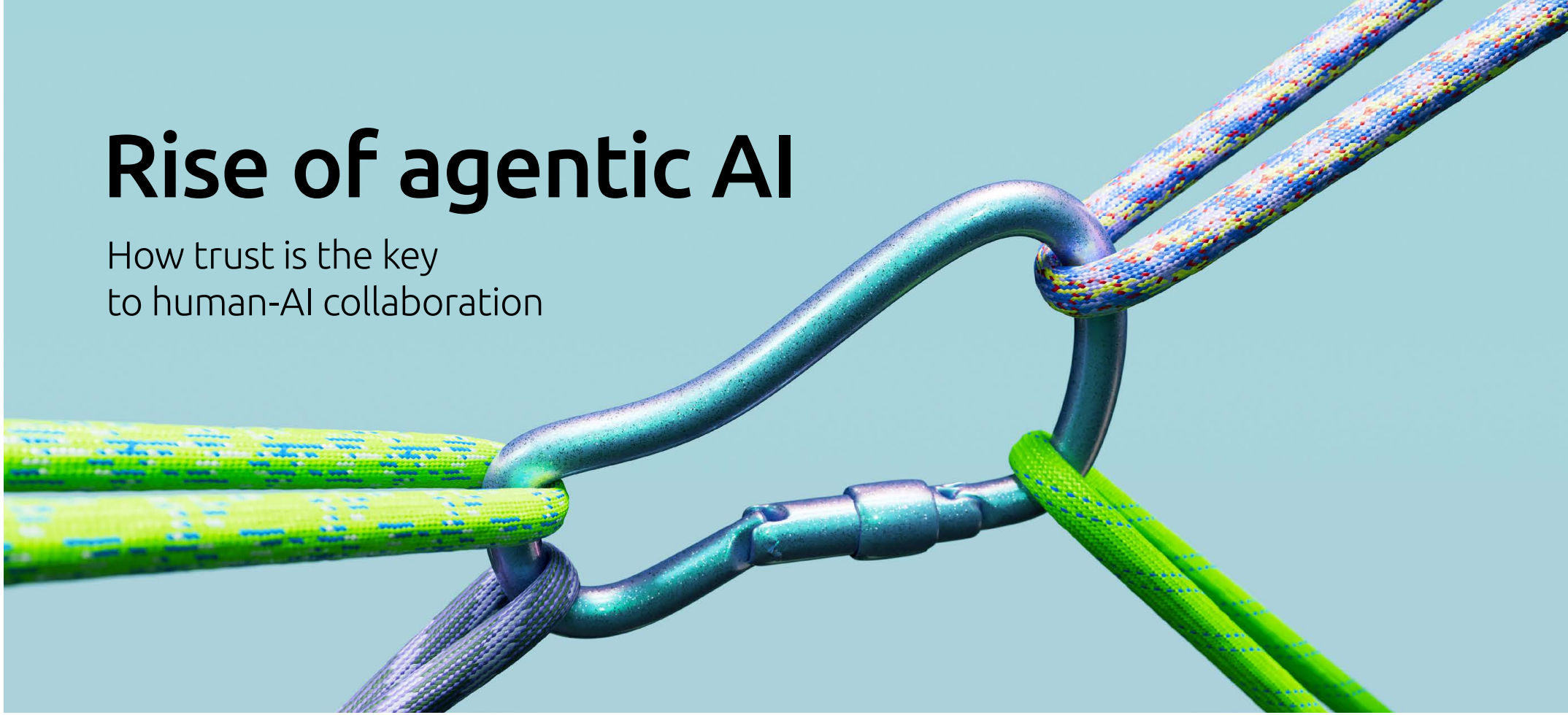
Rise of agentic AI

How trust is the key to human-AI collaboration



Capgemini RESEARCH INSTITUTE

#GetTheFutureYouWant

Table of contents

Executive summary

AI agents constitute one of the fastest-emerging technological trends (see page nine, ***"What are AI agents and what is agentic AI?"***). Unlike traditional AI applications, which often act as tools focusing on narrow, predefined tasks, agentic AI can manage and execute end-to-end processes with less human intervention, evolving from tools to team members and marking a new era in enterprise productivity, efficiency, and growth.

Based on our research findings and current adoption trajectories, we project that AI agents could generate up to **$450 billion in economic value** through revenue uplift and cost savings across surveyed countries by 2028. Competitive momentum is clearly building: 93% of leaders believe that those who successfully scale AI agents in the next 12 months will gain an edge over industry peers.

Already, 14% of organizations have implemented AI agents at partial (12%) or full scale (2%) and nearly one-quarter (23%) have launched pilots, while another 61% are preparing for or exploring deployment. As these numbers showed a remarkably fast adoption, we reconfirmed the responses of a majority of survey respondents (900 out of 1500). This exercise showed results similar to the original data, confirming strong adoption numbers. In the near term, AI agents are expected to see most extensive adoption in customer service, IT, and sales, expanding into operations, R&D, and marketing over the next three years. But expectations for highly autonomous systems remain limited. Our survey shows that, in 12 months, only 15% of all business processes are expected to operate at Level 3 (semi-autonomous) to Level 5 (fully autonomous). This share is expected to grow to 25% by 2028. Most AI agents currently operate at low levels of autonomy, primarily as simple agents or semi-autonomous agents. Notably, AI agents can deliver tangible value even at intermediate levels of autonomy.

Moreover, trust in AI agents is declining. **Only 27% of organizations express trust in fully autonomous AI agents, from 43% 12 months ago**. This is potentially a reflection of business reality taking hold after the initial enthusiasm and overconfidence in agentic AI capabilities. Ethical concerns around AI, such as data privacy, algorithmic bias, and the "AI black box," are prevalent, but few organizations act

Executive summary

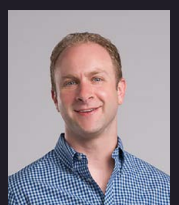
decisively to mitigate them. Furthermore, only half claim sufficient knowledge of AI agent capabilities, and even fewer can pinpoint where agents outperform traditional AI or automation. Equally worryingly, fewer than one in five organizations report high levels of data-readiness, and over 80% lack mature AI infrastructure, significantly limiting their ability to scale agentic systems effectively.

Nonetheless, in 3 years, organizations expect to have AI agents as members within human-supervised teams. **This means that AI agents must be seen not as tools, but as part of the team.** Such human-AI agent collaboration enhances the value of AI agents, driving transparency, trust, and positive outcomes. But 61% of organizations report rising employee anxiety about the impact of AI agents on their employment prospects, and over half believe AI agents will displace more jobs than they create. Despite this, fewer organizations are prioritizing reskilling or workforce restructuring.

To harness the full potential of AI agents, organizations must move beyond the hype and work toward:

- Redesigning processes to deploy AI agents effectively and reimagining business models
- Transforming the workforce and organizational structure to fully onboard a new, agentic workforce as team members
- Striking the right balance between agent autonomy and human involvement
- Strengthening data and technological foundations to scale AI agents
- Ensuring AI agents operate within defined scope of execution,and remain traceable and explainable to earn trust
- Developing and integrating ethical AI that address the risks posed by autonomous AI agents.

We'd also like to thank the many industry executives who shared their valuable insights with us.



