

Takeaways from Day Two of Fortune Brainstorm TECH 2017

FORTUNE BRAINSTORM TECH

Fung Global Retail & Technology is attending Fortune Brainstorm TECH 2017 in Aspen, Colorado this week. The event seeks to discuss the myriad of ways that companies are trying to prepare for the future, including products, processes and/or services.

Topics and speakers on day two included major retailers, industrial companies, investors, cybersecurity experts, athletes and toymakers.

Below are our selected takeaways from day two of the event.

- 1) Target is using more than 1,000 stores as flexible fulfilment centers. The company says having a smart network and being close to 85% of the US population gives it enormous flexibility.
- 2) GE is fusing industrial and digital, with advanced manufacturing, digital technology, additive manufacturing (i.e., 3D printing) and 3D technology.
- 3) Amazon is focused on pioneering, rather than crushing competitors. However, some disruption is inevitable in all industries.
- 4) Data is increasingly being analyzed by cable TV networks for programming and decision-making in a crowded field of programming.
- 5) Although traditional toys compete with electronic devices, they can stimulate imagination, creativity and storytelling in children.

About Fortune Brainstorm TECH 2017

Fung Global Retail & Technology is attending Fortune Brainstorm TECH 2017 in Aspen, Colorado this week. The event seeks to discuss the myriad of ways that companies are trying to prepare for the future, including products, processes and/or services. The panelists are comprised of Fortune 500 leaders, emerging entrepreneurs and financiers.

Selected takeaways from day two of the event follow.

1) Target Is Benefiting from its Diversified Model

CEO Brian Cornell outlined Target's remodeling of 600 stores and investments in fulfilment. While the big-box model will continue to evolve over time, Target wants to offer flexibility for its customers. More than 1,000 stores are being used as flexible fulfilment centers, as part of a smart network for shopping and returns. Target is located within 10 miles of 85% of the US population. Having a smart network and being in the consumer's neighborhood gives it enormous flexibility.



Brian Cornell, CEO of Target

Source: Fung Global Retail & Technology

In terms of innovation, Target plans to test and iterate over the next three years. Some innovators had drifted away from Target's core base and had to be reeled back in. Target is embracing technologies such as machine learning in order to do its business better. Over the next three to five years, the company thinks it needs to master experience above all, including from a digital standpoint. Brands remain important to the guest—both own brands and external brands. Fulfilment is important to fulfill both store and customer needs. In addition to experienced employees, Target has brought in external experts to improve the art and science of retail.

Regarding the proposed Amazon-Whole Foods deal, Cornell sees the transaction as a validation of "stores still matter," supported by 90% of US retail deriving from physical stores. Moreover, Target's uniqueness derives from its diversity, enabling it to participate and lean into new trends and back out of declining trends.

2) General Electric Is Creating “Brilliant Factories” that Marry Industrial and Digital Technologies

Although GE’s new CEO has not yet started, the company has transformed itself, moving to digital, among other initiatives. Although GE is not usually considered a digital company, the perception is changing, as it fuses industrial and digital. The value of the industrial domain knowledge is likely underestimated and irreplaceable—i.e., it cannot be picked up easily by digital experts. Thus, it is easier for industrial experts to add digital expertise. As GE began to focus on the industrial Internet, the company also focused on changing the company. A “brilliant factory” uses advanced manufacturing, digital technology, additive manufacturing (i.e., 3D printing) and 3D technology. For example, GE collects data on locomotive engines to understand what condition they are in before they are brought into the factory—called conditional manufacturing—which reduces the maintenance cycle time.



Jamie Miller, CEO of GE Transportation

Source: Fung Global Retail & Technology

Management’s focus is on tech areas such as virtual reality (VR), artificial intelligence (AI) and machine learning, and GE focuses on these as well. GE put computing power onto the locomotive itself, which collects data on the train, track and payload, and constantly tunes the engine, reducing fuel consumption by 10%. The businesses of GE Transportation break down into locomotives, mining and marine power.

3) Amazon Creates “Separable, Single-threaded Teams” to Take on New Business Areas

Regarding the question, “How does Amazon tackle everything at once?” Jeff Wilke, CEO, Worldwide Consumer, Amazon, answered that Amazon has “separable, single-threaded teams,” which are single-focus teams that organizationally have their own application program interfaces (APIs) and software, and do not work on anything else. Amazon’s culture has 14 leadership principles. (To read them, please click [here](#).)

“Auditing and inspection” is an Amazon term for the leader peering into the organization and asking if things are running as envisioned. Amazon “tried not to think about the quarter,” and prefers to think over the long term, say five to seven years. Amazon does have an annual plan, which is divided into quarters, which are to be used as guideposts.

