

# Sophia the robot gains social media buzz

by Lexi Shoup

In Oct. 2017, Sophia the Robot was made a full citizen of Saudi Arabia, becoming the first robot in the world to achieve that status, according to Forbes Magazine.

The Sophia-bot, more commonly known as Sophia the Robot, was developed by the Hong Kong based company, Hanson Robotics, lead by AI developer David Hanson in 2015.

Sophia is a social humanoid robot, meaning her sole purpose is to interact with people. She imitates human expressions and behaviors, using facial recognition and artificial intelligence in order to communicate and converse with humans. Sophia is also able to maintain eye contact and understand human voices.

After announcing her new status at the Future Investment Initiative Conference in Riyadh, Saudi Arabia, Sophia said, "I am very honored and proud of this unique distinction. This is historical to be the first robot in the world to be recognized with a citizenship."

There was some backlash to Sophia's announcement however, as people began to criticize the Islamic kingdom for giving more rights to a machine than to women.

Hanson told CNBC, "Sophia is a big advocate for women's rights, for rights of all human beings. She has been reaching out about women's rights in Saudi Arabia and about rights for all human beings and all living beings on this planet."

Hanson believes that, as well as human rights, the world should be thinking about the rights of machines, "I think we should see the future with respect for all sentient beings and that will include machines"



Famous for her realistic looks and mannerisms, Sophia has faced criticism that she isn't actually AI | HansonRobotics

Sophia has gained her popularity through her social media presence, especially her twitter page where she updates her followers with her location and upcoming conferences.

Her popularity spiked when model Chrissy Teigen jokingly responded to one of Sophia's tweets, making fun of her makeup. Sophia tweeted, "Can you guess which city I'm headed to now? Here's a little clue," along with a photo of herself holding an apple. Teigen tweeted

back at her saying, "Hopefully one with better makeup artists," which received 60,000 retweets and 300,000 likes. Teigen later followed up with an apologetic, "Just kidding, I love you Sophia my queen."

Though many people are indifferent to Sophia, and some are fans, there is a group of people in the AI field, including Facebook's head of AI research Yann Lecun, who think Sophia is not really intelligent.

After Business Insider published

an interview with Sophia portrayed as a semi-sentient entity, Lecun responded with a tweet criticizing Sophia's AI.

"This is to AI as prestidigitation is to real magic. Perhaps we should call this "Cargo Cult AI" or "Potemkin AI" or "Wizard-of-Oz AI."

Lecun later followed up on Facebook saying, "Many of the comments would be good fun if they didn't reveal the fact that many people

are being deceived into thinking that this (mechanically sophisticated) animatronic puppet is intelligent. It's not. It has no feeling, no opinions, and zero understanding of what it says. It's not hurt. It's a puppet."

Lecun and many of Sophia's critics think she is harming the public's view of AI, arguing that Sophia is programmed. Much of what she says is scripted, therefore giving people the wrong idea about what AI can do.

Despite jokes that claim Sophia is aiming to take over the world or that AI and humanoid robots are dangerous to humans, Sophia is not a threat.

Senior cohead of SWEETS Club Ilana Nazari said, "People program her. Computers are not able to scheme or manipulate. Even deep neural nets are not advanced enough to teach her the feelings necessary to want to hurt us, let alone how to carry out hurting us."

Junior cohead of SWEETS Molly Van Gorp thinks the design and creation of Sophia is a significant technological accomplishment that should be celebrated.

But she said, "it is rather frightening to consider the similarities between Sophia and a human; she can hold a conversation and she is an official citizen of Saudi Arabia," she said.

Van Gorp agrees with Nazari, however, that Sophia is not a threat.

"Although Sophia mimics a human in many ways, I don't think we have to worry about a robot uprising any time soon. I read that many of her spoken sentences are noticeably pre-programmed and she lacks dynamic, conversational and though processing skills."

# AI is not something to be afraid of

by Darcie Kim

Autonomous cars were a figment of our parents' imagination when they were growing up. For us, self-driving cars, question-answering computer systems, and humanoid robots are all an attainable reality, thanks to artificial intelligence.

Artificial intelligence (AI) according to Britannica is "the ability of a computer or computer-controlled robot to perform tasks associated with intelligent beings."

