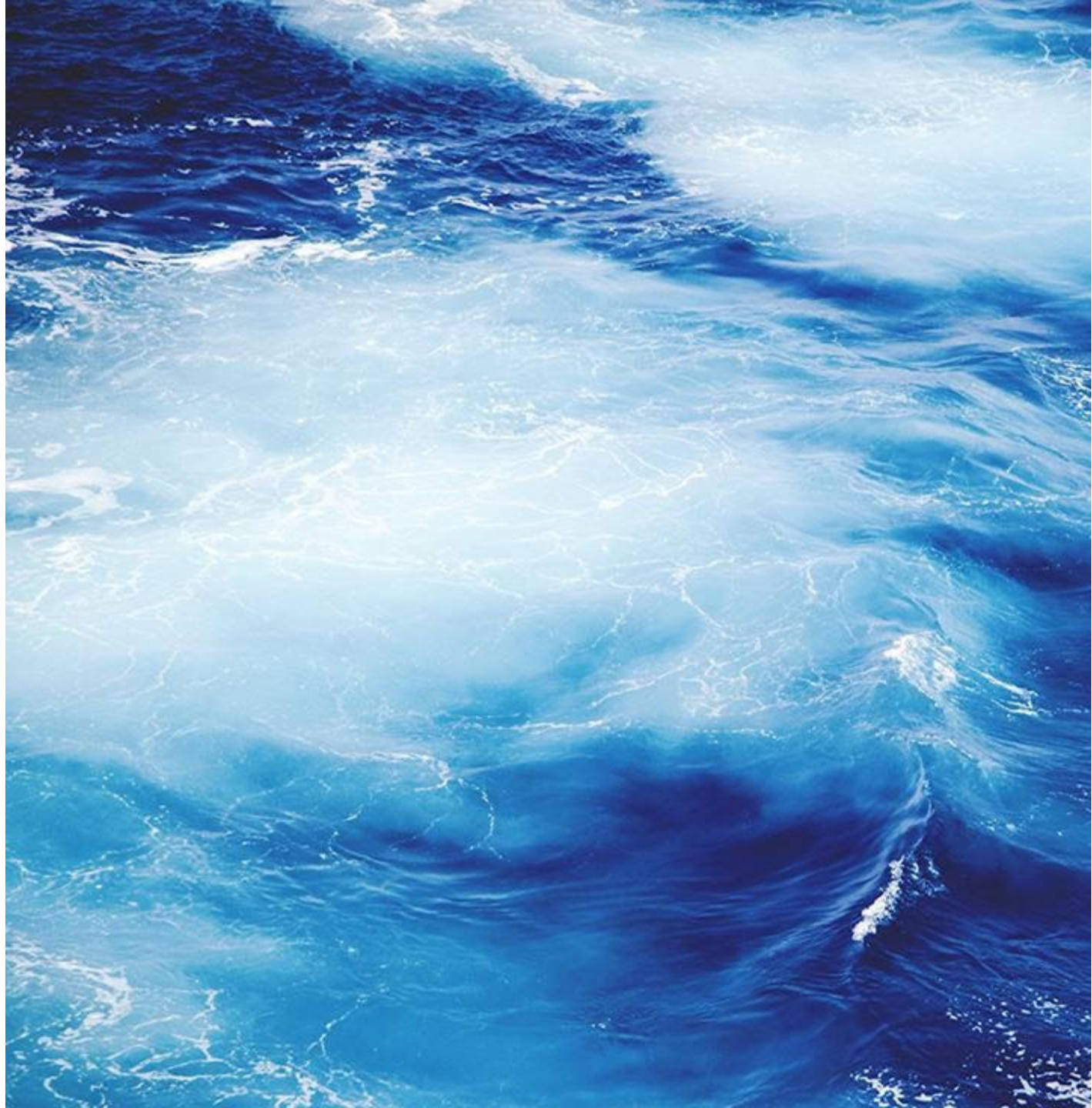




September 2023

# State of Enterprise Tech Spending



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# Tech Buyers Remain Cautious Amid Glimmers of Growth

- 1 79% of enterprise buyers expect to deploy generative AI/LLMs in the next 12 months.
- 2 Contract approval time was flat, suggesting a near-term state of equilibrium with finance orgs.
- 3 93% of respondents expect to move beyond gen AI/LLM experimentation within two years.
- 4 Gen AI emerges as a buyer priority among historically strong categories such as automation and data ops.
- 5 Optimization of SaaS spend as a lever for budget reduction has fallen significantly.
- 6 Hiring, a long-term bullish signal, ticked up relative to six months ago.
- 7 Pure bottoms-up adoption continues to face strong headwinds for production deployments.

# Enterprise Tech Spend Sentiment Index

The latest Index changes may suggest that declining buyer sentiment is beginning to level out relative to last quarter. The survey results suggest signs of growth in AI/ML, and the outlook for tech spending overall looks promising.

It's worth noting that this sentiment isn't just reflective of current budgets, as it also reflects how enterprises predict and plan for their futures. The Index's modest uptick indicates that enterprises are feeling less uncertain about the path ahead than they were in Q1 2023.

**55.4**  
Q3 2022



**50.2**  
Q1 2023

**51.2**  
Q3 2023

# What's Driving Sentiment Index

Our index increased by 0.98 points between Q1 and Q2 2023 due to several factors including:

- **More companies are compressing budgets**, but not drastically. There was a minor 2-pp increase in companies reducing budget spend by 10% or more.
- **Persistent conservatism in technology strategy**, given ongoing economic unpredictability.
- **Slow-to-flat approval times for companies**, as enterprises become more diligent in adopting new technologies, particularly those that create dramatic organizational change.
- A **strong 1-year and 5-year outlook on budgets** for AI/ML drove the Index's modest uptick. 59% of respondents seek to increase AI/ML budget in next six months versus 35% in Q1 2023.

	Q1 2023		Q3 2023
Overall trend on technology budgets	55.75		55.50
Approval times for enterprise contracts	36.00		36.00
How do the economic conditions change your technology strategy?	23.50		25.00
4 key category budget trajectory – Data, Security, AI/ML, Dev (6 Month, 1 Year, 5 Year)	70.33		74.33



