WHAT IS A CHATBOT?
A chatbot is a cloud-based service, many times using Artificial Intelligence, created by a computer platform that people interact with via a chat interface.

You can ask questions using your voice or by typing in the same way you would ask a person. The chatbot will usually respond in a conversational style, and it may carry out actions in response to your conversation (for example, order something for you).

It often runs inside a popular messaging application, such as Facebook Messenger, Slack, or SMS (Short Message Service) (Texting). They are also called a virtual personal assistant.

It answers your question, rather than directing you to a website.

https://www.youtube.com/watch?v=38sL6pADCog
What Are Chatbots?

Chatbots are programs built to automatically engage with received messages.

Chatbots can be programmed to respond the same way each time, to respond differently to messages containing certain keywords and even to use machine learning to adapt their responses to fit the situation.

Chatbots come in all forms. There are some fun and goofy chatbots like Cleverbot, a chatbot that chats with real people and learns as it goes.
Predicted Use Cases for Chatbots

What do you predict you would use a chatbot for?

- Getting a quick answer in an emergency: 37%
- Resolving a complaint or problem: 35%
- Getting detailed answers or explanations: 35%
- Finding a human customer service assistant: 34%
- Making a reservation (e.g. restaurant or hotel): 33%
- Paying a bill: 29%
- Buying a basic item: 27%
- Getting ideas and inspiration for purchases: 22%
- Adding yourself to a mailing list or news service: 22%
- Communicating with multiple brands using one program: 18%
- (none of these things): 14%
- Buying an expensive item: 13%
Siri

Cortana

Alexa

Google Now
This is the second year that Eric Enge - a search engine optimization expert, published the results of his testing. Five devices were tested including Alexa (Amazon), Cortana (Microsoft), Google Assistant (both on Google Home Speaker and a smartphone), and Siri (Apple). Google got two scorings in the report because the software performs differently on home speakers and smartphones.

Enge’s 2018 test consisted of an exhaustive list of 4,942 questions. If that doesn’t seem to qualify as exhaustive, compare that to the standardized SAT’s annually administered to high school students. The kids put in a grueling four-hour Saturday morning answering 154 questions and an essay.

The questions and categories are as follows: General questions (60%), Weather (57%), Stream music (54%), Timers/alarms (41%), and Reminders/to-do (39%)
Google announced their **Duplex** system, a new technology for conducting natural conversations to carry out “real world” tasks over the phone.

**The technology is directed towards completing specific tasks, such as scheduling certain types of appointments.**

For such tasks, the system makes the conversational experience as natural as possible, allowing people to speak normally, like they would to another person, without having to adapt to a machine.

https://www.youtube.com/watch?v=GoXp1leA5Qc
Google has developed a new AI-based text-to-speech system - the Tacotron 2 - that sounds indistinguishable from the voice of a real human, at least that is what Google claims.

The new system does not sound robotic or digitized in any easily noticeable way, and it can even tell the correct pronunciation of words depending on the semantics. It can also deal with some slight typing errors and can do things like tongue-twisters.

So let's play a fun game... below you will find four samples recorded twice. One of the recordings is the Tacotron 2 AI voice and the second one is the professional human narrator. Can you tell which one is which? (We have the answers at the end of this article.)

Which one is real voice?

The human face is a complicated thing—powered by 52 muscles; contoured by the nose, eyebrows, and other features; and capable of an almost infinite range of expressions, from joy to anger to sorrow to puzzlement.

Perhaps that is why realistic animation of the human face has been described as the “holy grail” of computer graphics.

The face below is getting closer to a real face and the next set of slides show that computer generated faces have reached visual reality!

https://www.youtube.com/watch?v=VC5e1KDb24
WHAT WOULD YOU DO IF YOU MET A DIGITAL HUMAN?

As it turns out, digital humans are already among us. All of these digital assistants were developed by the **Soul Machines Co.**:

**Autodesk** users have been interacting with **AVA** since the end of last year, when calling into customer support.

Travelers on **Air New Zealand** have been utilizing the services of **Sophie**, its digital travel concierge for a little more than six months.

Australians with disabilities are now able to work with a digital human named **Nadia**, designed to help users better navigate the **National Disability Insurance Scheme** (NDIS) and find the information they need. Nadia can read users’ emotions by “watching” their faces – not to mention give them the experience of talking to a celebrity, sort of: **Nadia’s voice is provided by Academy Award-winning actress Cate Blanchett.**

Very soon, the **banking customers of NatWest** will meet **Cora**, their new personal banking assistant.
She’s smart, a master of high-end design software. She’s kind, ready to help at any time of day or night.

She’s the new AVA—an acronym for **Automated Virtual Assistant**—a next-generation digital assistant created by Autodesk Inc. to help its customers with its software.

Autodesk hopes AVA’s animated face, New Zealand-accented voice and touch of emotional savvy will engage customers at a deeper level than current conversational software can. “If a customer tells [the virtual-human version of] AVA, ‘I’m having trouble,’ I want her to frown a bit and say, ‘I’m sorry, let me see if I can help,’”
THE PHILOSOPHY AND NEED FOR A PERSONAL NATURE OF CHATBOTS AND AI

LIFELIKE, EMOTIONALLY RESPONSIVE AI

https://www.youtube.com/watch?time_continue=155&v=ie218UPTHiE
Soul Machine’s Sophie is being used as a Customer Service assistant for New Zealand Airways.

https://www.youtube.com/watch?v=qpCI-axNgbs
In a first for education, the Vector Energy company is exploring the use of “digital human” technology in its energy education programs in primary schools.

In conjunction with New Zealand’s leading AI company Soul Machines, Vector has created Will, a “digital teacher” being trialed in its award-winning ‘Be Sustainable with Energy’ schools program, which is offered free of charge to schools within Vector’s Auckland electricity network. The school's program was launched in 2005 and has since educated more than 125,000 children about energy.

https://www.youtube.com/watch?time_continue=33&v=Ab0DCzFz82s
CHATBOT HUMOR !!

My son asked why I speak so softly in the house. I said I was afraid the NSA was listening. He laughed, I laughed, Alexa laughed.
Your phone told your laptop that told Alexa that can tell your wife what websites you've been visiting. Pay one bitcoin to hacked@iot2020.com within 24 hours or Fiona gets told.
Hey, Siri, call 800-SIRISUX.

Hey, Alexa, find the nearest store to return an Echo.

Hey, Siri, translate “Siri’s voice sounds like a Shih Tzu barfing” into any language.

Hey, Alexa, go delete yourself.

Your tech when you’re not around.
AMAZON ECHO FOR SOUTHERNERS!

https://www.youtube.com/watch?v=q3j6708kzEY
CAN'T WE JUST USE ARTIFICIAL INTELLIGENCE TO MANAGE OUR SALES FUNNEL FOR US?

I FOUND FOUR PLACES THAT SELL FUNNEL CAKES FAIRLY CLOSE TO YOU.
WHY IS THE ELECTRIC BILL SO HIGH?

ALEXA, TURN ON THE LIGHTS ... ALEXA, TURN ON THE TV ... ALEXA, PLAY MUSIC ... ALEXA...
Petra, an African grey parrot, instructs her family's Amazon Echo, Alexa, to turn on all the lights in the room. “Alexa, all the lights, all on,” she says and watches the room light up.

https://www.youtube.com/watch?v=vi_MVJy1glk
Cute little girl asking Alexa to play the “Baby Shark” song!!

https://www.youtube.com/watch?v=Pfq59OtwxPk
Thanks for listening to the presentation about Chatbots and have a great day!