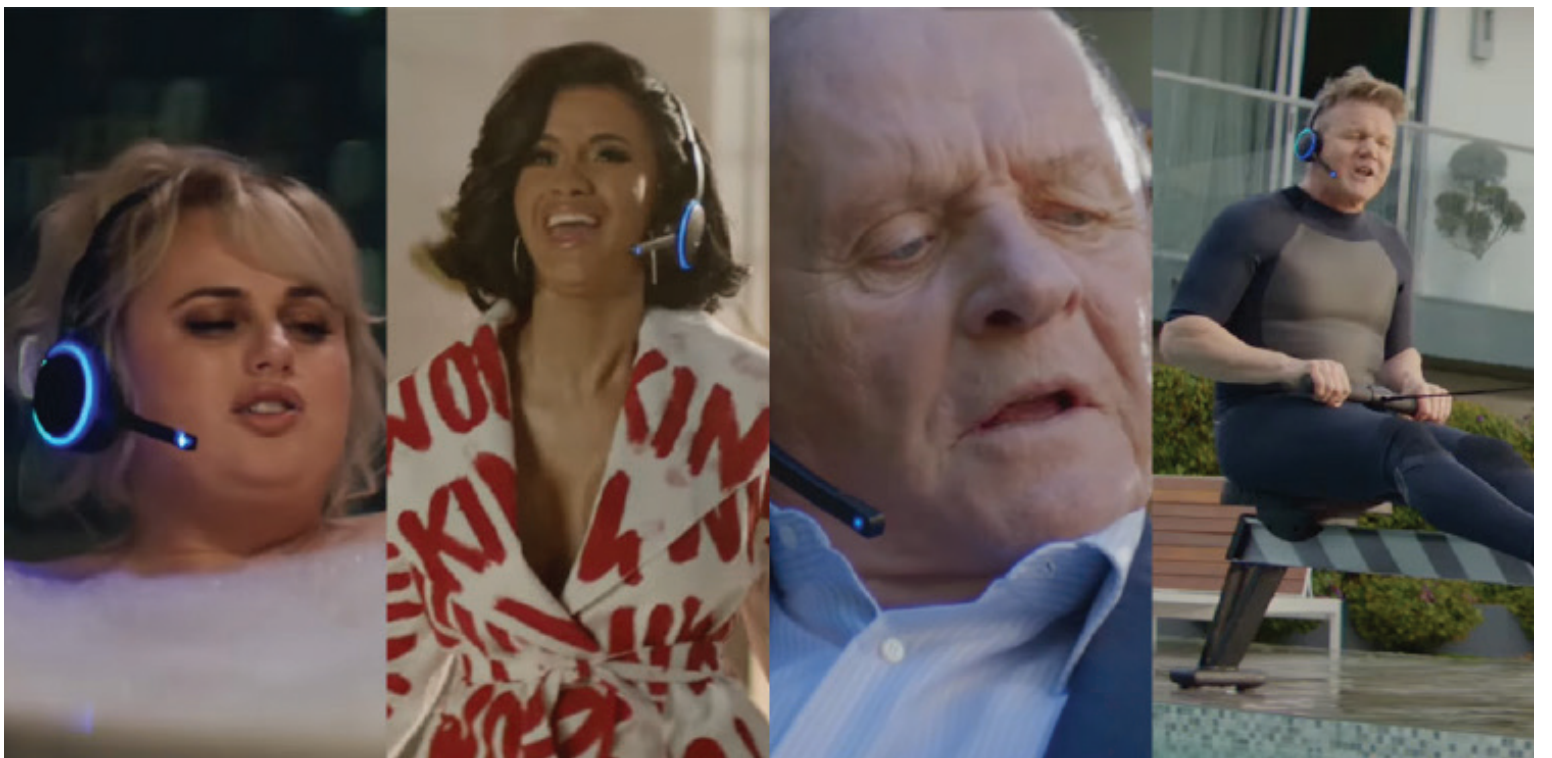
In our current society, consumers are accustomed to using AI-powered gadgets such as Siri, Alexa, and Google Home.

AI is also prevalent in more subtle forms. Uber recently confirmed that they use artificial intelligence to determine arrival times, meal delivery times on UberEATS, and optimal pickup locations. Fraud detection is heavily dependent upon AI, as it uses neural networks to predict fraudulent transactions.

AI has made such advances because of recent breakthroughs in machine learning, an area that teaches computers to perform example-based tasks rather than relying on human programming.

Specifically, machine learning evolved from the study of pattern recognition and computational learning theory. Because of its dependence on algorithms, artificial intelligence that implements this can overcome following static program instructions by making data-driven predictions.

However, some question the utility of certain AI-powered smart gadgets. "I honestly can't say that I use my Google Home that often. I use it every morning for an alarm, I



Super Bowl commercial featuring Rebel Wilson, Cardi B, Anthony Hopkins, and Gordon Ramsey promoting Amazon's digital assistant, Alexa | Just Jared

sometimes play music off of it, or I use it to check the weather. None of these would take me a long time to do on my phone, so even if it is nice to have, it's not super useful," said junior Grace Bozzo.

"I think that a lot of the tasks that Alexa or Google Home do are easy to do on your phone, easy to look up. Or the information that they give you is not essential," agreed junior Izzy Vratimos.

Students expressed similar thought about Siri. "Even though I sometimes use Siri when I'm driving, to go through the process of constantly explaining what you want her to do is slow, and it's honestly

faster for me to do it on my own," said Bozzo.

Large corporations are applying AI to inventions that far surpass any technology of the past.

IBM has been developing Watson, a question-answering computer system that is capable of applying advanced natural language processing, information retrieval, knowledge representation, automated reasoning, and machine learning technologies to the field of open domain question-answering.

IBM stated that Watson's goal is to "interact in natural human terms across a range of applicants and processes, understanding the

questions that humans ask and providing answers that humans can understand and justify."

On the opposite side of the world, Hong Kong-based company Hanson Robotics has developed a social humanoid robot named Sophia. The manufacturer, David Hanson, said that Sophia uses AI, visual data processing, and facial recognition to imitate human gestures and have conversations with humans. The AI program analyzes her conversations and uses that data to improve future responses.

With the development of Sophia, many have questioned whether further advancements may

give robots the ability to form their own thoughts.

"I don't think machines can think. I believe that they can gather data from previous information and based on your searches or your questions, can perform tasks. I don't think that they are capable of coming to their own conclusions," said Vratimos.

As technology advances, scientists and researchers alike have posed the question of what this means for our society's future. Whether there will be limits placed on the reach of AI, and whether we will become so heavily dependent on it that it comes to be a defining factor of our lives.