International Conference on "Latest Innovations in Science, Engineering and Management"
Indian Federation of United Nations Associations, New Delhi, India ICLISEM - 16
1st October 2016, www.conferenceworld.in ISBN : 978-93-86171-08-5

ARTIFICIAL INTELLIGENCE: ADVANCEMENT IN HEALTHCARE

Crescent Bardeskar[1], Ashvit Shetty[2], Avnish Singh Jat[3]

[1,2]Don Bosco Institute of Technology, Mumbai

[3]Jaypee Institute of Information Technology, Noida-62

ABSTRACT

Our ultimate aim in life is to stay physically fit. Also we do not have enough doctors or treatments The Doctors need to be serviceable all the time sometimes even for the smallest issues. With increasing advancements in technology, we have reached a stage where computers can carry out almost all the human work, but there is nothing that provides the doctors some relief at least from their mundane routine or from working extra. Therefore, we have implemented a solution through artificial intelligence which will provide better facilities to doctors and patients. And the doctors don't need to be physically present.

Keywords—Single Sign Off; Single Login; Privacy; Security; Website Survey;

I. INTRODUCTION

The term artificial intelligence comes from the intelligence that is learnt by the machine but originated from the humans. A machine demonstrates and executes the aspects of human intelligence through computational processes. Computers can learn to do things and once they learn they can do it better than us. It can do things which we don't know ourselves. For example: Team runs automatic drug discovery. Nobody in the team background has an experience in the medical or chemistry field. They use an extra ordinary algorithm called profound learning. More the data & more the computation time, the better it will perform. Computers can even recognize traffic signals which are of great benefit in cars. This comes under the image recognition ability of a computer. If the system is not capable of recognizing images, the system would not understand the difference between a stone and a crumpled paper which can be avoided while driving. The computer needs to understand and name the objects in a picture just like we do.

In near future, with advancements in artificial intelligence, the world would be a smarter place. In fact computers would be smarter than humans. Now we make them learn, tomorrow they will help us learn things better. Computers will understand our language, cars will run smarter, doctors will have an extra pair of tireless eyes to take care of the patients.

II. BACKGROUND

Now the question arises, why not program it?

Programming means putting in front every detail of what you want, every single step. But what if you want the computer to do something innovative? The machine should try and solve problems that are yet not solved.

For eg: A predator is chasing a prey, now the prey's way is blocked. It will find another way to escape. This new way may work or may not. But if it does turn to be successful, the prey will always remember it.

Another system who was watching this will adapt the same behavior. Instead of programming, Algorithms learn how to do something through the data.

In the same way, an AI machine has the capability to interact with the environment and the potential to make decisions without human intervention, also in unpredictable circumstances. It has the ability to think of a new solution instead of the normal behaviour. These machines know how to learn!

For example: google suggesting what you might want. Facebook friend suggestions.There has to be marriage between big data and machine learning algorithm.

III. PROPOSED WORK

We have researched about the techniques to provide the advancement in healthcare by providing automated services through the use of Artificial Intelligence. We have designed the web based application for the proposed work and its home page is shown in Fig1.

Fig.1

In our proposed system we have presented a solution which will help the patients enter their symptoms and the system will tell them which specialists are available in their vicinity that could treat them.

Also for smaller issues like cold, fever, etc. you don't need to go to the doctor unless it's severe, the system will suggest a medicine which they can take for the time being. Or when you upload a picture of the medicine, the system will give you medicines that function the same. This is useful in situations when there are a some medicines that are not available nearby, so this will help in identifying medicines that are available around you and can use those instead.

We believe that every individual has different health conditions. Some have allergies, some have blood pressure problems, some have deficiency of vitamins, etc. In these cases, the system will suggest drugs that will suit your body, that will overcome your deficiencies.

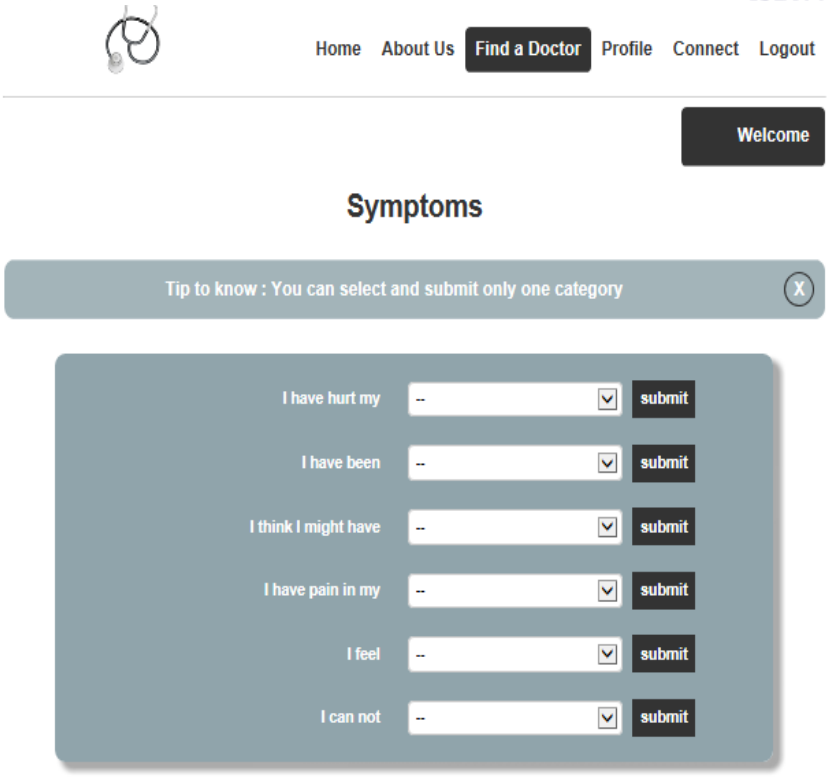

Fig.2

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Consider a person having cancer needs a consultancy, and the expert belongs to another state or country, then only communication will be the barrier. In these cases, the system will overcome the communication barrier by translating the expert's voice into the patient's language and the patient's language into the doctor's language.

These features in a system will provide doctors with great relief but also not compromising on patient's problems.

IV. FUTURE WORK

The features what we proposed service doctors and patients pretty well but upto a limit. Hence, we are working on the system analyzing reports and suggesting the with the treatments that can be done. Another system we are working on is sensing the temperature, sos, blood pressure of the patient and injecting the required fluids into the saline directly, this will be very useful in hospitals.

V. ACKNOWLEDGMENT

This research paper is made possible through the help and support from everyone, including: parents, teachers, family, friends, and in essence, all sentient beings. Especially, please allow us to dedicate our acknowledgment of gratitude towards Mr. Avnish Singh Jat for his support and encouragement.

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