Jason Gelman
Director of product management, Vertex AI, Google Cloud

Eric Pace
Head of AI,
Cox Communication

Lynn Comp
Head of Global Sales and GTM (AI Center of Excellence), Intel

Itai Asseo
Head of Incubation and Brand Strategy (AI Research), Salesforce

Anna Kopp
Digital Lead Germany, Microsoft

Joji Philip
Director AI/ML Products, Ericsson

Dr. Suraj Srinivasan,
Philip J. Stomberg Professor of Business Administration and Chair of the MBA Elective Curriculum, Harvard Business School

Susan Emerson
Senior VP, AI Product, Salesforce

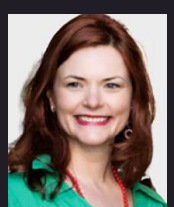
Dr. Walter Sun
SVP, Global Head of AI, SAP

Dorit Zilbershot
GVP, AI Experiences & Innovation, ServiceNow

Preetha Sekharan
VP, Digital Incubator (Applied AI and Transformation), Unum

Daniel Vassilev
Co-Founder and Co-CEO, Relevance AI

Vishal Singhvi
Director, Strategic Initiatives – Gen AI, Microsoft



Nicole Onuta
Lead AI Risk Management, ING – Netherlands

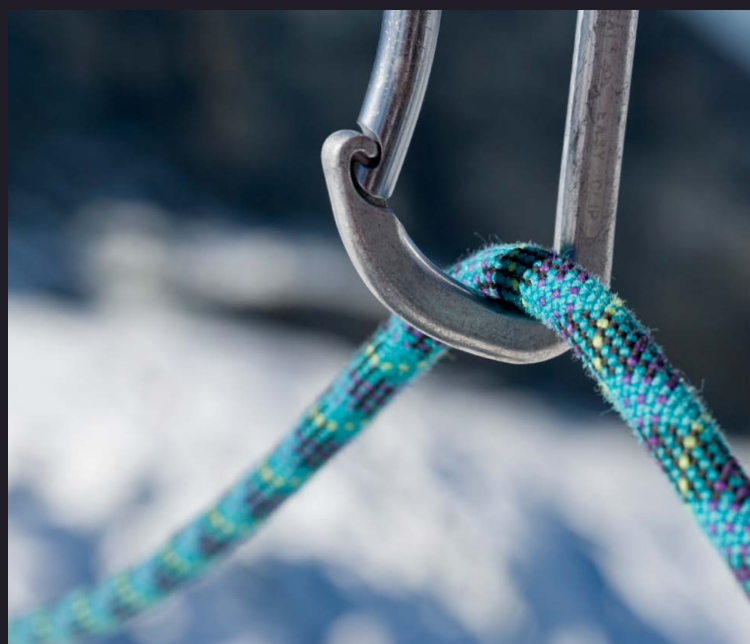
Shekar Ramachandran
AI Architect Platform and Software, Ola Krutrim

Deepak Anand
SVP, Product GTM and Evangelist, Kore.ai

Who should read this report and why?

This report offers an overview of the transformative potential of agentic AI and AI agents for large organizations across all industries and sectors. It is primarily intended for senior executives in data and AI functions, and those in strategy, finance, IT, innovation, and risk and compliance, among others, who are involved in the implementation of Gen AI or agentic AI at their organization.

The report will help business executives identify the potential of agentic AI, assess the level of trust and collaboration between humans and AI agents, and the risks and challenges of implementing and scaling agentic AI. The report draws on the comprehensive analysis of a survey of 1,500 leaders (director level and above) across 14 countries. Finally, it offers recommendations for business leaders to accelerate their organizations' agentic AI journeys.



What are AI agents and agentic AI?

AI agents are programs/platforms/software that are connected to the business environment with a defined boundary, make decisions autonomously, and act to achieve specific goals with or without human intervention. With the latest advances in reasoning AI models, AI agents are able to break down tasks, "reason" through potential pathways to find solutions to the given problem, try those solutions, and present successful outcomes.

Examples of AI agents include: OpenAI's Operator, Devin, Manus, Google Gemini Agent Mode, Runner H by H Company.

- *Operator by OpenAI can handle a wide range of repetitive browser tasks such as filling out forms, ordering groceries, booking restaurant tables, etc., based on user preferences.*[1]
- *Devin, branded as the AI software engineer, is capable of automating software development tasks such as code generation, debugging, and deploying code with minimal human input.*[2]
- *Manus is a general AI agent that handles various tasks in work and life such as creating personalized travel itineraries, analyzing documents, conducting research, and generating content and codes.*[3]

Examples of AI/Gen AI assistants include: Microsoft Copilot, Google Gemini, ChatGPT, Le Chat by Mistral AI.

Agentic AI is a broader term and includes systems, platforms, practices, tools, and technologies that enable agents to function. Unless otherwise specified, the two terms are used interchangeably in this survey.

Agentic systems have been around since well before the current AI boom and can be built using both AI and non-AI technologies. Recent advances in AI, language models, and reasoning capabilities have driven the rise of agentic AI systems.

How do AI agents differ from AI/Gen AI assistants?

AI agents	Key features	AI/Gen AI assistants
High autonomy and agency: operate independently	Autonomy	Incapable of operating autonomously
Take prompted and unprompted action to achieve specified goals within a workflow, handling complex tasks requiring specialized capabilities	Action	Take actions based on user prompts and predefined logic; handling discrete sub-tasks (generate content, images, code, etc.)
Anticipate needs and take initiative	Proactivity	Respond to explicit prompts
Learn and adapt continuously; often with long-term memory and contextual awareness	Learning ability	Pre-trained, with limited to no real-time learning or long-term memory retention
Can be built on AI or non-AI systems; does not necessarily use Gen AI or LLMs	Underlying tech	Built on AI/ML, mainly uses pre-trained data
Interact with external and internal data, tools, and systems in real time; better positioned to handle errors	Interactivity	Cannot perform real-time interactions; can access external tools like web search when enabled and have limited error-handling capabilities
Manage the entire campaign lifecycle autonomously – customize content to audience, test creatives, launch campaigns, dynamically adjust targeting and messaging based on real-time performance	**Example**	*Generate campaign briefs based on direct user prompts and existing templates*

Source: Capgemini Research Institute analysis.

NB: Not all AI agents are subject to the conditions listed above. For example, while AI agents are often characterized by autonomy, they can also operate semi-autonomously.

In essence, AI agents can proactively manage and execute end-to-end processes with less human intervention, whereas AI/Gen AI assistants often act as tools focused on discrete, predefined tasks based on explicit prompts.

Why the hype?