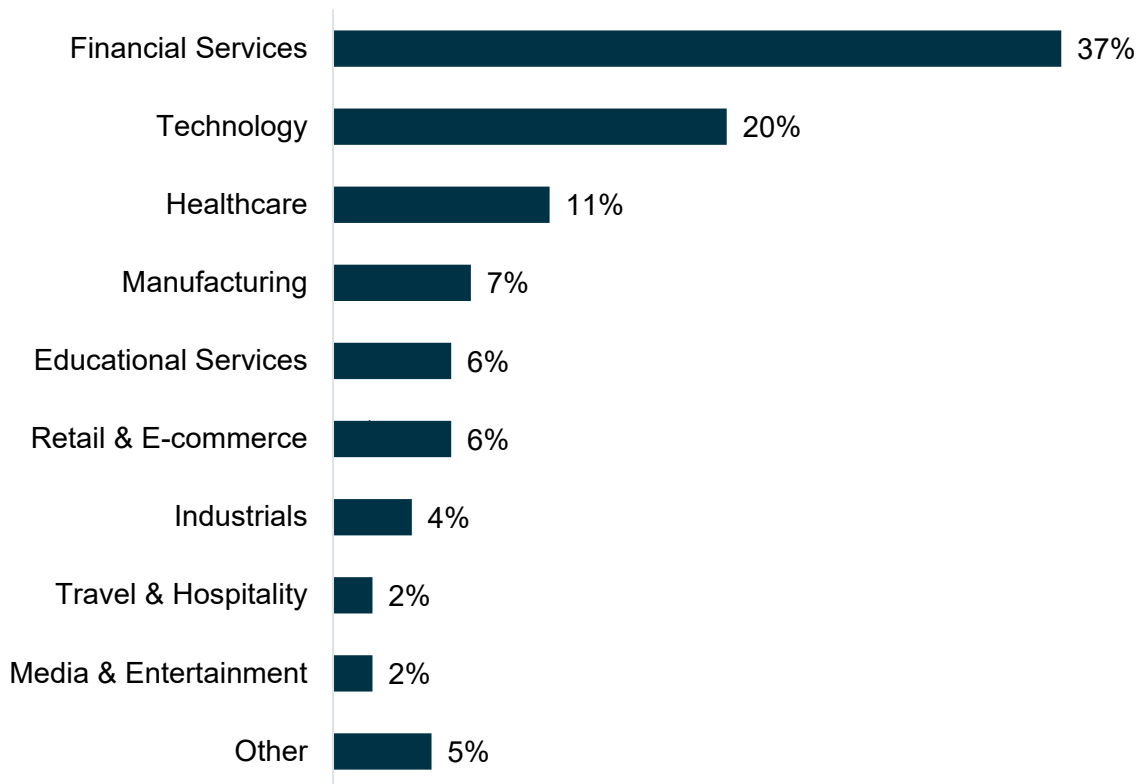


# Demographics and Macro Trends

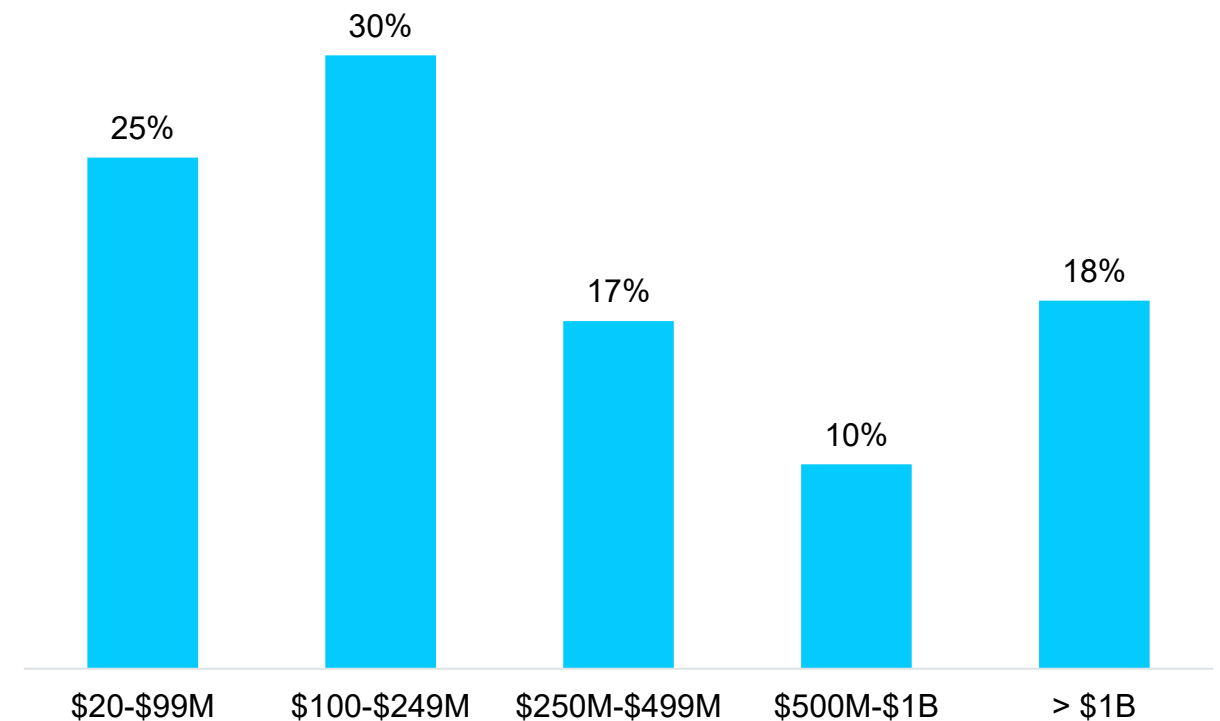
# Survey Composition

- Battery's Cloud Software Spending Survey saw participation from **100 CXOs representing ~\$35B in annual technology spend.**
- **75% of respondents spend \$100M+ on cloud infrastructure, application software, data platforms and ML tooling.**
- **90% of respondents are from companies with 1,000+ FTEs** across financial services, tech, healthcare and manufacturing.

## Industry Representation



## Budget Distribution: Total Technology Spend Per Company

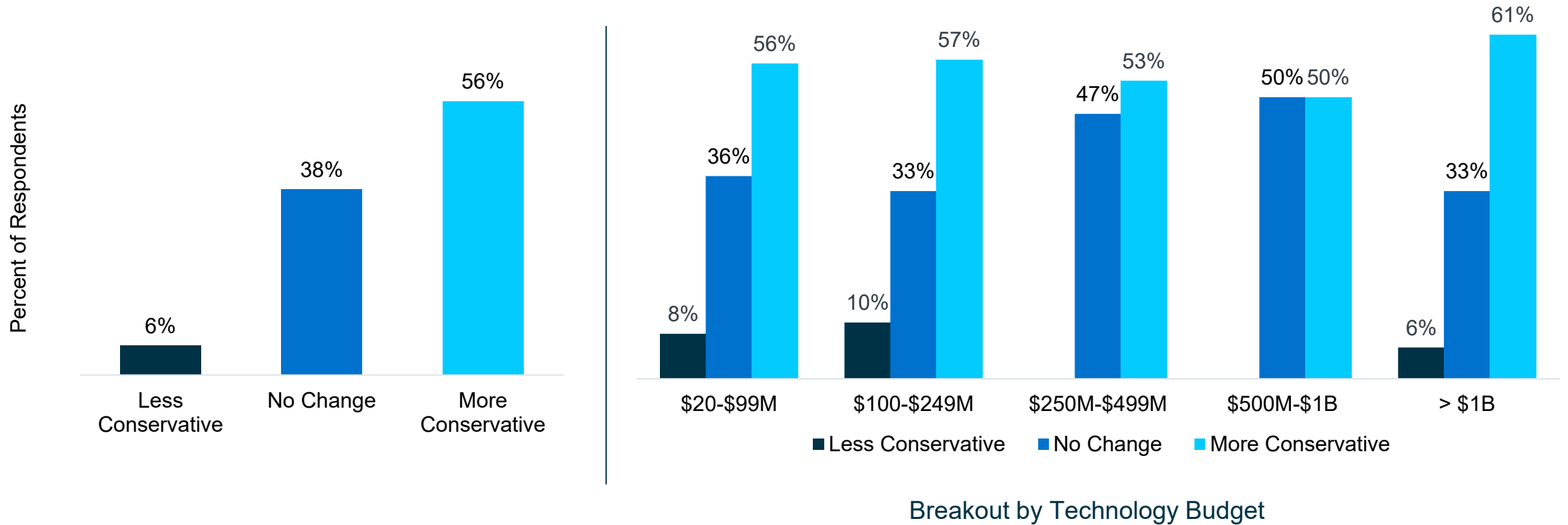


Source: Battery Q3 2023 Cloud Software Spending Survey

Note 1: Industrial segment includes aviation, construction, utilities, transportation and warehousing.

Note 2: Annual technology spend calculated based on mid-point of total technology budget.

# Impact of Economic Conditions on Technology Spending Strategy

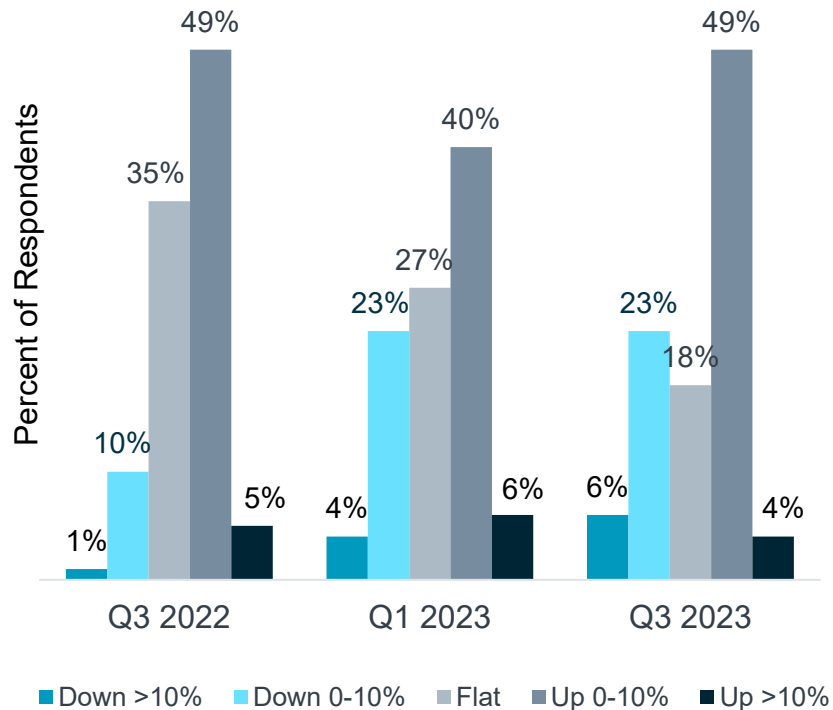


While respondents remain cautious amid an uncertain economic outlook, we saw 'less conservative' budget approaches increase from 3% to 6% since Q1, suggestive of leveling in the downturn of spending appetite.



