AI Development Timeline

Edward Feigenbaum and Joshua Lederberg created **the first "expert system"** to replicate the decision-making abilities of human experts.
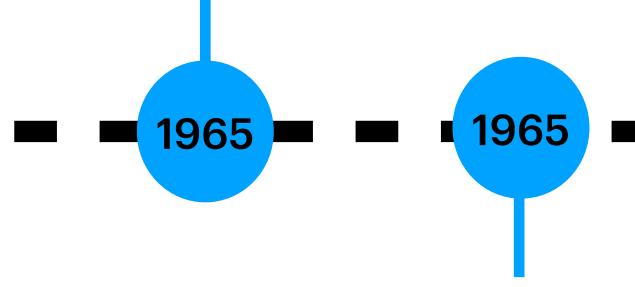
The first AI winter begins as funding and interest decline due to unmet expectations.

The resurgence of AI interest due to expert systems like MYCIN (medical diagnosis) and DENDRAL (chemical analysis).

IBM's Deep Blue defeats world chess champion Garry Kasparov.

1965   **1965**   **1972**   **1974**   **1980**   **1986**   **1997**

Joseph Weizenbaum created the first "chatterbot" (later shortened to chatbot), **ELIZA, a mock psychotherapist,** that used natural language processing (NLP) to converse with humans.
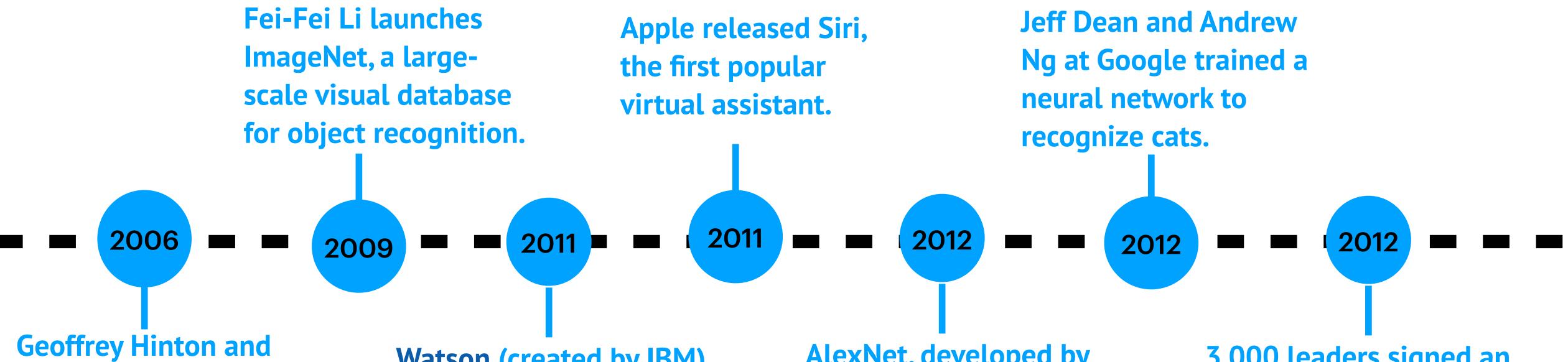
Marvin Minsky and Seymour Papert publish Perceptrons, highlighting limitations in neural networks.

David Rumelhart, Geoffrey Hinton, and Ronald Williams publish the backpropagation algorithm, revitalizing neural networks.

AI Development Timeline

Fei-Fei Li launches ImageNet, a large-scale visual database for object recognition.

Apple released Siri, the first popular virtual assistant.

Jeff Dean and Andrew Ng at Google trained a neural network to recognize cats.

2006 — **2009** — **2011** — **2011** — **2012** — **2012** — **2012**

Geoffrey Hinton and colleagues publish a paper on deep belief networks, sparking renewed interest in neural networks.

Watson (created by IBM) won Jeopardy against two former champions in a televised game.

AlexNet, developed by Alex Krizhevsky, Ilya Sutskever, and Geoffrey Hinton, wins the ImageNet competition.

3,000 leaders signed an open letter to the worlds' government systems banning the use of autonomous weapons in war.