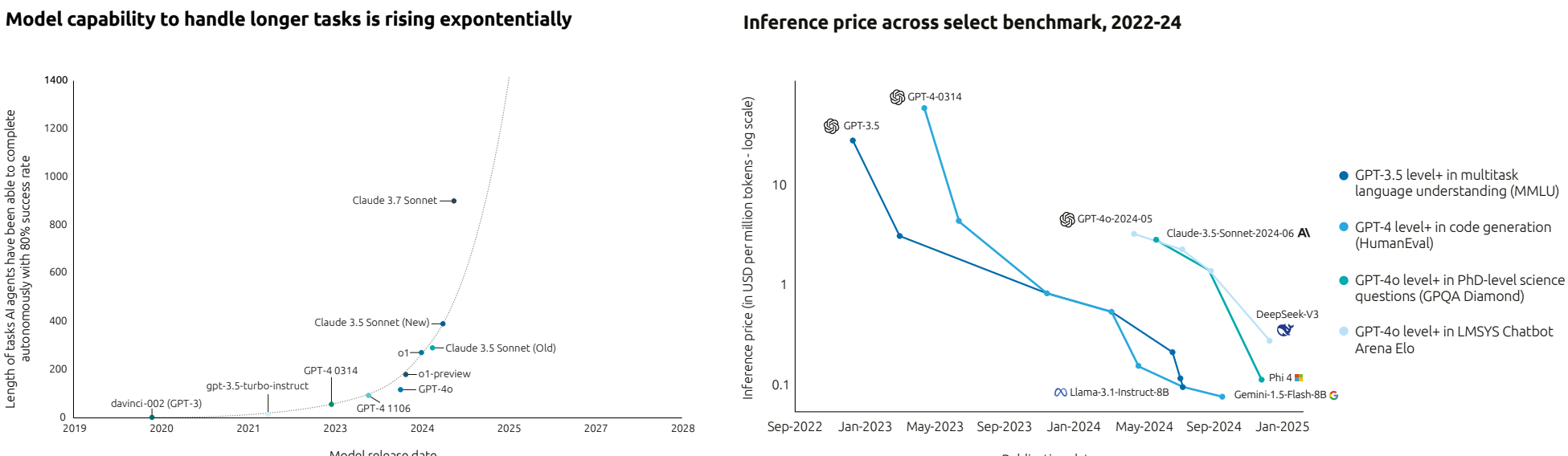
AI agents are at the center of the global technology narrative in 2025. We at the Capgemini Research Institute flagged AI agents as a top technology trend for 2025.[4]

- The past year has marked a turning point in automated software agents, with breakthroughs in natural language processing (NLP) dramatically expanding their capabilities not only to answer questions, but to plan, collaborate, reason, execute tasks, and improve continuously.
  - Figure 1 shows that the length of tasks (measured by how long it takes a human to complete them) for which AI agents can achieve an 80% success rate has been doubling roughly every 213 days – indicating exponential growth in model capabilities.[5]
  - AI had already surpassed human performance across many tasks, including several previously challenging benchmarks, with only a few exceptions. Even in those areas, the performance gap between AI and humans is shrinking rapidly.[6]
- Tech giants including Google, Microsoft, Amazon Web Services (AWS), and OpenAI, and enterprise solution providers such as Salesforce, ServiceNow, and SAP are racing to roll out AI agent platforms, tools and frameworks. These range from orchestration protocols, plug-and-play agents that integrate directly with enterprise systems like CRM and ERP, to agent studios for building customized agents.
- As Gen AI models mature and competition intensifies, cost dynamics are also shifting.[7]
  - The inference cost for a system performing at the level of GPT-3.5 dropped over 280-fold between November 2022 and October 2024 (see figure 1), while hardware costs are down 30% annually and energy efficiency has improved by 40% each year.[8]
  - Open-source models are closing the gap with closed models – for instance, DeepSeek's entry into the AI space sparked significant concern among investors in rival technologies, as it demonstrated impressive capabilities while reportedly using fewer resources and lower costs than traditional AI models.[9]
- At geopolitical level, advancements in agentic AI are not only a matter of innovation, but one of national capability and influence. A recent report suggests that the AI 'space race' could reshape the world order.[10] Discussions about data and model sovereignty are also prominent, as some countries consider the implications of relying on external providers for critical infrastructure.

What was once a theoretical construct is quickly becoming a cornerstone of digital transformation. Looking ahead, AI agents may soon be ubiquitous and indispensable, as mobile apps are today.

> AI agents are one of the top technology trends of 2025

Figure 1.
Model capabilities are rising exponentially, while inference costs have dropped over 100x in the past couple of years



Source: (i) Derived from Arxiv, "Measuring AI Ability to Complete Long Tasks," March 2025.
(ii) Stanford University HAI, Artificial Intelligence Index Report 2025, 2025; Epoch AI, 2025; Artificial Analysis, 2025.

How do AI agents work?

A AI agents interact with their environment and receive triggers, inputs, or goals from users.

B By employing reasoning models, they can break down the goals into specific actions or steps and prioritize them.

C For task execution, AI agents may access internal data and enterprise tools systems (such as knowledge bases and customer relationship management [CRM]), external tools (such as web search, third-party databases), and interact with other AI agents, or request clarification from users.

D In a multi-agent system, an "orchestrator" agent can break down the larger problem into smaller pieces to be tackled using agents that leverage small language models, significantly reducing the cost and time needed to arrive at an outcome. Guardrails enforce ethical, operational, and safety standards.

E The above iterations can be repeated in different combinations and until the stated goals have been achieved. The agent utilizes its memory to maintain context, learn from previous iterations or past experiences, and improve its performance over time.

F Agent-to-Agent (A2A) protocols help collaboration between agents, while Model Context Protocol (MCP) aids in accessing external tools. MIT's Project NANDA is an initiative to develop the foundations of the Internet of AI Agents.

Although AI agents could be set up to operate autonomously, they still function within the scope of execution. Critical situations will require human oversight or decision-making.

For more details on these terms, please see the glossary in the appendix.