# Technology Budget and Spending Trends

## Evolving CXO Budget Plans

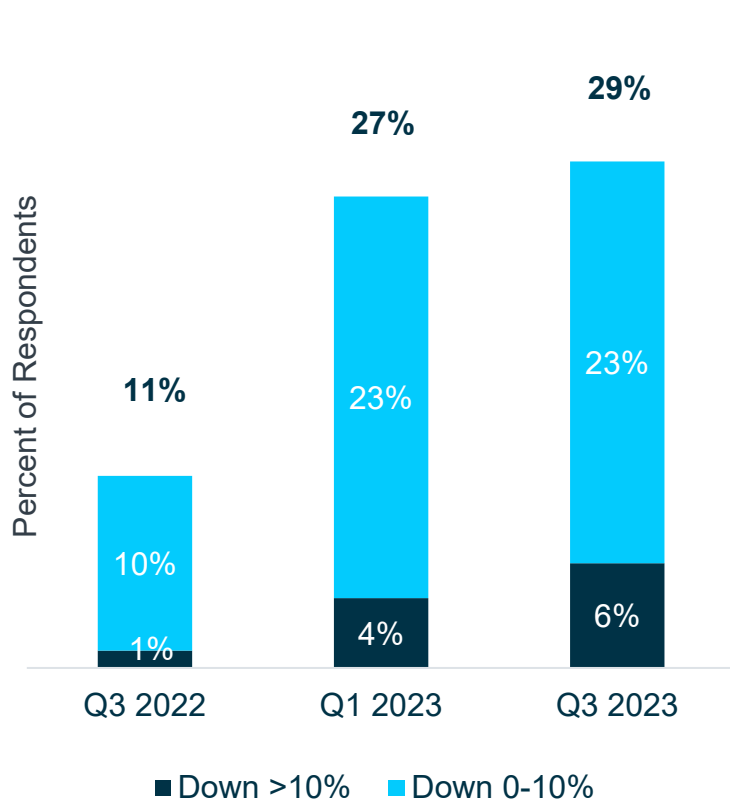


## Budget Distribution: Total Technology Spend per Company

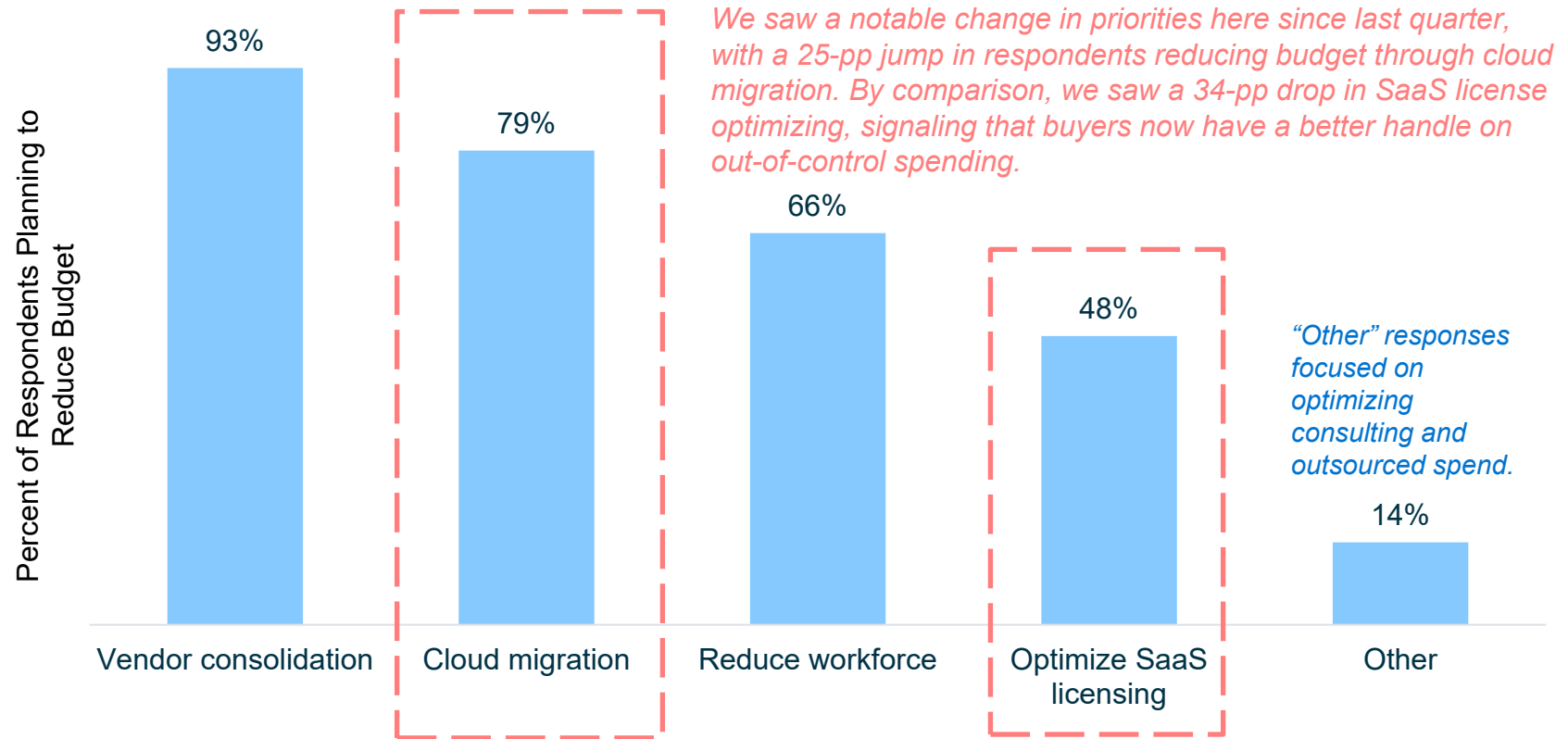
- 1 Despite greater economic headwinds, decision makers plan budget expansion over the next six months.
- 2 The number of companies with declining technology budgets remained relatively steady between Q1 2023 and Q3 2023.
- 3 Industries matter. 54% of financial industry buyers are increasing budget while 24% remain flat. Contrast that with manufacturing, where we see 57% increasing, 14% decreasing.
- 4 Budgets for midsize companies (500-999 FTEs) are the most impacted, with 40% down, 40% flat and only 20% increasing.
- 5 The technology industry is the tale of two worlds, with 55% of respondents increasing budget and 40% decreasing.

