

Grassroots Research®

Market Monitor

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Artificial intelligence (AI) in Energy–US

Companies in the energy sector are increasingly leveraging AI in various ways, according to sources. To better understand the extent and methods of AI usage in their business, Grassroots commissioned interviews with both companies and industry experts in the energy sector. Of those interviewed, 57% indicated a significant increase in the number of AI projects initiated in 2024, and this trend is expected to continue this year, with 71% anticipating further growth, sources reported.

One source stated, “We have been closely monitoring AI technology and generative AI advancements. Large multinationals, with their substantial resources, are leading the way by beta testing and implementing numerous AI and generative AI projects. As technology becomes more commercialized and affordable, the benefits for all oil & gas producers will be transformative, offering cost reductions from operational efficiencies to reserve discoveries. Any energy company that does not embrace these advances will be left behind.”

All sources agree AI is transformative for energy companies across multiple business practices, with predictive maintenance, production/new discovery optimization, and improved safety mentioned most often. Among those who commented, most sources said the impact from the utilization of AI is quantifiable, with the top example being predictive maintenance.

One source commented, “We and the industry have countless examples of use cases with ROI in the classical AI space. Things like millions of dollars in savings from reduced downtime by extending equipment maintenance intervals and predicting failure are well known and cited for multiple energy companies over the years. Beyond monetary value, there are safety savings by these same solutions with concrete examples of predicting failures in electrical equipment that later resulted in a small explosion and fire.”

Among the sources who commented, all use generative AI for business



purposes and said Generative AI is used in a variety of ways for work purposes ranging from predictive maintenance, mentioned the most, to sustainable operations. One source commented, “For oil and gas operators there is tremendous potential in unexplored field exploration. The potential for Gen AI to analyze significant amounts more data for better modeling and probability models will be game changing. There are so many possibilities of cost savings also with well completion to optimizing completion techniques from how much to frack, to volumes and kinds of fluids and what kinds of sand.”

Apple smartphone intelligence—Global

Grassroots® was commissioned to survey global smartphone owners in the US, China, Japan, Germany, UK, Italy, and France to gauge the impact of new features, including Apple Intelligence, on consumer iPhone demand regarding upgrades and purchase intentions.

When considering a new smartphone, 65% of sources said price is the most important factor, followed by operating system (58%) and hardware features (53%). In the past three months, 33% of sources have considered purchasing a new smartphone sooner than originally planned. Of those, 32% of sources cited having more money, while 31% each mentioned the announcement of a new iPhone model with desired features and unexpected damage or malfunction to their current smartphone. 48% of sources are familiar with the recently announced

Apple Intelligence features. Among those familiar with Apple Intelligence features, 42% of sources said their plans to change their smartphone upgrade plan were influenced by it. The main reasons for changing plans were increased efficiency in work (56%), seamless access to ChatGPT (53%), and the appeal of the features (47%).

Of those familiar with Apple Intelligence features and planning to change their upgrade plans, 76% of sources would break their carrier contract or pay more to upgrade to newer iPhones, while 14% would not. 50% of sources are familiar with the ChatGPT large language model (LLMs), while 26% mentioned Apple Intelligence, and 35% Google Gemini. Among those familiar with LLMs, 38% of sources prefer ChatGPT, while 23% each prefer Apple Intelligence and Google Gemini.

Disney booking trends—US

Grassroots conducted interviews with travel agents specializing in Disney vacations and cruises to assess Spring 2025 booking trends for Disney resorts in Orlando and California. 50% of sources report strong overall travel demand, 26% describe it as moderate, and 23% note a softening trend. One source mentioned, “I would characterize travel demand as moderate and flat, which is good. The boom we saw after COVID-19 is finished, but we are not seeing a big decline, which is why flat demand, and sales are totally okay. Our business remains very heavy Disney.”

Additionally, 60% of sources indicate that cruises are driving bookings, followed by Europe (37%), Disney (23%), and all-inclusive vacations in the Caribbean (20%). For Disney World Spring 2025 bookings compared to the same period last year, 60% of sources report flat trends, 23%

see a decline due to cost, booking complexities, and Disney’s political stance, while 17% observe an increase. Moreover, 73% of sources state that bookings are in line with expectations, 18% find them below expectations, and 9% see them above. Interestingly, 87% of sources have not noticed a shift towards non-Disney theme parks like Universal Studios to save costs, as Universal is not necessarily cheaper and decisions are driven by park offerings and the age of children.

Regarding Disney cruises, 68% of sources report strong consumer interest. The choice between new and legacy Disney ships is influenced by factors such as cost, itinerary, and departure port, with 86% of sources noting these considerations. One source said, “Cost-conscious customers and life-long cruisers book legacy ships since they know there is no such thing as a bad Disney ship, whereas often first-time cruisers prefer new ships.”

Cybersecurity spending—US



Grassroots was commissioned to interview cybersecurity value added resellers, (VAR) and distributors to gauge cybersecurity spending trends and preferred vendors in the cybersecurity space. 65% of sources indicated that IT budgets remained flat for the second half of 2024 compared to the first half, while 20% reported an increase and 15% noted a decrease. Looking ahead in 2025, 82% of sources who commented expect IT budgets to rise compared to 2024, while 18% anticipate they will remain flat. One source mentioned, “I have a feeling 2025 IT budgets will spike for some companies. The election will be over, so companies will know which regime’s legislation they will be operating under; that should alleviate some of the uncertainty about the economy. Companies will get back to spending money again”.