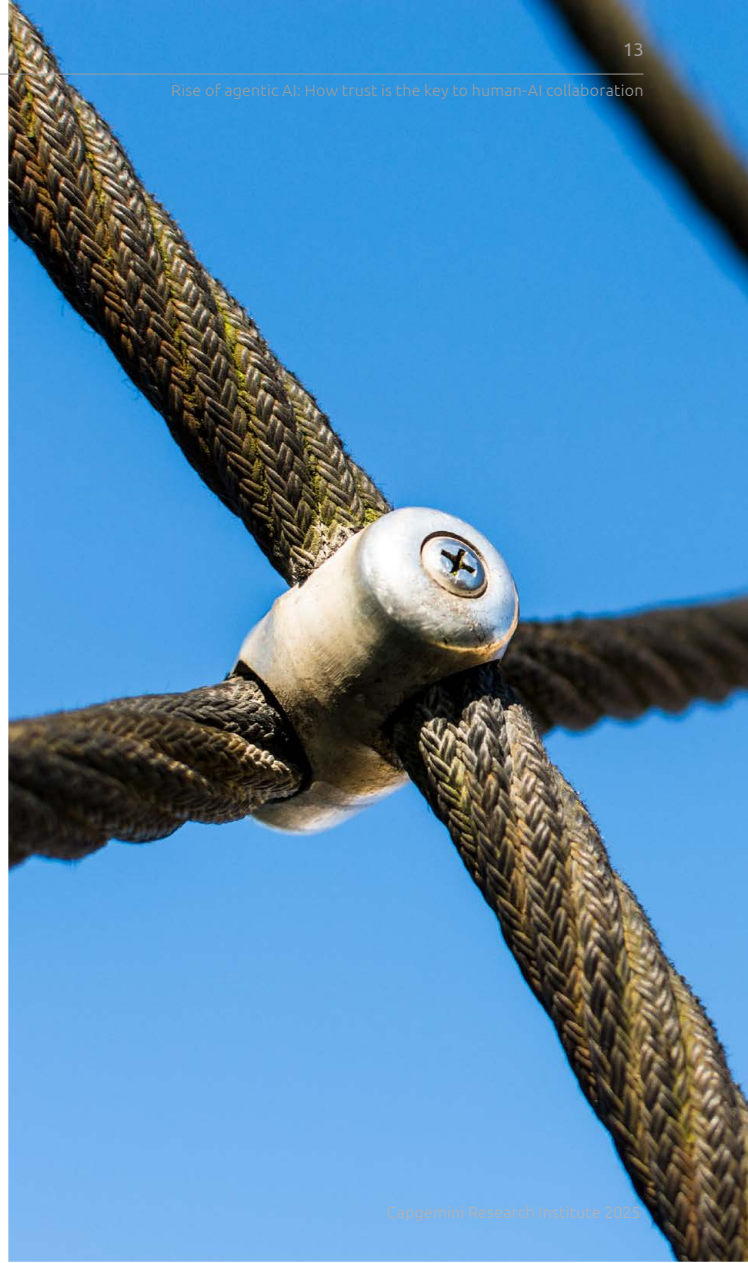
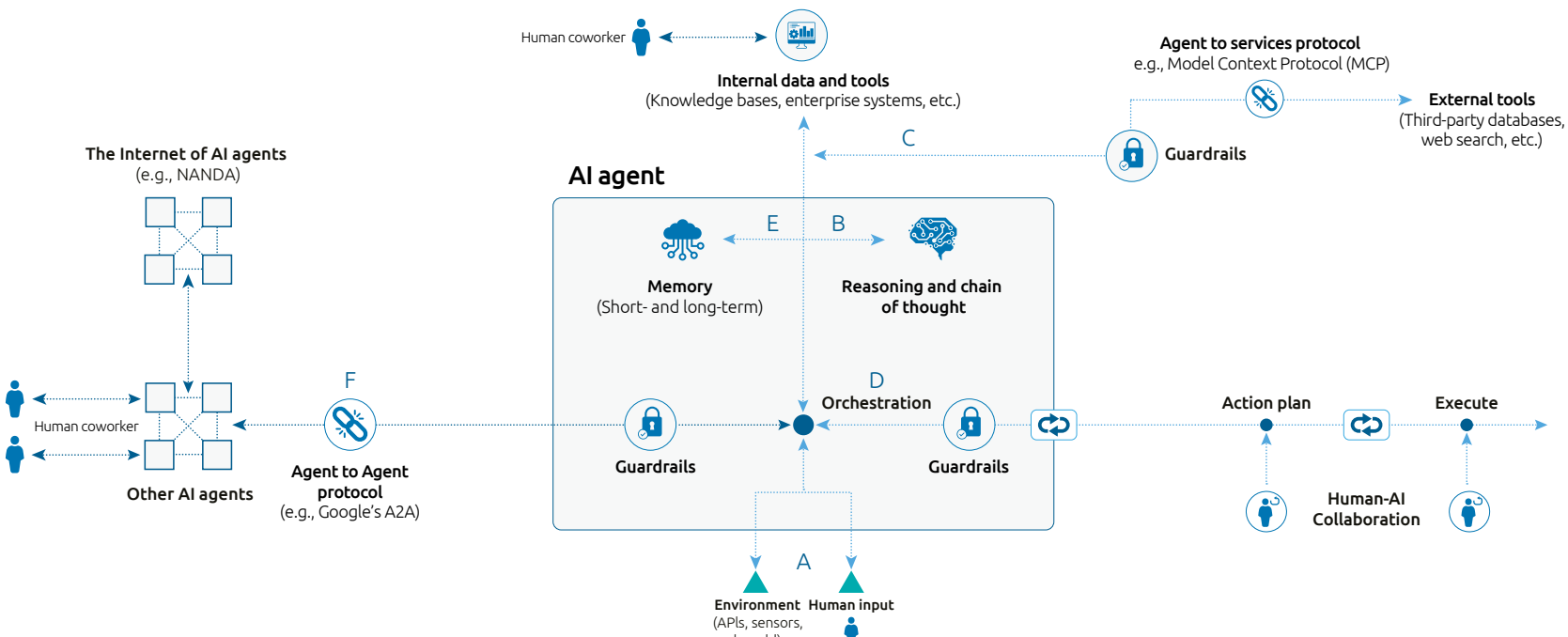


Figure 2.
Anatomy of a typical AI agent workflow



Source: Capgemini Research Institute analysis.
Note: Short-term memory for in-context learning. Long-term memory enables the agent to retain and recall vast information over extended periods, leveraging an external vector store for fast retrieval.

What are the levels of autonomy in AI agents?

We propose a six-point scale for the level of autonomy of AI agents – from Level 0 (No autonomy) to Level 5 (Full autonomy). This is modeled after the well-established autonomy levels of autonomous vehicles, as well as the autonomy levels of autonomous networks in telecom as defined by TM Forum – a global telecom industry association.

Levels of autonomy in AI agents

Maturity level	Capabilities	Human involvement
Level 0: No agent involvement	No additional capabilities	Fully handled by humans
Level 1: AI-assisted (automation first)	Deterministic systems that always produce identical outputs, given identical inputs	High human involvement; AI assists with predefined workflows
Level 2: AI-augmented decision-making	AI agents support decision-making, provide recommendations, and enhance workflows	Retains human control; AI aids in optimizing insights and processes
Level 3: AI-integrated (process-centric AI)	Semi-autonomous AI agents handle complex tasks	Human delegates authority in specific areas to the AI agents but is actively involved in management
Level 4: Independent operation (multi-agent AI teams)	AI agents coordinate tasks and make decisions to execute processes within strategic boundaries and escalate when needed	Human delegates authority to AI agents, and the AI agents escalate to the human when it requires intervention
Level 5: Fully autonomous (self-evolving systems)	Fully autonomous execution of processes towards a specified goal within the defined scope	Human fully delegates execution authority to the AI agent, the only expected involvement by humans is for goal setting and monitoring, compliance and strategic governance

Source: Capgemini Research Institute analysis.

01 By 2028 AI agents could generate $450 billion

Our survey and analysis reveals that AI agents could generate around $450 billion in total economic value in the 14 countries surveyed by 2028.

- This includes both revenue uplift and cost savings driven by implementation of semi- to fully autonomous AI agents (Level 3 or higher autonomy). Figure 3 highlights several areas that will see these benefits.
- We assume that organizations with scaled implementation of AI agents will realize 50% of potential benefits and the remaining organizations will realize 10% of potential benefits.[11]
- Organizations with scaled implementation are projected to generate around $382 million (2.5% of annual revenue) on average over the next three years, while we expect others to generate around $76 million (0.5% of annual revenue). This applies to an average organization with $15 billion in annual revenues.
- We expect that surveyed organizations will collectively achieve $19 billion in gains over the next 12 months, with this figure projected to increase to $92 billion by the third year.
- If all organizations in the countries surveyed, regardless of level of implementation, achieve the anticipated benefits, they could unlock economic value of $3.6 trillion by 2028.

Over three in five organizations surveyed believe that agentic AI has transformative potential. A substantial 93% anticipate that organizations that have successfully scaled the implementation of AI agents within the next 12 months will achieve a competitive advantage.