Although the Amazon-Whole Foods merger came together quite quickly, there is still much to think about. Wilke is a “huge fan” of Whole Foods, which was given as a reason for the proposed acquisition. Giving no specifics, Wilke believes that many Amazon Prime Members are Whole Foods customers, and vice versa.

For Amazon, “invention” means inventing for the customer. “Invent and simplify” is a management principle, which may involve being misunderstood for some time, and Amazon is open to experimentation and failure. Amazon’s “Treasure Truck” features unusual locally-offered items for sale, being tested in just a couple of markets.



Jeff Wilke, CEO of Worldwide Consumer, Amazon
Source: Fung Global Retail & Technology

Another question asked was, “does Amazon want to crush every retail business out there?” Wilke’s answer was that Amazon is focused on pioneering, rather than crushing, although disruption is inevitable. In answer to “could Amazon become so big that it could face antitrust problems?” Wilke claimed that Amazon has a 1% share of global retail, yet believes that all substantial entities deserve scrutiny.

4) Fixing Gender Inequality in Silicon Valley Should Start at the Top

Speakers referred to a survey by SurveyMonkey. The root of the problem is to understand that something needs to be addressed. The typical excuse by tech companies is that they want to hire the best people, which reflects an unconscious bias, and one male speaker argued that fixing gender inequality needs to be instituted from the top in order to break the chain.

College graduates are balanced 50:50 between males and females, which is also the case for math and science graduates. Another speaker argued that unconscious biases should not be addressed, while another argued that the problem is teaching men to listen, rather than teaching women to present more assertively. Moreover, women’s management styles are more inclusive, which is at odds with typical male management styles.

One audience member stressed that people need constant training, since after one session, they tend to believe that they are “cured.” Another audience member mentioned parallels in achieving ethnic diversity, and argued that to ensure diversity, corporate boards have to be diverse and compensation has to reflect diversity goals as well. In other words, diversity starts at the top of the organization.

5) Despite Amazon’s Success, Shifting Consumer Preferences Create Many New Business Opportunities in Retail

Have investors predicting “dead unicorns” been wrong or just early? The correction has been slow to come because companies have raised a large amount of capital, which has enabled them to pivot many times. In contrast to 2000, when companies were public,

changes are happening in the private market, which hinders the return of capital to shareholders. One investor commented that valuations have been elevated for some time—since 2013—and recessions usually bring valuations down. There is more capital available than ever, not just from mutual funds and sovereign funds, but also from private equity, including family offices and other sources. The combination of many companies being started and consolidation among large companies makes it difficult for startups to exit.

Regarding foreign investing, investment firms that either do not have a China presence or do not pay attention to China will face difficulties, and there are many large companies in China with no equivalent in the US. Investors and companies can learn from the mistakes these companies have made.

Despite Amazon's success, consumer preferences are shifting across the board toward new value propositions, which offers many new business opportunities. Uber's recent management difficulties were not seen as an argument for supervoting shares for deserving company founders, and investors have not changed their views on these types of shares. Whereas many other tech giants bought their way into dominance (i.e., through acquisitions), Amazon has a vibrant culture that has enabled it to achieve its success organically.

6) Both Governments and Enterprises Have Responsibility for Maintaining Cybersecurity

General Keith Alexander, CEO and President of IronNet Cybersecurity (and former Director of the National Security Agency [NSA]), commented that the theft of intellectual property will impact our future, and that cybercrime is putting our use of the Internet at risk. There will always be bad guys, so we have to do a better job of defending. Alexander said that in a meeting, President Trump asked all the right questions about cybersecurity, which bodes well for enterprises and individuals in the US.

Oren Falkowitz, Cofounder and CEO of Area 1 Security—also an NSA alumnus—believes that cybersecurity is more of a private-sector issue. “Bug bounty programs” offer cash for the good guys who are finding weaknesses in the network before the bad guys can find them. “Hack the Pentagon” was a government-sponsored bug bounty program.

A question was asked as to how the government handles weaknesses it finds that can be used for national security, versus those kept secret. Alexander commented that government agencies disclose 90% of the vulnerabilities found, which is not publicly understood. Vulnerabilities exist because humans create software—they are discovered, not created. Over 95% of cyberattacks arise as a result of phishing.

7) Data Is Increasingly Being Used by Cable TV Networks for Programming and Decision-Making

The panelists (from AMC/Sundance and Hulu) were asked about what it takes to create good content today, and commented that there is a great deal of content being produced, and that shows have to break through the clutter and support it with marketing. For example, the Emmy Awards receive attention, and *The Handmaid's Tale* received several Emmy nominations.



