровые технологии, интеллектуальные системы, чат-боты, рекомендательные системы, анализ данных, прогнозирование, персонализированные услуги, управление туризмом.

In the current digital era, the tourism industry is one of the fastest growing sectors. The widespread use of information technologies, especially the introduction of artificial intelligence (AI) technologies, is helping to further improve tourism services. With the help of artificial intelligence, it is possible to create convenience for tourists, improve the quality of service, and optimize the management system. Uzbekistan has enormous potential in the tourism sector - a strategic location on the Silk Road, rich cultural heritage, and historical cities.

The Strategy for the Development of Artificial Intelligence Technologies in Uzbekistan until 2030 has been approved, which sets high-quality and interactive services for tourists visiting tourism facilities, including museums and other cultural sites, as a priority. In the world, AI-based booking systems, virtual reality tours, and sustainable tourism initiatives are being studied as the latest innovative mechanisms in the tourism industry and their effectiveness has been analyzed. AI-based booking systems perform the following: Analyze tourist preferences and offer personalized itineraries, Predict prices and determine optimal times, Manage real-time availability and services.

The ability to create virtual tours, interactive guides for cultural sites, and analyze tourist needs using artificial intelligence is very useful for tourism and culture professionals.

Modern information technologies are being used to provide information about the tourist status of regions to foreigners. In particular, a video in English, French, and German, animated using artificial intelligence, was prepared with the help of the Singapore Institute of Management Development in Tashkent.

For the development of artificial intelligence technologies, the Fund for Reconstruction and Development has provided the Ministry of Digital Technologies with an interest-free loan of \$50

million for a period of 5 years with a 2-year grace period from January 1, 2025. Shavkat Mirziyoyev announced a number of major initiatives aimed at the rapid development of the AI sector. According to them, a supercomputer cluster will be launched in partnership with Nvidia, and a National Transfer Office will be opened in Silicon Valley, USA.

Artificial intelligence plays an important role in tourism in the following areas: Data analysis - studying the behavior and interests of tourists

Personalized services - providing recommendations tailored to each user

Automated services - providing services through chatbots and virtual assistants. Forecasting - predicting tourism flows in advance and planning resources. AI-based mechanisms in tourism development

Artificial intelligence-based platforms recommend hotels, restaurants, and attractions to tourists based on their interests.

Chatbots that work 24/7 provide tourists with instant information, answer questions, and simplify the booking process. AI algorithms can be used to automatically create travel itineraries, optimize time and costs. Tourists can identify places through images and get information about historical monuments.

Artificial intelligence predicts tourism flows based on Big Data, identifies seasonality, and helps in making business decisions.

Artificial intelligence is an innovative tool that can take the tourism industry to a new level. It plays an important role in improving the quality of services, ensuring an individual approach to tourists, and increasing economic efficiency. In the future, the further development of the tourism industry can be achieved through the widespread introduction of AI technologies.

According to the strategy for the development of artificial intelligence technologies until 2030, it is planned to include Uzbekistan in the top 50 countries in the international AI readiness index. (Accountant) The tourism industry plays an important role in achieving this goal - because it is one of the main sectors that form the country's "soft power" and international image.

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