93%

believe that organizations that have successfully scaled AI agents within the next 12 months will achieve a competitive advantage

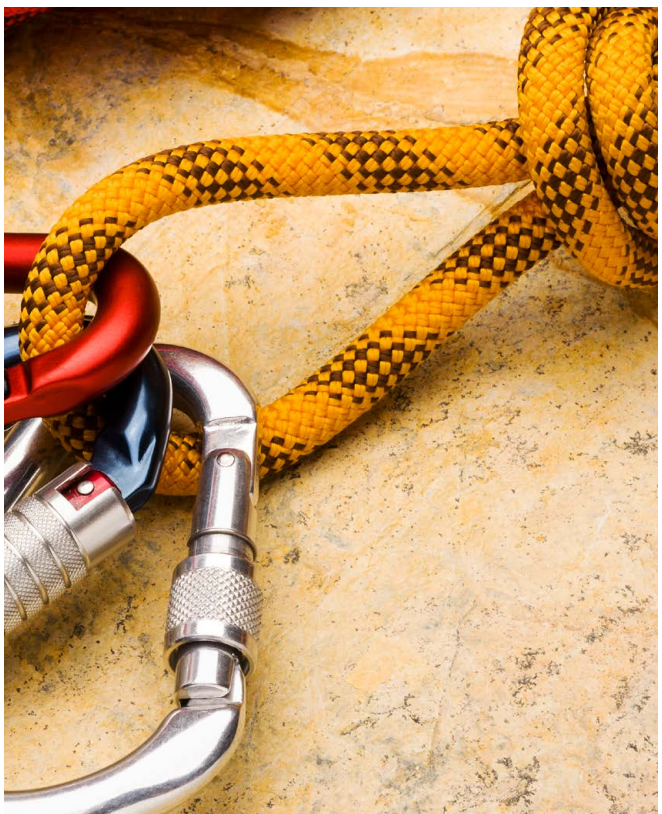
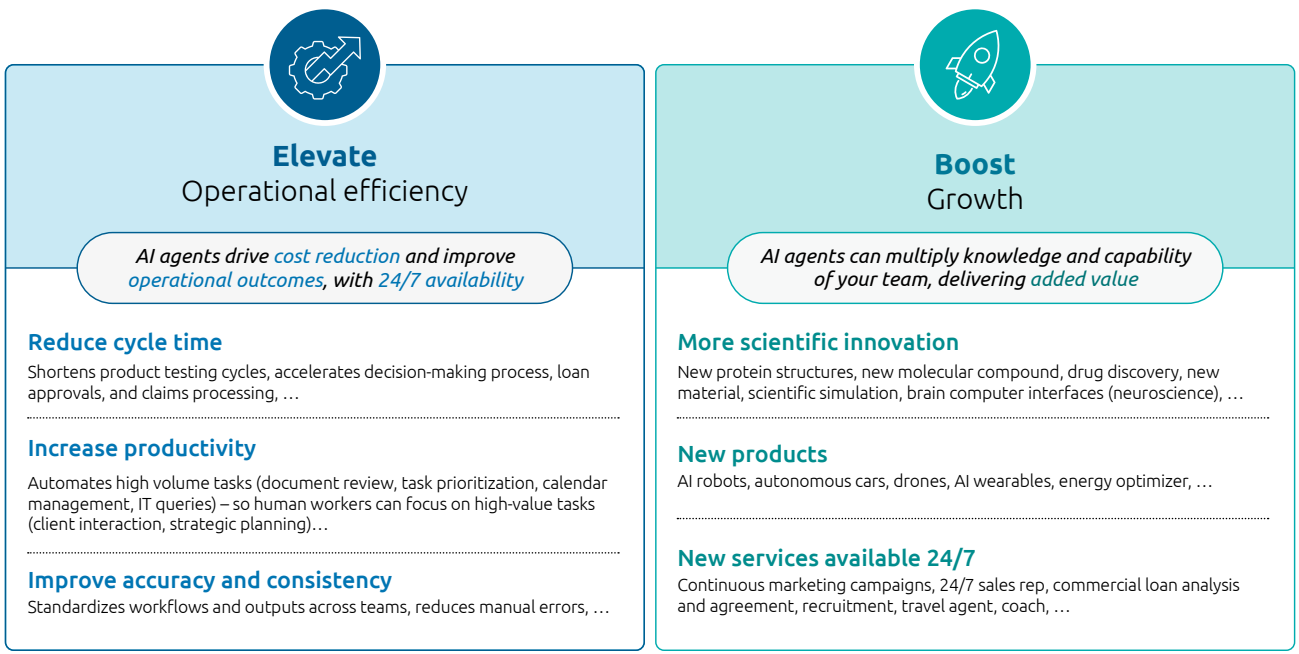


Figure 3.
Agentic AI drives cost savings and revenue uplift



Source: Capgemini Research Institute analysis.

Joji Philip, Director, AI/ML Products at Ericsson, says, *"AI agents hold immense promise, but we're still in the early innings. Conservatively, we expect around 10% efficiency gains, with optimistic projections reaching 25% – but large-scale validation is yet to come."*

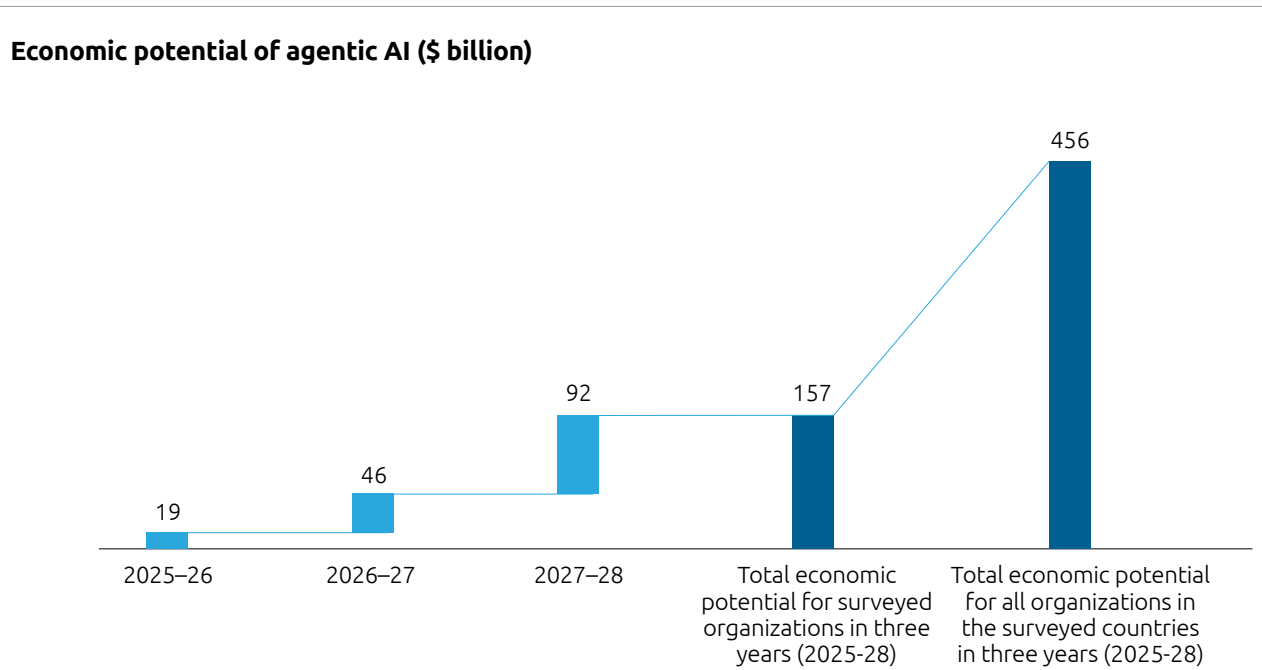
Eric Pace, Head of AI at Cox Communication, says, *"We are beginning to see measurable efficiency gains with AI agents delivering a 30% or more improvement in structured processes. For less standardized processes, though, the impact varies widely, depending on the complexity of the work and how effectively users engage with the technology."*

