**SECTION A-RESEARCH**

Introduction

In place of direct communication with a live human agent, a chatbot is a software application that conducts an online chat conversation using text or text-to-speech. 1st Chatbot systems, which are designed to convincingly replicate the way a human would act as a conversational partner, often require constant tuning and testing, and many in production are still unable to communicate or pass the test.

What are Chatbots

Chatbot is a computer program designed to stimulate conversation with human users, especially over the internet.

Benefits of Chatbots for Business

**Chatbots can work alongside humans**-The biggest misconception about chatbots is that they’ll take over services and automate everything, leaving businesses with no need of human employees. But, this is mostly a myth as chatbots deal with queries clearly within their capabilities. chatbots are able to determine the need for a human agent and pass on the customer’s query .Saves agents time answering simple questions helping to raise productivity for agents instead of replacing them.

**They work 24/7**-Chatbot are always ‘on’ and can cater to your customers anytime of the day . If they can’t answer user questions, they save customer’s details and their query and reassure them that their question will be passed on unlike leaving the customer frustrated until they can speak to an agent. It can improve efficiency of meetings

Can help field service team members their clients get back online faster

Can enable HR teams to better serve their employees

Types of ChatBots

**Rule based chatbots** – they are structured and they do not have a lot of flexibility and how they respond to question or what the consumer can ask .To ensure that inquiries with the same meaning receive the same answer, language criteria can be constructed that look at the words, their sequence, synonyms, typical ways to ask a question, and more. It is conceivable for a human to fine-tune the conditions if something is not correct in the comprehension.

Chatbots built on a purely language paradigm, on the other hand, can be stiff and slow to create due to this high barrier to entry.

**Artificial Intelligence (AI)/ Natural language processing (NLP) chatbots** – these are much more able to converse with the customer to carry on a semi human discussion within certain limits to understand what is one trying to get to and give you the answer that you want based ideally on human language. Task-oriented chatbots are typically more intelligent, interactive, and tailored than these sorts of chatbots. They become more contextually aware as data accumulates, and they use natural language comprehension and predictive intelligence to customise a user's experience.

Machine-learning-based conversational systems can be spectacular if the challenge at hand is well-matched to their capabilities.

The Future of Chatbots

Conversational AI Chatbots have advanced to the point that humans can easily converse with them.

Conversational artificial intelligence (AI) has entered its Golden Age. Customer-facing AI assistants, support chatbots, skill chatbots, assistant bots, and transactional bots are all examples of conversational bots, or chatbots. There is a lot of corporate interest in this market.

Recommendations & Conclusions

I have come to a conclusion that chatbot will be used often in the future in businesses.