Catch the Next Emerging Technologies to Go Viral

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ChatGPT hit adoption of 100 million users in only two months, and future technologies may be just as disruptive. This increasingly rapid adoption time demands executive leaders track emerging technology trend signals, or virality, that could disrupt their enterprises and industries.

Strategic Planning Assumption

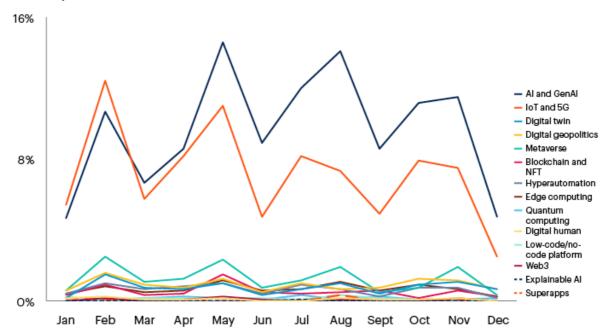
By 2025, at least one emerging technology exhibiting a weak signal will disrupt existing business models.

Data Snapshot

Figure 1: Percentage of S&P Global 1200 Company CEOs Discussing Emerging Technologies in Event Transcripts

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January to December 2023



Source: Gartner analysis of S&P Global 1200 company CEOs discussing emerging technologies in event transcripts IoT = Internet of Things; NFT = non-fungible token 802264 C

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Data Insights

Two Ways to Spot Emerging Technology Trends

Gartner tracked the emerging technologies that CEOs of S&P Global 1200 companies were discussing in their event transcripts every month throughout 2023. The top trending themes have been Al and generative Al (GenAl), followed by the Internet of Things (IoT) and 5G (see Figure 1), showing these emerging technologies are top of mind for CEOs and executive leaders. Meanwhile, metaverse, digital geopolitics and digital twins were in distant third through fifth places among the emerging technologies being discussed by CEOs.

Separately, Gartner tracked all topics and corresponding sentiments in ClOs' social media conversations. Blockchain and tokenization are developing as the two emerging technology themes that could be trending, even though GenAl continues to dominate their social media conversations into 2024.

There will be more to come on those emerging technologies in subsequent reports in this series. The most recent data points provide strong signals of trending emerging technologies. However, these could also be used as an early warning system to detect disruptive technologies way ahead of time, such as ChatGPT in November 2022, which had a weak signal back in July 2020.

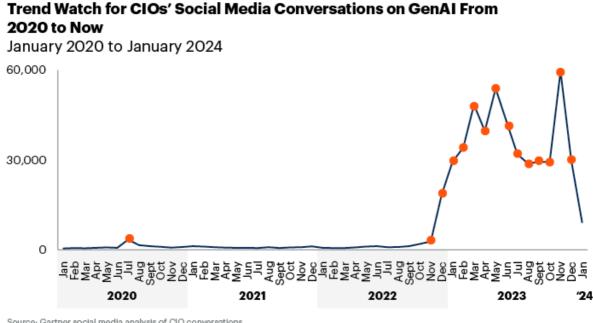
What You Need to Do

Listen for the Weak Signals to Sense Potentially Disruptive Technologies Ahead of Time

Executive leaders should watch top trending emerging technology themes CIOs discuss in social media and priorities of S&P Global 1200 company CEOs, as these could identify the next technologies to implement. They may provide early signals of emerging technologies that could disrupt industries, or go viral.

Gartner went back four years to the beginning of 2020 to obtain social media conversations surrounding GenAl, and captured an initial "weak signal" for GenAl in the third quarter of 2020 that peaked in July 2020. This occurred two years before the "hype" around ChatGPT started in November 2022, which then initially peaked in March 2023 and continued throughout 2023 (see Figure 2).

Figure 2: Trend Watch for CIOs' Social Media Conversations on GenAl From 2020 to Now



Source: Gartner social media analysis of CIO conversations 802264 C

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Figure 2 represents ClOs' social media conversations every month over the past four years, dating back to the beginning of 2020. A weak signal on the "generativeness of Al" was recorded in July 2020 when GPT-3 was released, way before the next signal in November 2022. The second signal remained strong throughout 2023, with a new peak in November 2023, largely fueled by the changes in OpenAl's leadership that brought attention to the potential risks and opportunities in Al technology.

Social media analytics alone aren't a barometer for emerging technology trends, and combining them with S&P Global 1200 company CEOs' priorities found in publications would not make them sufficient, either. Tracking real adoption among early "bleeding edge" adopters through other peer exchange channels (such as Stack Overflow) is important, too. However, these weak signals will provide early warning indications as to which emerging technologies could go viral.

Near-Term Actions

Track the emerging technology trends based on S&P Global 1200 company CEOs' event transcripts and ClOs' aggregate social media views on an ongoing monthly basis to sense some early signals for potentially disruptive technologies.

Longer-Term Actions

Recognize that many of your potential trending emerging technologies that may go viral next could become false positives. Reevaluate these emerging technologies every year or so to optimize time spent tracking technologies. Drop the technologies if three years go by with no pending signs of virality.

What You Need to Know

Gartner will update these emerging technologies' trend signals every month in subsequent reports in this series. These will pick up both weak and recently trending signals, or virality, of upcoming emerging technologies that executive leaders and CIOs should be potentially watching out for.

Look for insights on:

- Which emerging technologies that CEOs of S&P Global 1200 companies are showing interest in
- Which emerging technologies are popular in social media among CIOs, along with sentiments and geographies of the recent discussions

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