To put our economic value estimate in context, we benchmark it against estimates from several leading organizations:

- Goldman Sachs predicts that Gen AI will drive a 6.1% rise in US GDP over the next decade.[12] By 2028, this translates to around $540 billion in the US.
- IDC forecasts that AI technologies overall will influence 3.5% of global GDP by 2030.[13] By 2028, this implies an impact of around $1.9 trillion globally. This encompasses all AI technologies, including agentic AI.
- MIT research estimates that a combination of AI capabilities could automate around one-fifth (slightly over 20%) of value-added tasks.[14] This compares well with our estimate that, 20% of all processes on average will be automated by AI agents at Level 3 or higher autonomy over the next three years.

While estimates of AI's economic value vary significantly, there is general agreement that agentic AI will have significant impact.

Figure 4.
AI agents present a $450 billion opportunity



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 organizations; Capgemini Research Institute analysis.

The CIO/chief data and digital officer at a US consumer health organization says: *"AI agents have led to a 10–12% improvement in productivity, saving around 10 minutes per hour worked."*

61%

of organizations believe that agentic AI has transformative potential

"We are beginning to see measurable efficiency gains with AI agents delivering a 30% or more improvement in structured processes."

Eric Pace
Head of AI,
Cox Communication

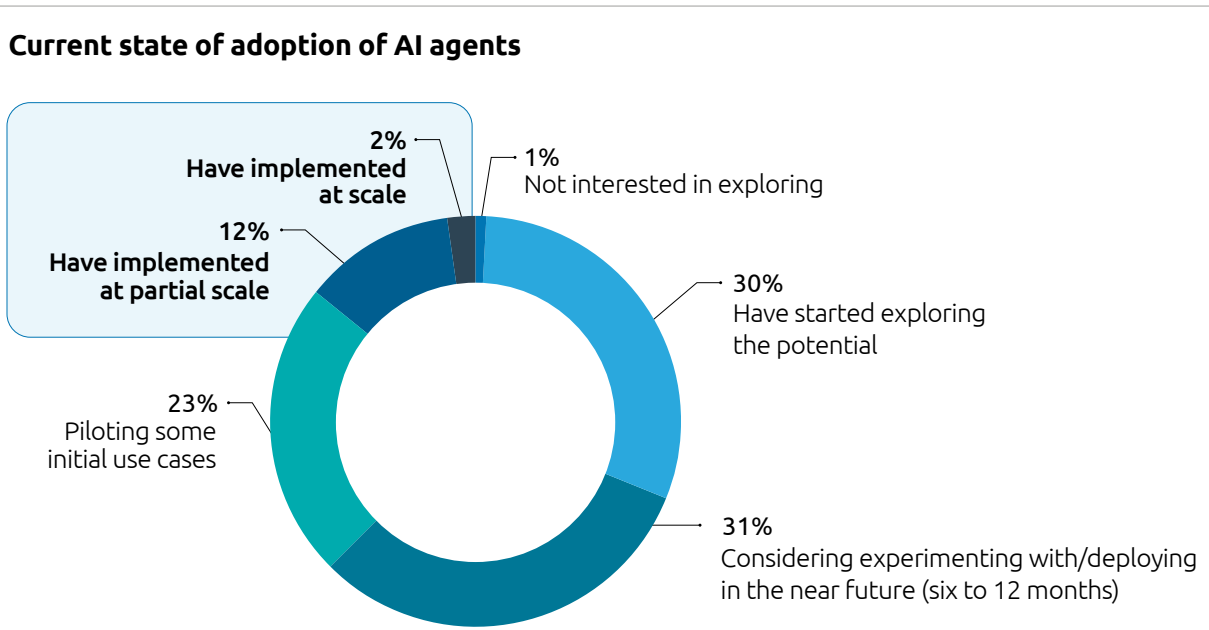
02 Adoption is underway but organizations don't expect high autonomy

More than one in three organizations are piloting or implementing AI agents

Currently, 23% of organizations have initiated AI agent pilot projects, while 14% have progressed to partial or full-scale implementation. About 30% are exploring AI agents, and another 31% are preparing for experimentation or deployment within the next six to 12 months. To verify the data, we reconfirmed the adoption level of agentic AI with a majority of survey respondents (900 out of 1500); we checked that they were referring specifically to AI agents, rather than AI/Gen AI assistants. This exercise showed similar results as the original survey, confirming strong adoption numbers globally and across sectors. More on this below.

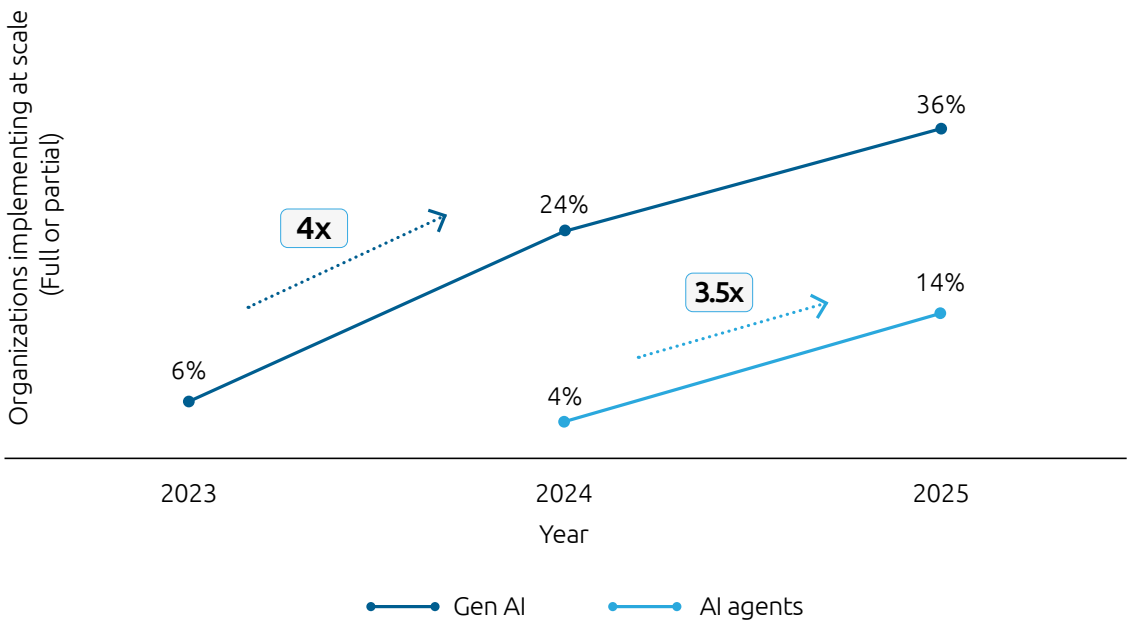
Last year (May–June 2024), 10% of organizations in our research were using AI agents, signaling a leap of nearly 3.5x in a year. Analysis of data on generative AI adoption from our yearly research shows a similar pattern – at-scale deployments of Gen AI surged from 6% in 2023 to 24% in 2024 (see Figure 6).[15]

Figure 5.
14% of organizations are already deploying AI agents partially or at scale



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,522 executives from corporate and data/AI functions.
Question asked: Which of the following statement best describes the current state of adoption of AI agents in your organization? Select one.
Note: "Partially scaled implementation" refers to the phase following a successful pilot stage, where several AI agents are available to a select group of users within a specific function, unit, or location. "At scale" refers to the phase following a successful partial scaling, where several AI agents are generally available within a function or where multiple functions have agents that are generally available.

