ARTIFICIAL INTELLIGENCE:
You Ain't Seen Nothin' Yet

Artificial intelligence clearly reached buzzword utopia in 2016, but the groundwork was laid back in 2011 by the appearance of IBM Watson on the TV game show "Jeopardy!" The artificial intelligence (AI) computing platform made headlines by easily beating its human competitors.

> By Joe Skorupa

More recently, Google's DeepMind, christened AlphaGo for a tournament of Go (described as exponentially more complex than chess), beat a human genius from Korea in a championship tournament.

Why am I supposed to care? Well, one approach is to make wisecracks about how natural stupidity beats artificial intelligence every time. Another is to start paying attention to what competitors like Macy's, Starbucks, Staples and Amazon are doing with AI in the retail marketplace.

WATSON WORLD HEADQUARTERS

In the fall of 2014 I attended the launch of IBM Watson Group's headquarters in New York's Silicon Alley. It is a 12-story building designed by celebrated architect Fumihiko Maki that contains 120,000 square feet of space used by 750 IBMers who work on Watson projects. At the time it was fueled by a $1 billion corporate investment.

The futuristic headquarters is an incubator for developing a Watson ecosystem, a cloud-based analytic platform that is cutting-edge in three significant ways: 1) It can read 20-million documents in three seconds; 2) it can read and learn natural, unstructured language (which was proven on "Jeopardy!"), and 3) it gets smarter through repeated use by tracking feedback and learning from successes and failures.

It is the combination of all three of these breakthroughs that makes AI the marvel that it is. Without all three elements working in concert together AI would just be advanced computing. But when all three are combined it becomes something the world has never seen before, which has significant implications for retail.

ALEXA, SEND MY GROCERIES

The Amazon Echo and its Alexa virtual assistant is a perfect example of AI in action. It can read millions of documents (not just files) in seconds. It can read, learn and communicate in natural language. And it gets smarter through repeated use. Think of millions of shoppers all over the world uttering these words to Alexa every day:

➤ What is a great Christmas dinner menu and where can I buy all of the ingredients?

➤ Which grocer has the best prepared foods to order for New Year's Eve and also delivers?

➤ Let me read you the items on my gift list. Can you recommend where to buy them?

Alexa is the only game in town right now that can do these things and it is owned by Amazon. As a retailer, doesn't this power to influence shopper behavior send chills down your spine—and not in a fun way?

Leveraging AI as a personal shopping assistant or using it to take over your customer support function (i.e. chatbots) will inevitably spread throughout retail, but they are not the only opportunities to use AI as a commerce enabler.

REAL-WORLD RETAIL AI

Although it is still early in the dawn of the AI age, some recent retail use cases include:

The North Face: The specialty outdoor retailer created an interactive online shopping experience for desktop shoppers using IBM Watson to power an intuitive recommendation engine. North Face customers engage in a question-and-answer session that relies on natural language analysis to receive personalized outerwear recommendations. In a later rollout, North Face expanded this capability to a mobile app.

1-800-FLOWERS: In the second quarter of 2016, the flower and gift e-retailer became the first third-party retailer to leverage the Amazon Alexa voice-activated AI platform. If you can't beat Amazon, why not join it?

Macy's: The nation's largest department store chain began using IBM Watson for two distinct scenarios. In five store locations, shoppers are able to use their Macy's mobile app to interact with a shopping assistant. Two of the locations are in Miami, and the shopping assistant will be available in Spanish. In five different locations shoppers will be able to use the mobile app for interactive self-service within the store.

Staples: For the back-to-school season the office products specialty retailer used AI to analyze photos of shopping lists uploaded to a mobile app, make recommendations to match the list, and then enable shoppers to purchase the items.

Starbucks: Although not rolled out yet, the coffee shop giant has announced plans for the My Starbucks Barista app, which will allow customers to place orders via voice command. It also announced plans to use AI to power a suggested-selling, voice-command recommendation function that will offer item pairings or add-ons.

AI might seem like buzzy hype right now, and I don't suggest anyone quit their day job and jump into the deep end of the AI pool, but to quote the great Al Jolson or (if you prefer) Bachman-Turner Overdrive: "You ain't seen nothin' yet." **RL**

Joe Skorupa is editorial director of RIS News, *a sister publication of* Retail Leader.