# Top Priorities for CXOs Planning to Reduce Budget

## CXOs Planning to Reduce Budget



## Top 3 Priorities for Reducing Technology Budget for CXOs

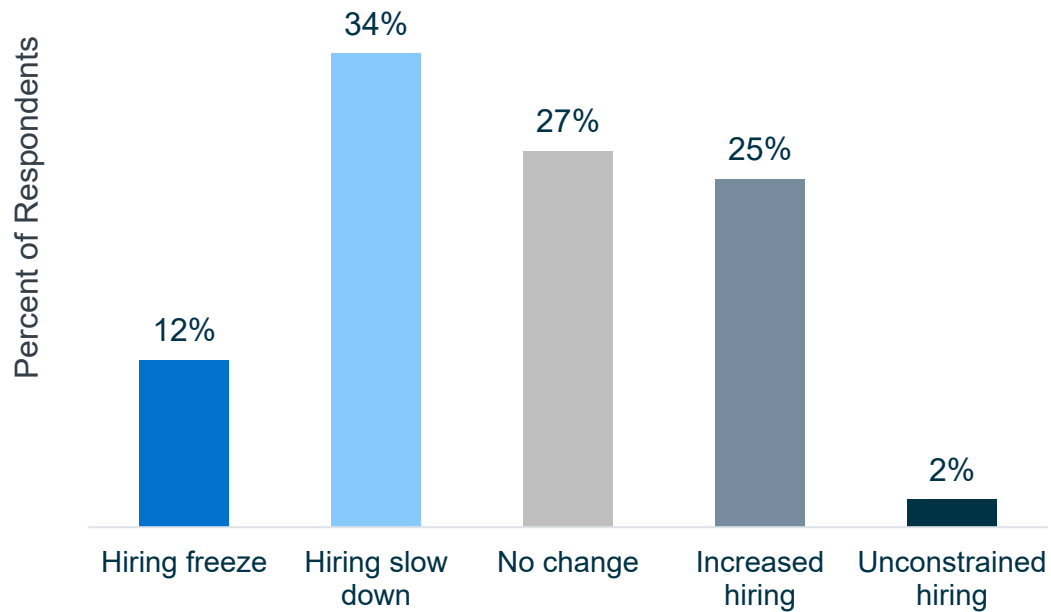


We saw a minor 2-pp uptick in respondents reporting significant budget reductions compared to last survey. Majority of CXOs cite vendor consolidation (93%) and cloud migration (79%) as top priorities for budget reduction.

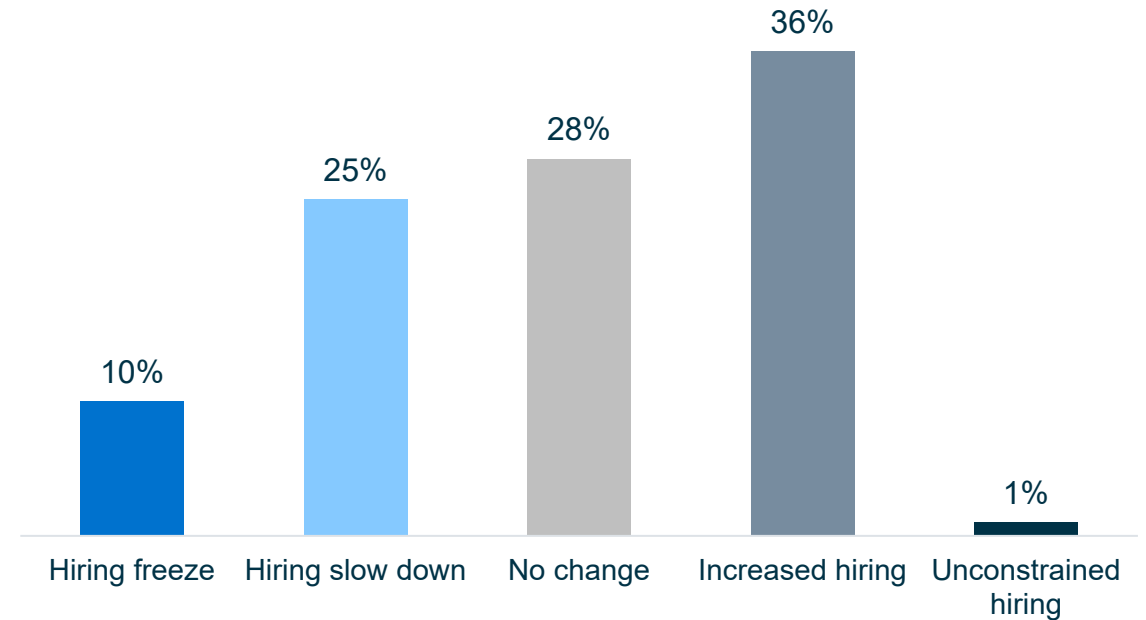
# Headcount Plan and Hiring Focus for CXOs



## Q1 2023 Plans for Headcount



## Q3 2023 Plans for Headcount



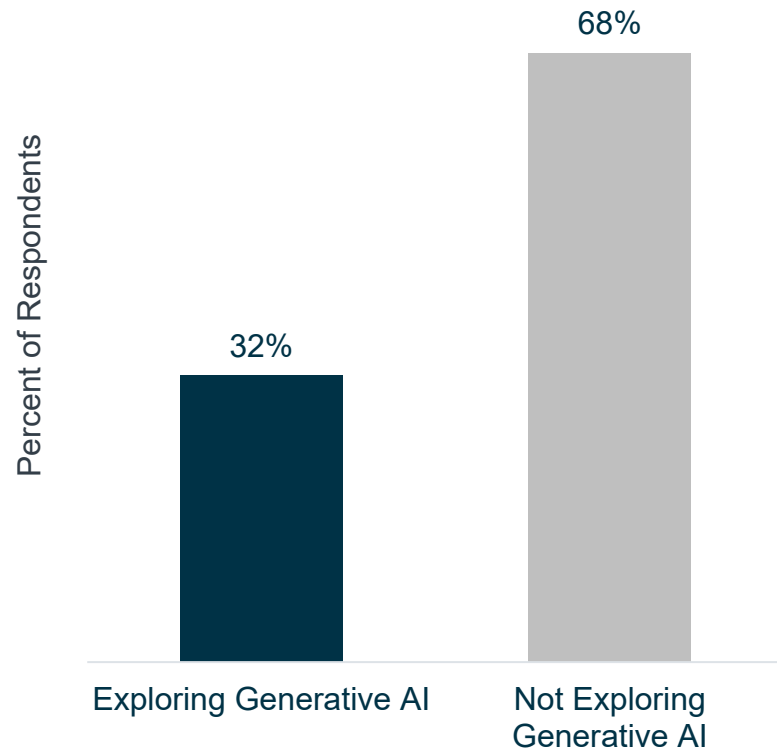
Across enterprises, we continue to see positive trends in hiring, often a leading indicator for future projects and budgets. Among Q3 respondents, 37% plan to increase hiring compared to only 27% in Q1 2023.



# Priorities, Deployment and Category-Specific Spending

# Evolving Cloud Priorities

## Organizations Exploring Gen AI Q1 2023 (prior survey)



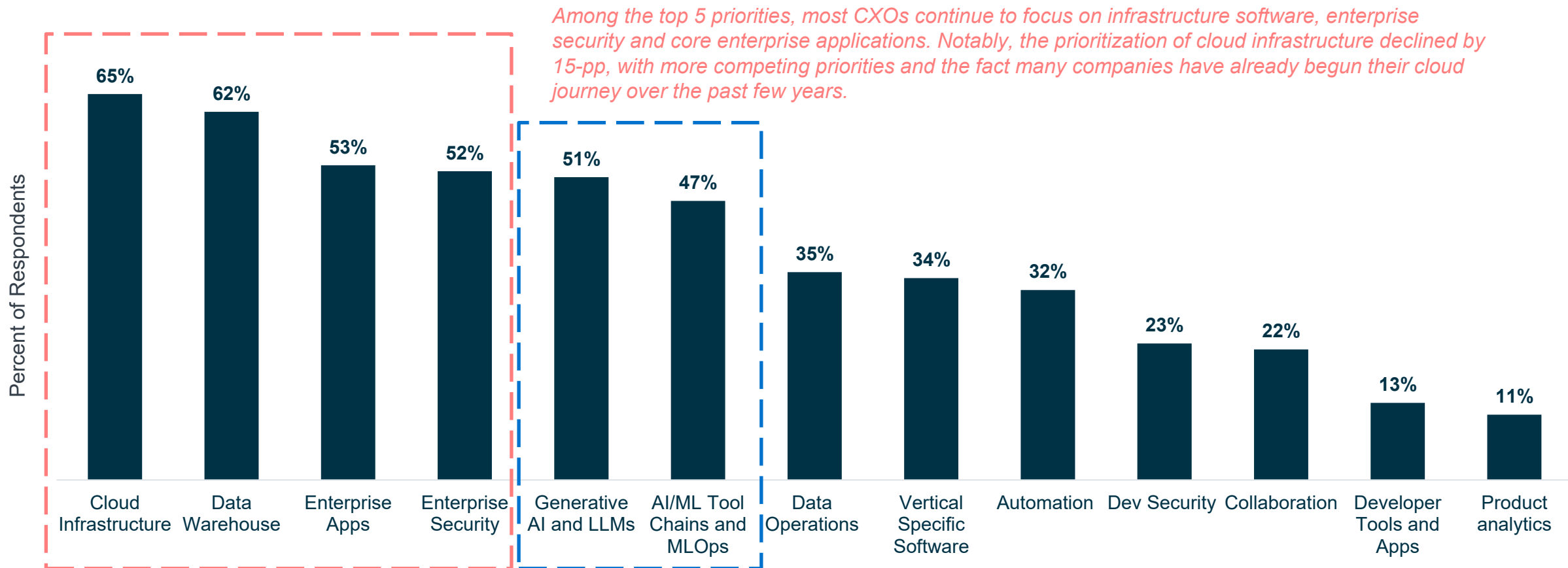
In our Q1 2023 survey, we saw that only 32% of enterprises were exploring generative AI. Since then, we have observed generative AI and LLMs advance rapidly and gain prominence. Therefore, we feel it is crucial to include these trends in future iterations of our survey, as well as other evolving priorities for enterprise tech buyers.