Figure 6.
The pace of AI agent adoption mirrors the rapid trajectory seen with generative AI



Source: Capgemini Research Institute, Generative AI executive survey, April 2023, N = 800 organizations; Generative AI executive survey, May–June 2024, N = 940 organizations; Agentic AI, April 2025, N = 1,500 organizations.
*The 2024 data for AI agents' "usage" stood at 10%. Assuming that "usage" includes organizations piloting and scaling AI agents, and that their share in the population remains the same, we estimate that nearly 4% of organizations were scaling agentic AI in 2024.

A CIO at a US consumer health organization mentions: *"We have around 70 simple agents working on specific processes. For example, agents that automate expense report approvals, analyze bills and receipts, monitor inventory and trigger replenishment, etc. The company started implementation a year ago and has realized several early benefits."*

Ericsson is pioneering a new prototype agent called "talk to your network" (TTYN), which uses agentic AI to transform how communication service providers (CSPs) interact with their networks. AI agents can understand goals, predict needs, and solve problems autonomously. They also enable natural language interactions with telecom infrastructure.[16]

Siemens is pivoting toward autonomous, orchestrated AI agents in its industrial automation. The organization has developed an orchestrator that acts like a digital craftsman, deploying a toolbox of specialized agents to solve complex tasks across the industrial value chain. These agents can understand user intent, learn continuously, collaborate with other agents (Siemens and third-party), and access external tools autonomously[17] .

The pace of AI agent adoption mirrors the rapid trajectory seen with generative AI

Lynn Comp, Head of Global Sales and GTM (AI Center of Excellence) at Intel, says: *"AI agents represent a shift from relying solely on LLMs [large language models] to using a variety of specialized models for different tasks. AI has been a mature field for decades, with various modes such as data analytics, machine learning [ML], and deep learning. Now, AI agents can integrate models to provide optimal solutions."*

Anna Kopp, Digital Lead Germany at Microsoft, says: *"We have two types of agents: those built by specialists, which users can access in Copilot and those created by users themselves. We currently have multiple pre-built agents. Examples include agents for tech support, employee self-service, sales and agents as writing coach, travel planner, etc."*

We followed up with survey respondents to confirm whether they were referring specifically to AI agents, rather than AI/Gen AI assistants. As shown in the table to the right, adoption numbers appear consistent.

Current state of implementation of AI agents	April 2025	May 2025 (recontacted)
Not interested in exploring	1%	0%
Have started exploring	30%	29%
Considering experimenting with/deploying in six to 12 months	31%	31%
Piloting initial use cases	**23%**	**25%**
Partially scaled implementation	**12%**	**13%**
Fully scaled implementation	**2%**	**2%**
Sample size	1,500	901

Discussions with clients and industry experts sheds more light on the nuances of agentic AI adoption: Many organizations that claim to be implementing AI agents are deploying solutions with limited autonomy. As many as 85% of business processes are expected to be at low levels of autonomy in the next 12 months (see Figure 11). These systems operate with a high level of human involvement and oversight and are still largely supporting predefined workflows, rather than acting independently. In essence, these AI agents are slightly more advanced versions of AI/Gen AI assistants (such as ChatGPT or Microsoft Copilot), focused on tasks including content summarization, document review, and code generation.

14%

of organizations have progressed to partial or full-scale implementation

"Many still assume AI agents must be fully autonomous to create value – but in reality, they operate with varying levels of autonomy, interacting with humans and systems to automate tasks iteratively. We need to recognize AI agents as part of the team, not a replacement for it."

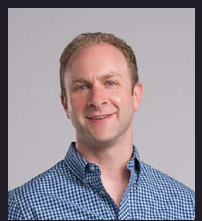
Niraj Parihar
CEO, Insights and Data Global Business Line,
Capgemini

The table below summarizes the top processes from some of the industries with high potential for agentic AI:

Sector	Top three processes where organizations see high potential to implement AI agents	Industry examples
 Automotive	• Agents that monitor and improve autonomous and human-driven performance • Analyze vehicle performance in diverse urban, weather, and traffic conditions • Provide AI-powered customer experiences tailored to individual preferences	**Mercedes-Benz** is one of the first automakers to adopt Google Cloud's newly launched Automotive AI Agent, integrating it into their vehicles through the MBUX Virtual Assistant system. Powered by Gemini and Vertex AI, the intelligent agent is designed to facilitate natural, multimodal, and multilingual interactions, significantly elevating the in-car user experience.[18] **Rolls-Royce** is using ServiceNow's AI Agent Orchestrator to coordinate multiple specialized AI agents to work together toward a common business goal. This orchestration would allow for end-to-end automation of complex workflows across departments such as IT, HR, and customer service.[19]
 Financial services	• Fraud alert agents that validate fraudulent activity and manage responses • Agents to monitor client portfolios in real time • Offer personalized investment strategies	**Capital One** has deployed a concierge AI agent for its car-dealership clients to help consumers obtain information on cars and book test rides.[20] **ANZ Bank** is investigating the use of agentic AI to automate repetitive tasks, assist in complex decision-making, and integrate with existing systems to improve efficiency, and deliver more personalized services. [21]
 Retail	• Agents that provide personalized shopping recommendations • Optimize dynamic pricing • Monitor inventory in stores and warehouses to forecast demand and automate stock keeping unit (SKU) replenishment	**Walmart** is preparing to introduce AI-powered shopping agents that act as personalized digital assistants for customers, offering product discovery and recommendations, cart management, order tracking, and reordering frequently purchased items, etc.[22]

Sector	Top three processes where organizations see high potential to implement AI agents	Industry examples
Life sciences	• Drug discovery and development • Clinical trial optimization • Regulatory submissions • Lab automation and experiment planning	**NVIDIA** partnered with **Novo Nordisk** and the Danish Centre for AI Innovation (DCAI) to accelerate drug discovery through AI technologies. This collaboration leverages the Gefion AI supercomputer, operated by DCAI and powered by NVIDIA's DGX SuperPOD, to create an AI factory capable of running large-scale drug discovery and agentic AI workloads. Novo Nordisk will utilize NVIDIA's platforms for agentic workflows and to develop custom AI models that enhance early-stage research and clinical development.[23]
Telecom	• Customer service automation • Network optimization • Data-driven insights for customer behavior analysis and fraud detection • Process automation • Manage the complexity of 5G networks	**SK Telecom** is positioning its AI agent Aster (A*) as a cornerstone of future telecom innovation. Aster is designed to be proactive and context-aware, capable of anticipating user needs and assisting with everyday tasks such as suggesting recipes, managing schedules, and even helping with shopping lists.[24]

62% prefer to partner with solution providers, such as Salesforce, SAP, and ServiceNow, and system integrators to implement or tailor already available AI agents



Discussion with

Jason Gelman
Director of Product Management – Vertex AI, Google Cloud

What are your views on the adoption of AI agents and bridging the gap between experimentation and production?

