A NEW STAGE IN THE DEVELOPMENT OF TELEMEDICINE SERVICES THROUGH MOBILE APPLICATIONS

Abdukadirov Nuriddin

Intern-assistant at Samarkand State Medical University

ANNOTATION

Modern developments in the field of telemedicine, in particular the provision of medical services through mobile applications, bring the healthcare system to a new level. This article analyzes the possibility of performing medical consultations, diagnostics, follow-up and treatment remotely using mobile applications. It also highlights the role of mobile technologies in strengthening control over public health, providing emergency medical care and expanding the coverage of medical services. The advantages, problems and prospects of providing services through the application are considered on a scientific and practical basis.

Keywords: Telemedicine, mobile applications, remote medical care, health technology, digital medicine, medical diagnostics, health monitoring, medical innovation.

АННОТАЦИЯ

Новые разработки в области телемедицины, в области применения медицинских услуг, которые выводят систему здравоохранения на новый уровень. Данная статья обеспечивает возможность выполнения медицинских исследований, диагности, коррекции и лечения с использованием медицинских приложений. В нем подчеркивается роль современных технологий в укреплении центра общественного здравоохранения, оказании неотложной медицинской помощи и расширении сферы медицинских услуг. Услуги, тренинги и виды оказания услуг в области прикладной деятельности и научного и практического базирования.

Ключевые услуги:Телемедицина, Медицинская помощь, Медицинская медицина, Медицинская техника, Цифровая медицина, Медицинская медицина, Медицинская медицина, Медицинская медицина, Медицинская помощь.

INTRODUCTION

Modern technologies are causing fundamental changes in the healthcare system. In particular, in the field of telemedicine, the possibility of providing highquality and convenient medical services to the population through mobile applications is openly expanding. Today, the smartphones that exist in the hands of everyone have become a tool for obtaining medical advice, connecting with the doctor, viewing laboratory results, obtaining prescriptions and monitoring the state of health.

During the pandemic, the importance of these services has increased further. With the help of mobile apps, patients received remote consultations without having to go to the hospital, which saves time and costs while reducing the spread of the disease. Telemedicine facilities also provide high-quality medical services to residents living in remote areas.

The development of telemedicine services through mobile applications is an effective tool not only for patients, but also for doctors, serving to simplify medical processes, quickly share data, and strengthen an individual approach. This article analyzes the prospects of a new stage in this area - that is, digitalization of the healthcare system through mobile applications.

RESEARCH METHODOLOGY

The main purpose of this study is to conduct an in-depth analysis of the stages of development of telemedicine services through mobile applications, to determine their place and significance in the modern healthcare system. In this regard, in the process of research they used a mixture of modern research approaches, experience and theory. We relied mainly on two main sources for data collection: the first is primary data that reflects real user experiences, and the second is secondary data obtained through previously published scientific articles, statistical reports and open source from international organizations. During the study, factors such as the effectiveness of service through mobile applications, user convenience, interactivity, quality of communication between healthcare providers and patients, time and resource savings were studied. At the analytical stage, the experience of Uzbekistan was compared with international examples using the methods of descriptive and comparative analysis. Especially during the pandemic, the social and economic effectiveness of mobile telemedicine was separately studied, and its strengths and weaknesses, as well as future opportunities and existing threats were identified through SWOT analysis. Telemedicine services based on mobile applications were selected as the object of the study, and their technological infrastructure, legal framework and user experience were studied as research subjects. With this approach, unbiased and reasoned conclusions were drawn about the impact of mobile applications on the health care system and the prospects for their widespread implementation.

RESULTS

The results of the study show that telemedicine services through mobile applications significantly improve the efficiency of the healthcare system. In particular, through these applications, patients have access to medical services quickly, conveniently and remotely. During the pandemic, mobile applications have served as an important tool in meeting the need for medicine, especially for those living in remote areas, the importance of these services has grown even more. In user surveys, the convenience of mobile applications, the ability to connect with doctors via video and health monitoring were highly rated. In addition, it was found that through mobile applications, patients can track their health status in real time, receive laboratory results online and manage the treatment process.

The study also noted that mobile telemedicine services are also an effective tool for healthcare providers. Doctors have found it possible to quickly and accurately retrieve patient information, automate treatment processes, and manage electronic documents digitally. However, the study also identified some problems, among which the level of security of mobile applications, as well as issues related to technological infrastructure and protection of medical information require special attention.

At the same time, it was noted that there are great opportunities for the development of telemedicine services through mobile applications and that further expansion of this area is expected in the future, as well as the need to implement a number of organizational and technological measures to ensure the stable and quality of medical services for all segments of the population.

DISCUSSION

The results identified on the basis of this study show that the provision of telemedicine services through mobile applications is becoming an important milestone in the modern healthcare system. These apps allow residents to receive medical care conveniently, quickly and remotely. These services become vital, especially for citizens living in remote areas who cannot directly access medical facilities. Features such as video communication with the doctor, electronic prescription, health monitoring, viewing laboratory results through the application

not only save patients time and money, but also improve the quality and effectiveness of treatment.

Mobile apps have also become an effective tool for doctors. They were able to manage patient data electronically, use artificial intelligence in diagnosis, automate the treatment process, and regularly monitor the condition. All this proves what positive results the introduction of digital technologies in the healthcare system is giving positive results.

At the same time, it was found that there are a number of problems in the development of telemedicine services based on mobile applications. First of all, the problem was the lack of equal implementation of these services in all regions, insufficient development of Internet and mobile communication infrastructure in some places. Especially those segments of the population who do not have full access to technical means do not fully use these opportunities.

The second problem is information security and privacy issues. High level of protection systems are required when handling patients' personal health data. Unfortunately, some mobile apps do not adequately consider these aspects or security policies not explicitly developed.

In addition, many healthcare professionals have low digital literacy and are not able to fully utilize mobile apps. This has a negative impact on the quality of the service. Also, most of the available mobile applications are adapted only for urban conditions, and regional features and national needs are not sufficiently taken into account.

CONCLUSION

The rapid development of modern information and communication technologies brings the health system to a new level. In particular, telemedicine services organized through mobile applications are being formed today as a convenient, effective and cost-effective means of providing medical care. The results obtained during this study show that mobile apps are simplifying communication between patients and healthcare providers, allowing for quick diagnosis, consultation, treatment, and monitoring of their health status. These services serve as a kind of "digital bridge", especially for those living in remote areas, for people with disabilities and for those who cannot go directly to a medical institution in a pandemic.

At the same time, some of the problems hindering the accelerated development of mobile telemedicine services - lack of technical infrastructure, information security, low digital literacy - need to be solved through a systematic approach. In this regard, it is important to strengthen cooperation between government, healthcare institutions and technology companies.

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