To that end, we added new questions regarding generative AI and LLMs to the Q3 survey to capture a clearer picture of buyer sentiment.



# Cloud Software Spending Priorities

## Software Themes That CXOs consider Top-5 Priority Over Next 12 Months



Generative AI and LLMs now rank as highly as historically strong buyer priorities like automation and data ops.

# Evolution of Cloud Software Spending Priorities

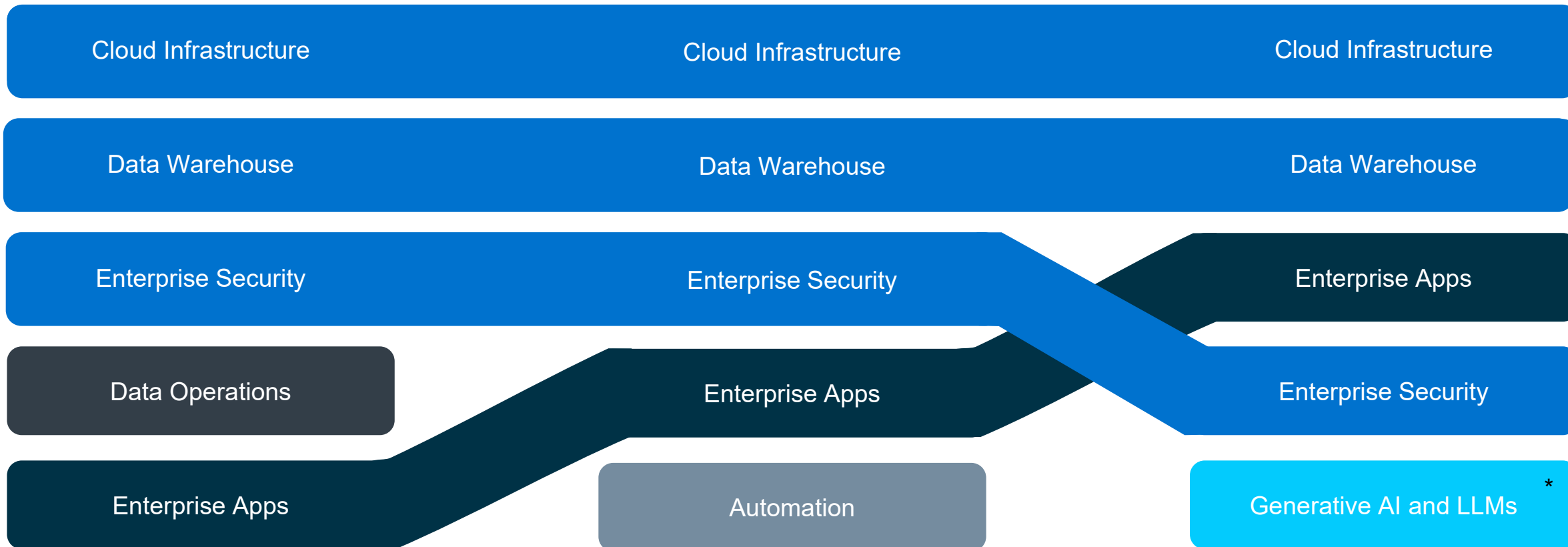
Cloud Software Top 5 Priorities for CXOs Over Next 12 Months



Q3 2022

Q1 2023

Q3 2023

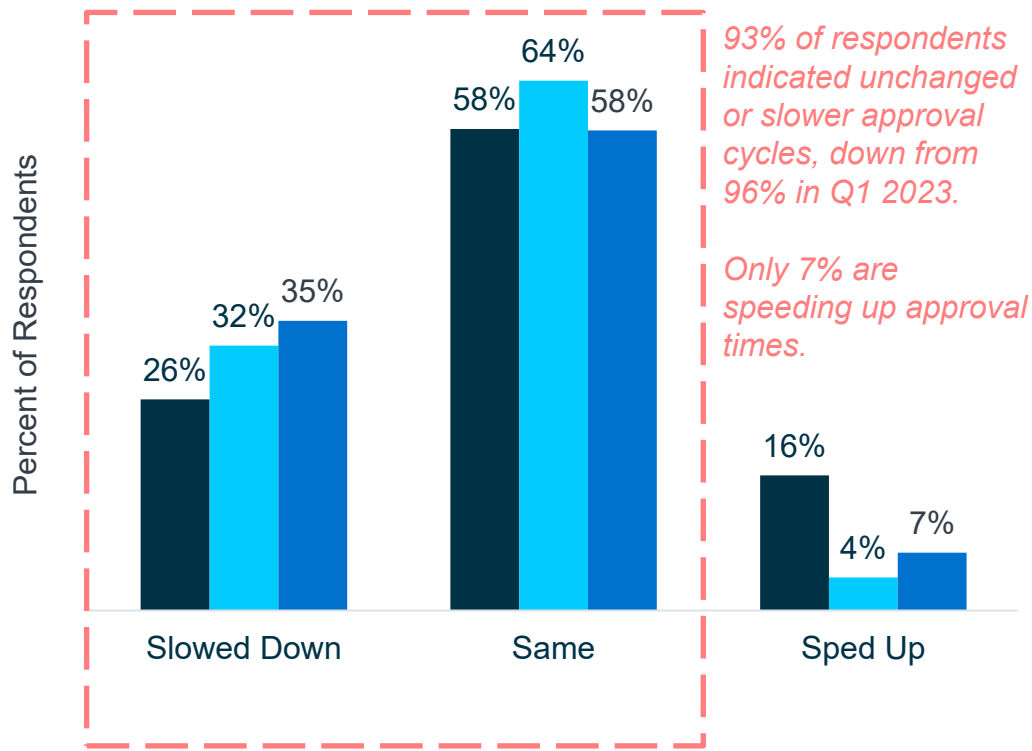


Buyers are demonstrating strong interest in generative AI and LLMs, now among the top five priorities. Enterprise apps continue to rise in priority and security remains steady.