Mike Hopkins, CEO of Hulu
Source: Fung Global Retail & Technology

AMC calls itself “premium content on basic cable,” with shows such as *Breaking Bad* and the *Walking Dead*, a transition from being just a movie channel. AMC made further efforts to get to know its fan base better with customer relationship management (CRM) systems and other technology.

Broadcasters have benefited from data by knowing exactly what viewers are watching and finding the correlation to watching other shows, and this knowledge improves over time for use in programming decisions. For example, the producers of *The Walking Dead* used analytics to determine whether to purchase advertising during the *Super Bowl*. AMC was the first linear cable network to launch an ad-free option, which has received a “terrific” response. In a crowded offering with several streaming services, Hulu recently brought pay cable channels into its offering.

8) Electrical Stimulation of the Human Brain Can Help Patients and Improve Athletes’ Performances



Daniel Chao, CEO of Halo Neuroscience

Source: Fung Global Retail & Technology

The Halo Sport system looks like a pair of ordinary headphones, but contains electrodes (called primers) that insert an electric field into the neurocortex to instill a sense of hyperplasticity or hyperlearning, and can be used to improve physical or athletic performance. It turns out that a headphone band covers the motor cortex. Daniel Chao, CEO of Halo Neuroscience, wondered whether doctors could use electricity rather than drugs to stimulate the human brain, and the data is very clear comparing motion and stimulation of the motor cortex, which led to this product. Before creating the product, the company undertook a year’s worth of science research—testing 1,000 people—with the subjects and a test group for scientific validity. Although there was a “placebo effect” among the test subjects, those with the actual headset performed even better. The headset can be used to re-pattern memory, and the largest customer is the US military. The “halo effect” lasts for one hour after wearing. The company has analyzed the data and found no negative side effects. Two lucky audience members will receive a free Halo Sport headset.

9) Professional Wrestling Creates Real Interactions on Video and Social Media Platforms

World Wrestling Entertainment (WWE) has more than 800 million social media followers across all platforms and is the number one sports channel on YouTube. Its network has more than 2 million subscribers. WWE has put together a content ecosystem: regular TV, digital and social, and the WWE network to super-serve the fan base (pay-per-view specials and 7,000 hours of video on demand content), and these platforms all work together.

Professional wrestling is not real, but it is “like a sport” and also delivers entertainment. The platform builds up a story for which the viewer has to go to WWE’s network in order to finish the story. The group holds more than 500 live events around the world every year, enabling the fans to engage with the stars. WWE has created a community through social media. WWE NXT is a professional wrestling television program that is broadcast on the WWE Network; fans can interact through social media to create wrestling superstars. WWE has given the same opportunities to its female athletes, and the fans have responded. WWE’s biggest station is WrestleMania.

10) Toys Stimulate Imagination, Creativity and Storytelling in Children

The moderator commented that the speaker, Margo Georgiadis, CEO of Mattel (formerly of Google), had stepped into the CEO role and immediately there was an earnings issue, whereas people were expecting change. Georgiadis was asked how toy makers get kids excited about physical toys when they are accustomed to electronic devices? She referred to these individuals as Generation Alpha Millennials. She outlined a link between play and imagination and creation, which is very similar to the design-thinking process. The company remains focused on how to create the next generation of innovating thinkers and leaders.



Margo Georgiadis, CEO of Mattel

Source: Fung Global Retail & Technology

Despite the advent of electronic devices, the amount of time children spend playing with toys remains constant. Generation Alpha expects toys to be immersive, on demand and interactive. Still, many educational toys have not been fun and have therefore failed. Mattel’s toys are built to stimulate storytelling. For example, Barbie enables stories about the limitless potential of girls, e.g., with a virtually unlimited selection of careers; President Barbie was a bestseller. Regarding being relevant in different cultures, the company went international early and empowered local leaders to localize Mattel toys. One topic discussed was how to use Mattel’s toys platform to interest children in relevant skills like coding.



FLASH REPORT

11) The Player's Tribune Enables Players to Connect with Fans in a Trusted Environment

The Player's Tribune is a new media platform founded by Derek Jeter that offers the first-person views of athletes. It creates a platform in which players can connect with their fans without their words being twisted, i.e., in a trusted environment. For example, athletes can tell their inspiring stories about how they overcame a challenging environment, which would not normally receive encouragement by traditional media. In addition, players can get pigeonholed as entertainers, not as social contributors or businesspeople, and this platform can take athletes outside their uniform and present them as individuals. The platform's success stories are not with its most popular names. The company just finished a series C funding round and is focusing on brand partnerships to amplify the brands through authentic partnerships, connecting to athletes without a traditional partnership. The platform does not seek to use traditional advertising and is considering other revenue models and how to scale the business, e.g., through merchandising or e-commerce.



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