УДК 811.111:61:004.896
ARTIFICIAL INTELLIGENCE IN HEALTHCARE

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Artificial Intelligence (AI) is a smart artificial neural brain which mimics human thought process, and acts in a human-like way. It doesn't have any physical form: bones and muscles. However, it is able to receive data from environment on its own or combined with other technologies (e.g. sensors, geolocation, robotics). AI can perform tasks that would otherwise require human intelligence or intervention.

The scope of AI applications is growing nowadays. Significant results have been observed in healthcare over the past few years. According to the research results that were published by some scientists they have developed an algorithm for predicting abnormal pressure during surgery. They used AI which analyzed information of blood pressure spikes for 500 thousand minutes. It can right predict blood pressure spikes in 84% of cases, 15 minutes before the dropping in blood pressure and in 80% of cases, 5 minute before the dropping in blood pressure. The researchers believe that the algorithm can be used during operations to reduce the likelihood of complications [1].

Another advantage of AI is to help doctors before and after treatment. It is also making a mark in the operating room. Surgeons are using robotic arms controlled by AI. It performs delicate surgeries with incredible precision. These robots never get tired, ensuring that every movement is perfect. This means safer surgeries and quicker recovery for patients.

Artificial Intelligence has access to the Internet that helps to find the best way for treatment. It analyzes all medications that are in a database and selects that suits for you. It's like a super-advanced doctor by your side. This makes life much easier but need to consider that it will select medications for the diagnosis which you have established yourself, but a qualified specialist also will consider your previous diagnoses and medications which you used previously [2].

Next, it also helps to save time for unnecessary and routine works for doctors. AI automates all this process and saves money which would be spent on the work of doctors. Some healthcare organizations use Robotic Process Automation (RPA) to improve patient experience and everyday operation of their facilities. RPA is a technology used for automated processing of business tasks.

To all the advantages of AI, there are disadvantages in using and integration it into the life of people and doctors. Although AI is a robotic process, when diagnosing, it will not take into account that the information could be outdated, also it will not be based on the lifestyle of the patient. The patient also cannot identify all the symptoms that he has [3]. Moreover, chat-bots cannot study the patient's condition, detect seizures prematurely, increasing or decreasing in blood pressure.

AI is very vulnerable to hackers' attacks, which become much more sophisticated every year.

It is necessary to use chat-bots with caution and also consult with doctors. Therefore, millions of dollars are spent on the protection and maintenance of Artificial Intelligence every year.

As with many other industries, AI is supposed to change the healthcare landscape over the coming years. In addition to improving health facility operations, patient diagnoses, treatment plan development, and overall health outcomes, it is expected that AI will help with the development and discovery of new medical cures [4].

References

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