# Enterprise and Bottoms-Up Software Adoption



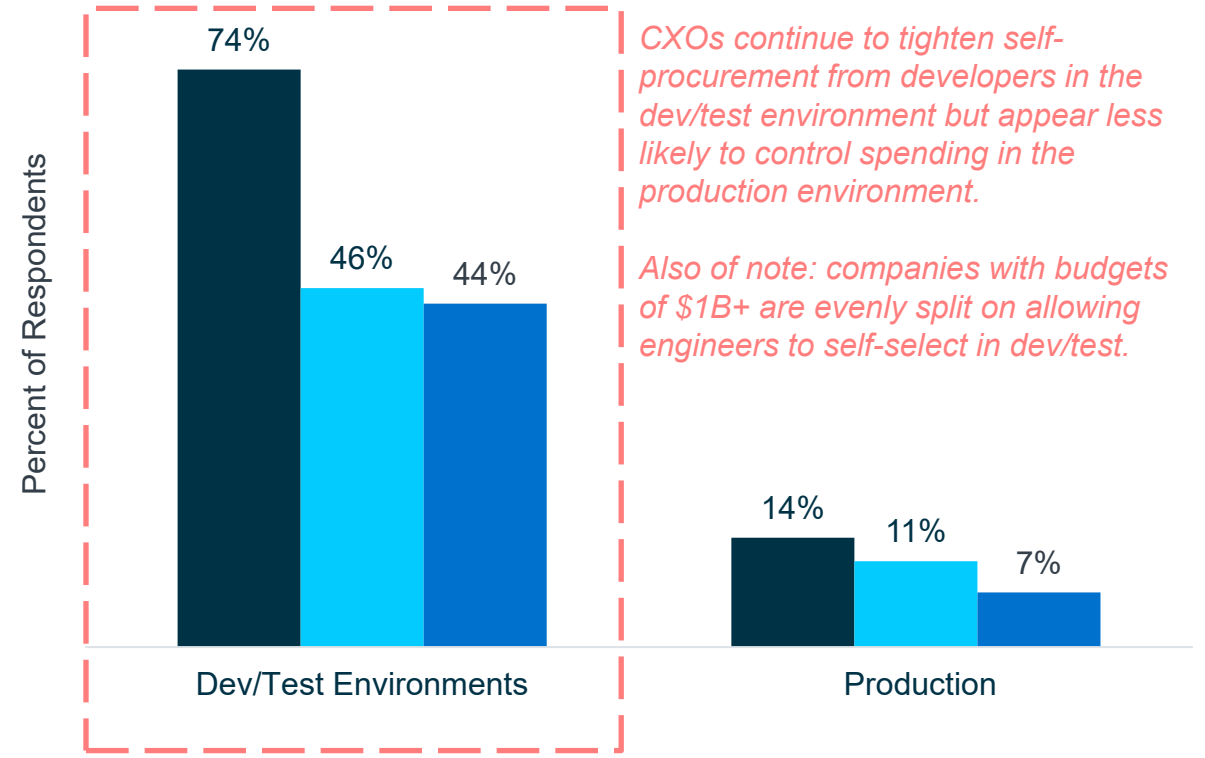
## Approval Times for Enterprise Contracts



93% of respondents indicated unchanged or slower approval cycles, down from 96% in Q1 2023.

Only 7% are speeding up approval times.

## Engineers Allowed to Self-Select Tools



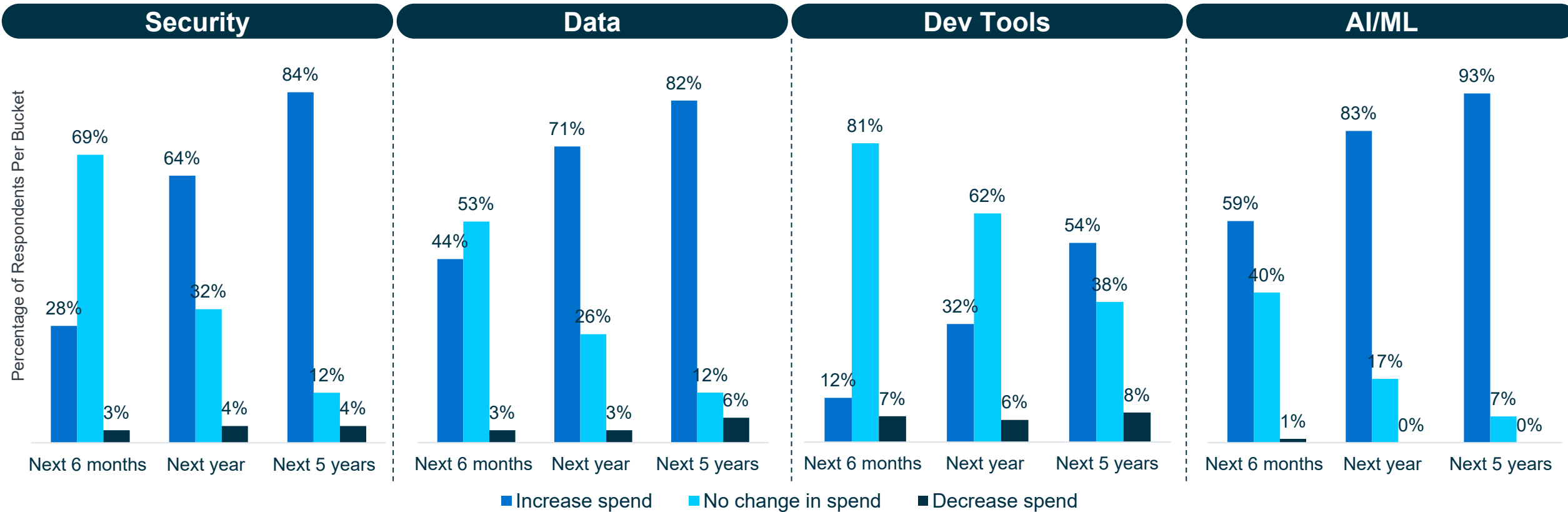
CXOs continue to tighten self-procurement from developers in the dev/test environment but appear less likely to control spending in the production environment.

Also of note: companies with budgets of \$1B+ are evenly split on allowing engineers to self-select in dev/test.

■ Q3 2022 ■ Q1 2023 ■ Q3 2023

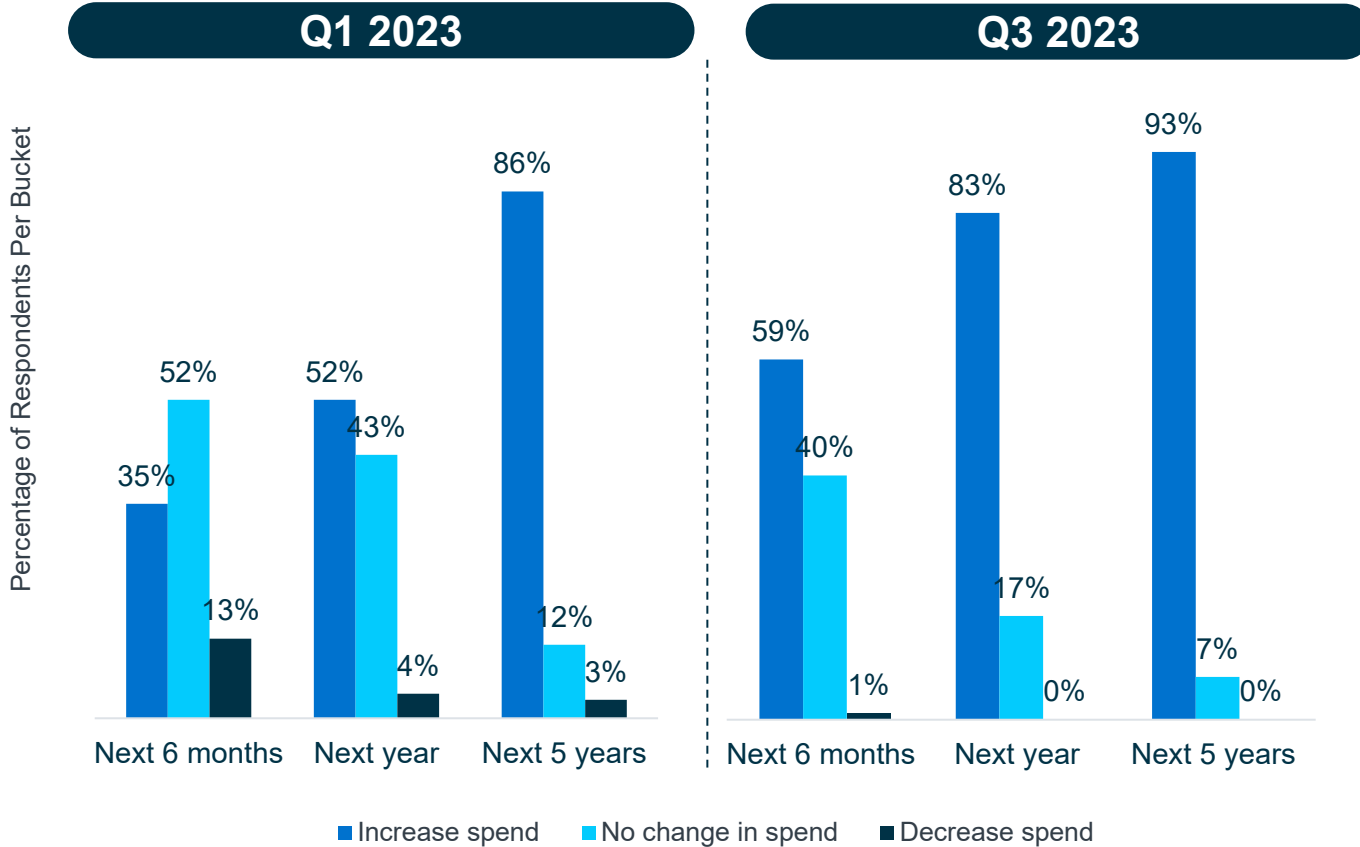
CXOs continue to move away from “bottoms-up” technology adoption, extending a multi-year trend of tightening restrictions on self-procurement.