In terms of IT security spending over the next 12 months, 90% of sources expect their average client’s security spending to increase, with an average rise of 11%, while 10% expect spending to remain flat. One source commented, “The overall trend is up, and I expect more spending in the next 12 months. Certain businesses where cybersecurity has not been a priority, are recognizing they need to do more, with all the breaches. It is becoming easier to sell security products, as customers realize they need it. Some need

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to enhance their security for cyber insurance compliance, but overall, with the world we are living in, cybersecurity is becoming a higher priority”.

Sources reported that the top security priority is endpoint security, followed by security awareness training, managed detection and response (MDR), identity management, and vulnerability testing. One source said, “Our biggest push with clients is MXDR (managed extended detection and response) systems, to cover local computers, servers, and cloud infrastructure. All of these need to be protected. We are also pushing Galactic Advisor’s penetration and vulnerability test. A third-party penetration test will check and see what is going on the network and alert you of any vulnerabilities”. Additionally, 83% of sources who commented said security priorities remained the same compared to a year ago, while 11% noted more emphasis on endpoint and access management.

One source commented, “A lot of companies are looking at, and eager to hear our recommendations on, the need to secure endpoints. With a work-from-home, remote work-force this is more of a moving target. Corporate data is on the laptop, out of the office. Protecting the endpoint and establishing zero trust has taken a high priority in these conversations”. Sources frequently cited Microsoft as the most innovative security vendor over the past six months, followed by SentinelOne, ThreatLocker, and Fortinet. The impact of artificial intelligence (AI) on demand has been a topic of conversation, with 67% of sources who commented indicating that interest in AI has been part of the discussion regarding security spending but has not yet impacted purchases.

Data center liquid cooling technology—China

To gauge demand trends for liquid cooling technology in China, Grassroots commissioned interviews with data center developers and operators. Sources said the expectations are for strong growth in data center Mega Watt (MW) deployment, driven by demand from AI, communication, and IT infrastructure industries, as well as government incentives and equipment upgrade cycles. One source noted, “Even during a slow economy, data center MW deployment continues its high-speed growth. This is due to high demand from AI and communications industries, along with strong support from the government.”

Sources cited quality and reliability as the most important criteria in deciding a vendor for liquid cooling because it is critical to ensure consistent and reliable performance of the cooling equipment.

One said, “Performance of the cooling equipment is critical to data center operation. The most important criteria in deciding a vendor for liquid cooling are quality and reliability.”

Sources said the liquid cooling market has high entry barriers. They prefer large brands for quality and service. One source said, “Liquid cooling vendors need to provide precise, reliable, and long-lasting services. That is why we usually choose large and established brands.” As far as the possibility of retrofitting existing data centers with new equipment, 73% of sources said they are not sure. It depends on the condition of the existing data centers – some data centers are too old or too expensive to be retrofitted, but some large and relatively new data centers can use liquid cooling.

Facebook/Meta advertising—US

To gauge the use and satisfaction with advertising on Facebook properties (Facebook, Instagram, Reels, WhatsApp), Grassroots commissioned interviews with advertising executives in the US. Among the sources who commented, 36% said the return on investment (ROI) from advertising on Facebook properties has been higher relative to the ROI of other advertising channels because of superior targeting tools.

One source noted, “Facebook properties clicks are less expensive and there is less competition for eyes compared to Google because of great targeting tools. Facebook’s got all the user data, so the targeting is super specific. You can really zero-in on the right people and add to that the cross-platform reach of Facebook, Instagram, Messenger, and you get a lot of touchpoints that really

work together to drive up ROI compared to other channels.” With regards to Facebook properties AI tools, 55% have positive views with sources highlighting the cost effectiveness of its tools. One source said, “Facebook’s AI tools, like Advantage+ and Dynamic Ads, are doing most of the heavy lifting. They automate targeting and ad creatives, so you are always showing the right thing to the right people. Tools like Lookalike Audiences also help you reach high-quality prospects, which makes campaigns perform better without you needing to tweak everything constantly.”

100% of sources expect spending on video advertising on Facebook properties and other social media platforms to increase over the next 6 months because engagement is superior. One said, “Video advertising is exploding. We still offer regular standalone images, but video outperforms image content three

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About Grassroots Research®

The Grassroots Research® division combines a variety of resources and methodologies, including in-house employees; a global network of independent, experienced journalists and consumer researchers; more than 50,000 industry contacts; and online panel surveys. We use this network to apply innovative market research and investigative journalism techniques to identify stock and sector trends before our competitors do.

Advantages:

- Continuous exchange of information between Grassroots® analysts and our investment professionals
- Expertise of independent journalists and consumer surveys to reach sources on the ground
- Technological tools to target consumer and business panels online
- Timely business insights via quick turnaround times
- 30+ years of experience conducting customized investigative market research around the world

Resources:

- Access to thousands of consumers in more than 60 countries via targeted online consumer and business panels
- On-the-ground investigators who conduct quantitative market research among consumers
- 55+ reporters who conduct interviews with industry experts
- In-house team based in the US
- 50,000+ industry contacts worldwide from a wide range of industries, including consumer, technology, healthcare, materials, industrials, energy and financials companies

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