# Expected Cloud Software Spending Change by Category

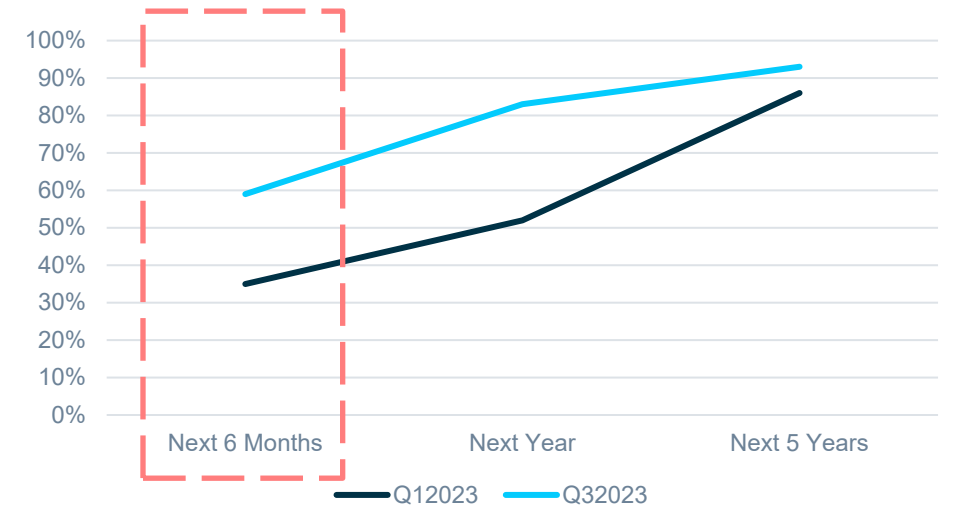


AI/ML and data both are themes with strong budgetary momentum. By comparison, spending on dev tools remains flat with less anticipated upside in the next few years.

# Expected Cloud Software Spending – AI/ML



59% of respondents expect to increase AI/ML spending in the next six months, a 24-pp increase from Q1 2023. We are seeing fewer enterprise tech buyers remain on the sidelines of the AI trend.

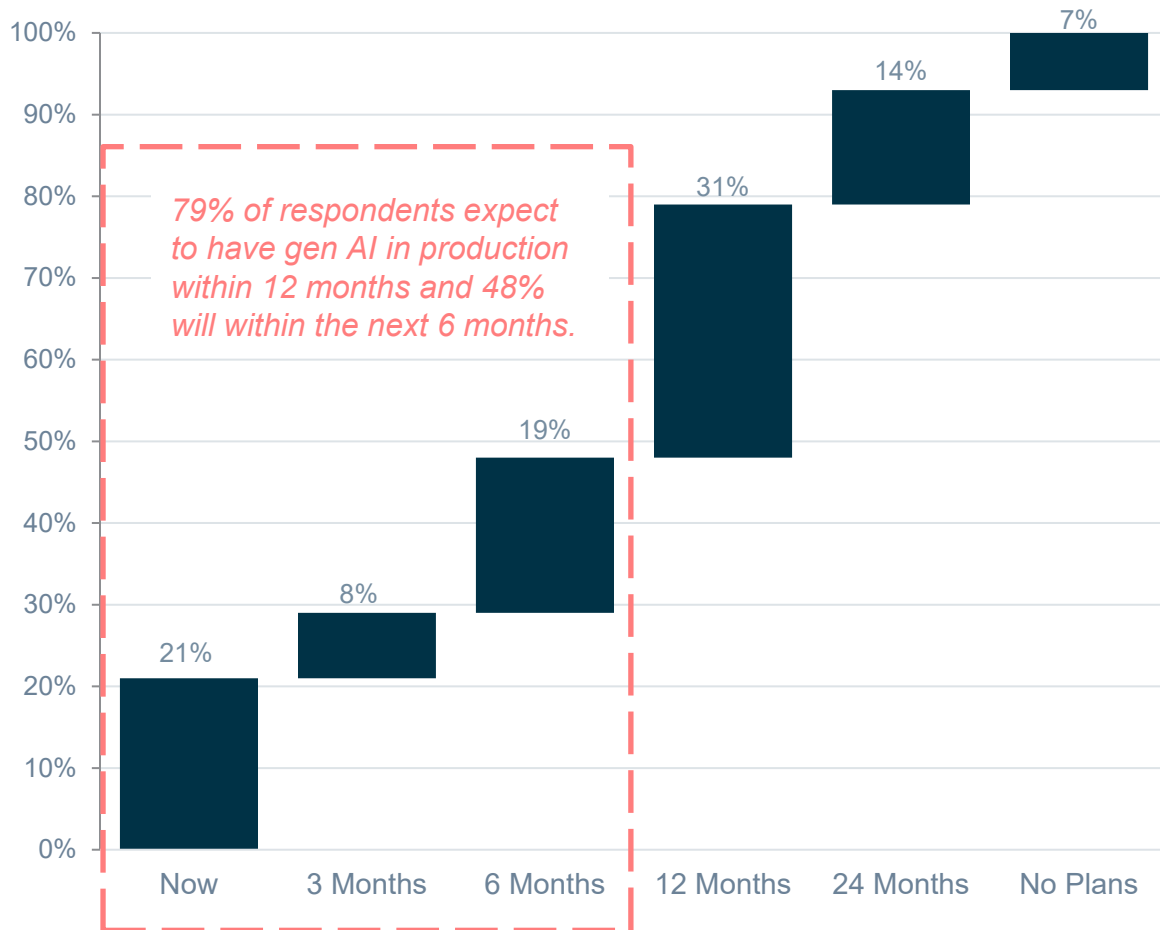


Industries of virtually every sector and size are expanding AI/ML investment—at a notably accelerated pace compared to earlier this year. Respondents plan to deploy ~\$1.5B in budget on AI/ML technologies, including generative AI.



# Production Deployment for Generative AI

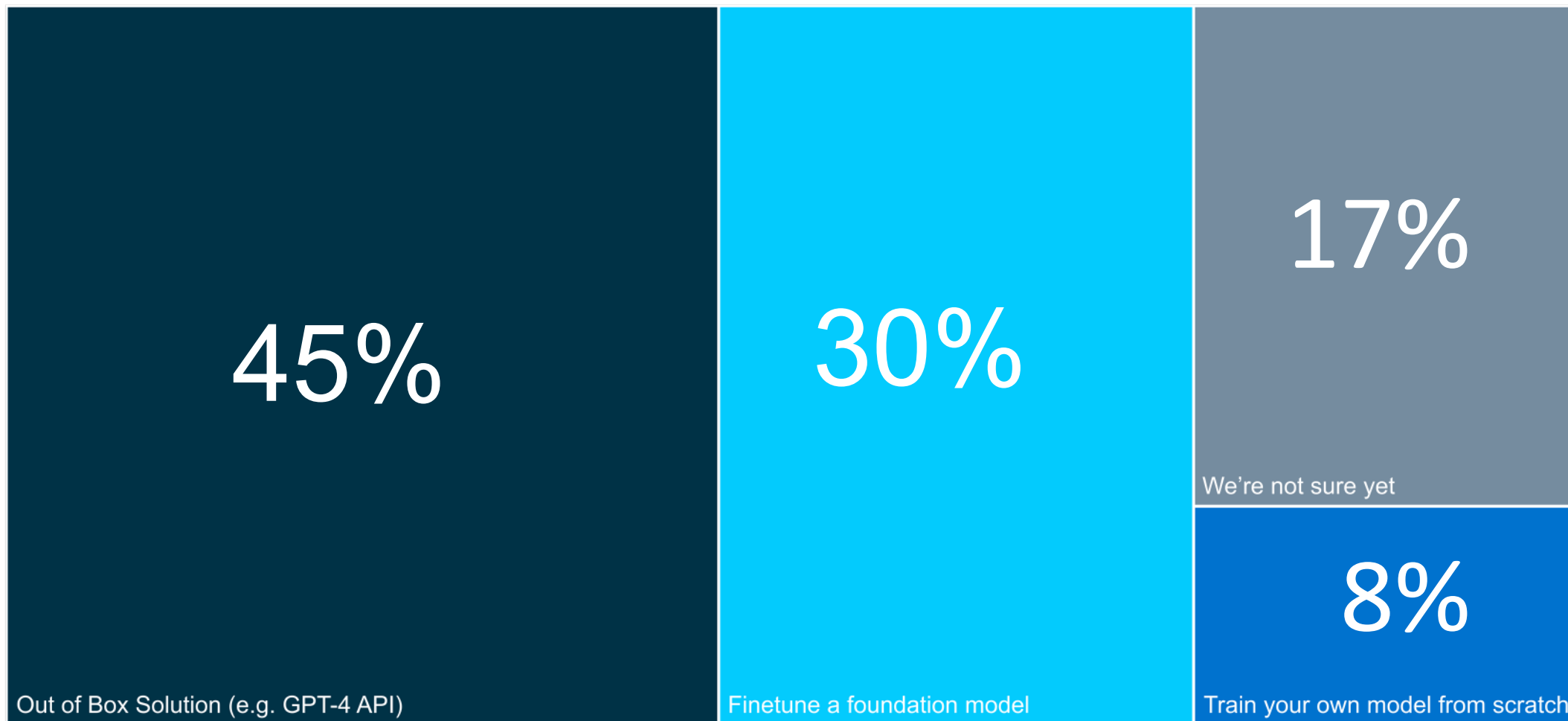
## Deployment Plans



## Early In Evolution – What’s Next?

- 1** Enterprises are beginning to move **beyond the experimentation phase with generative AI** to execute meaningful deployments, primarily for customer, people, sales and knowledge management use cases.
- 2** Gen AI intent has exploded, with **79% of organizations planning to deploy the technology within 12 months**, more than double (32%) only 6 months ago.
- 3** **Geography matters with gen AI.** 38% of European respondents have no plans to deploy gen AI in the next 2 years or in the foreseeable future, while only 19% in North America have no plans, possibly because of privacy concerns around European Union AI Act.
- 4** **So far in 2023 (as of Q2 2023), venture-capital investors have deployed \$14.1B across 86 generative AI deals.** Excluding the \$10B OpenAI minority round, \$4.1B has been invested into generative AI startups.

# Utilize Foundation Model(s) or Build... or Something in Between?



Respondents are split between using out of the box solution and fine tuning. Only 8% of respondents plan to build models from scratch, while 75% plan to use foundation model(s) and 30% plan to do additional fine-tuning and augmentation. We anticipate that proprietary data and augmentation will matter meaningfully in the future.

# Barriers to Deployment of LLMs and Generative AI

## Barriers & Opportunities

*79% of respondents rank data privacy among the top three barriers to LLM deployment. Given that 75% of respondents use foundation models, many may look for services to control data.*

1  
**Data  
Privacy**

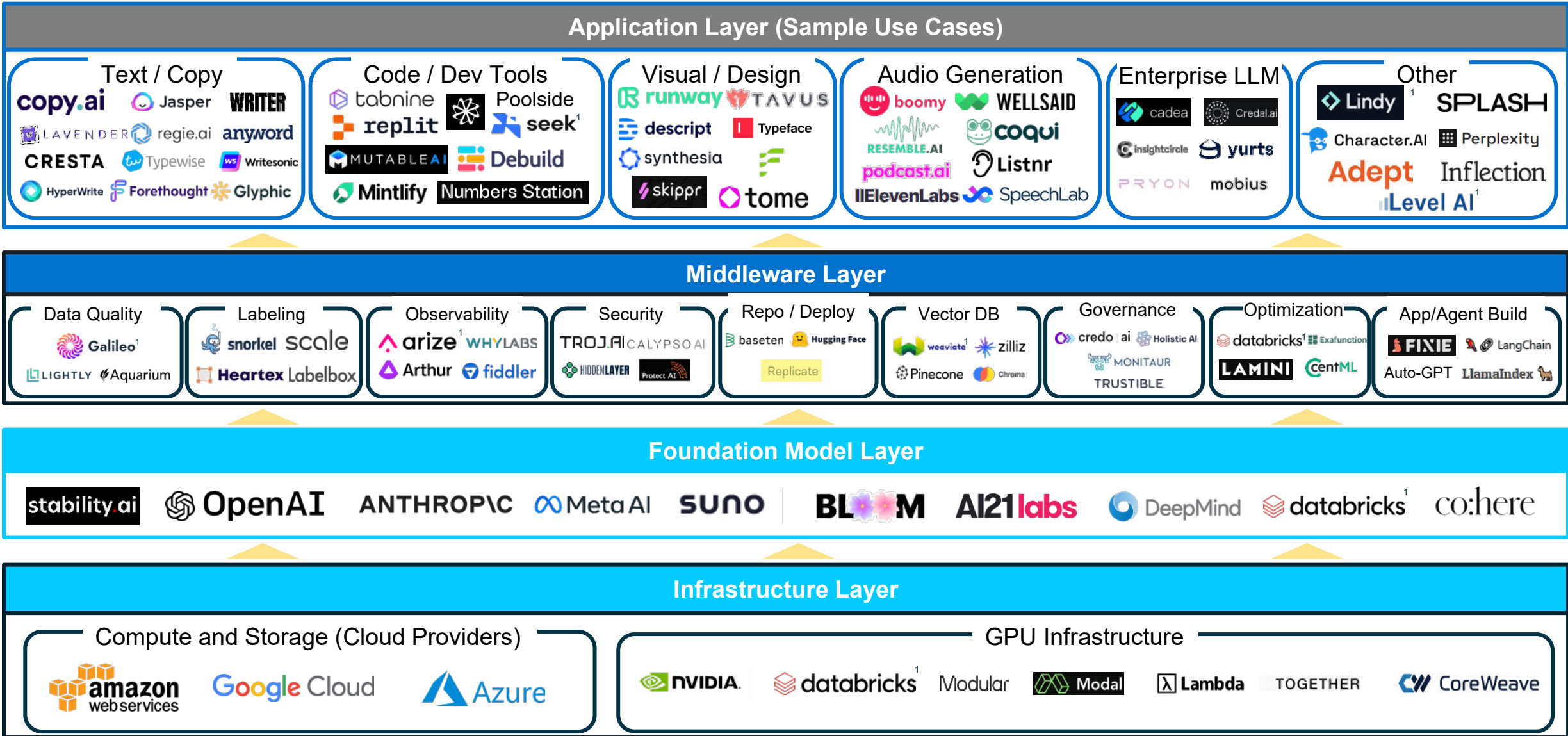
2  
**Data  
Quality**

3  
**Model  
Accuracy**

4  
**Model  
Evaluation**

Despite significant noise about model hallucinations, they're not a major factor for enterprise buyer decision-making. Data protections, however, are a top concern.

# Generative AI Landscape



# Battery

## Appendix



# Enterprise Tech Spend Sentiment Index Methodology

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The Battery Ventures Enterprise Tech Spend Sentiment Index is based on budget, spending trends, budget outlook (data, security, AI/ML, dev tools etc.) and approval times, producing a score between 0 and 100. A higher numeric score indicates a more positive outlook among tech buyers, a minimal increase that can be attributed to positive outlooks across AI/ML & Data Spending. Since Q3 2022 we are still down 4.2 points in sentiment index.

**51.2**  
**Q3 2023**