"There are significant challenges in taking agentic AI to production but all major AI providers are converging on the development of reasoning-capable agents, signaling that the ecosystem is maturing. Google has released an Agent Development Kit, and there are major advancements in reasoning models and tool integration, such as Gemini 2.5 Pro and Flash, which now enable faster, more capable agents."

What is your perspective on improving reliability and safety of AI models?

"While humans are about 97% accurate in data-extraction tasks, AI is now approaching a similar level. However, users expect AI to be nearly infallible. Techniques such as retrieval-augmented generation (RAG) and controlled-context windows reduce hallucinations by anchoring model responses in verified data."

What do you think about the growing importance of open-source models in the industry?

"The industry is moving toward a mixed landscape, where both open and closed models coexist. Although open-source models offer flexibility, they often come with significant operational overheads, including hardware setup, driver management, and ongoing maintenance, making them impractical for many organizations. As models become smaller and more efficient, on-device AI will grow, further supporting open-source adoption in specific contexts. However, for cloud-based workloads, proprietary models still dominate in performance, reliability, and total cost of ownership [TCO]."

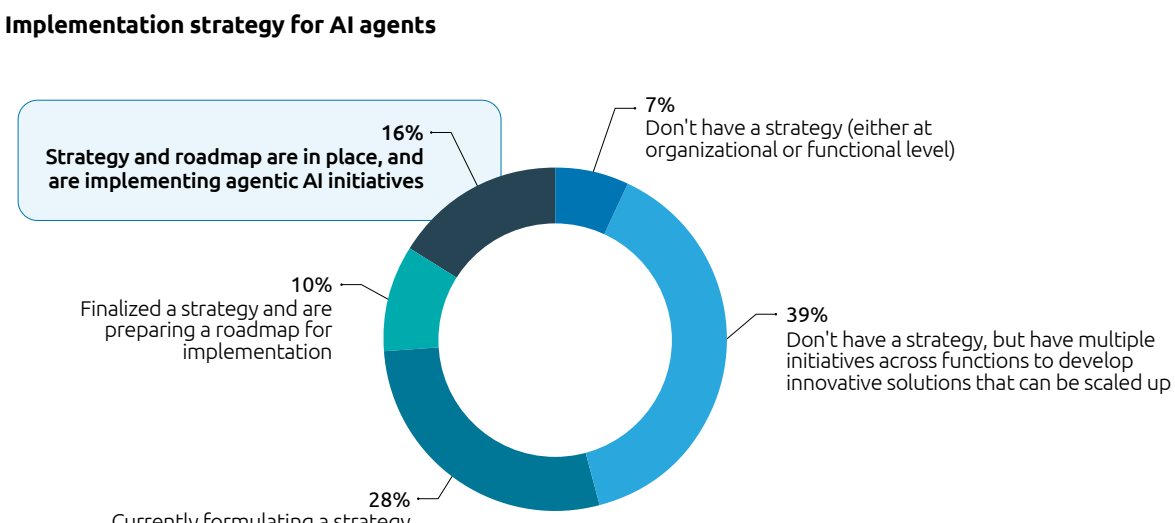
Our survey found that 16% of organizations have developed a strategy and roadmap to implement agentic AI (see Figure 7). Our survey did not explicitly ask whether these strategies (see Figure 7) were enterprise-wide, function-specific, or part of the organization's data and AI strategy. As a result, the share of organizations with a group-wide or integrated AI agent strategy is likely lower than reported.business objectives."

Organizations with an existing or developing strategy emphasize the following aspects of their strategic focus:

- Establish clear business cases and criteria for AI agent deployment
- Define appropriate levels of autonomy and decision-making frameworks for AI agents
- Ensure robust data management and protection practices
- Plan for scalability and expansion across business functions
- Implement performance monitoring and optimization.

The need for dedicated leadership to oversee AI agent initiatives is also a priority, with 26% appointing new leaders specifically for AI agents and 59% delegating this responsibility to existing AI or Gen AI leadership.

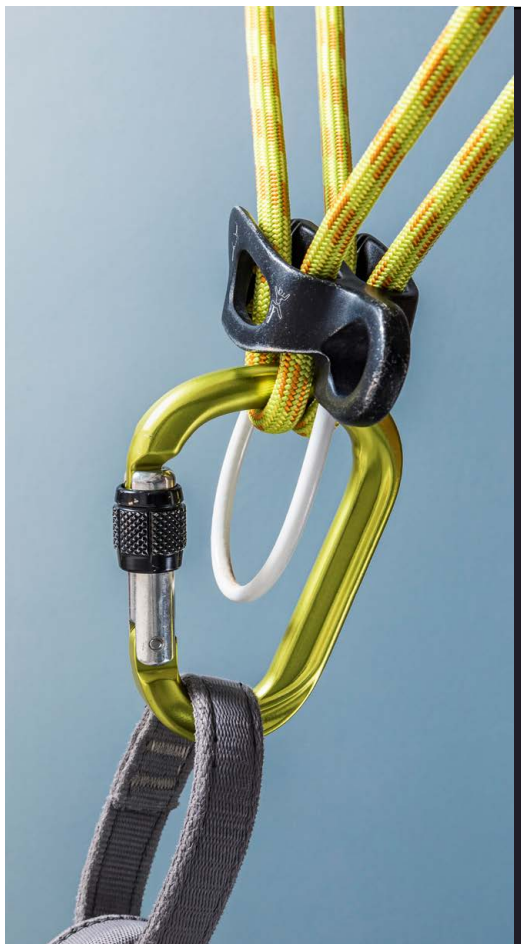
Figure 7.
Fewer than one in five organizations have a strategy and roadmap for implementing AI agents



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: Does your organization have a strategy and a roadmap dedicated to the implementation of AI agents/agentic AI? Select one.

"AI agents represent a shift from relying solely on LLMs [large language models] to using a variety of specialized models for different tasks."

Lynn Comp
Head of Global Sales and GTM (AI Center of Excellence),
Intel



Majority of organizations prefer partnerships with solution providers to deploy AI agents

Most (62%) prefer to partner with solution providers, such as Salesforce, SAP, and ServiceNow, and system integrators to implement or tailor AI agents that are already available as part of those product suites. The ready availability of in-built agents, pre-existing integrations with legacy systems, and fluency of staff to use these tools likely contribute to the preference.

The hybrid approach is the second-most preferred method, combining in-house development with external solutions to balance customization and scalability. One-third (33%) also prefer to develop proprietary AI agents. Criticality of processes, convenience, ease of integration with existing platforms, associated costs, and compliance all influence the decision of whether to build or buy. Using a combination of off-the-shelf agents, custom AI agents tailored to specific processes, and embedded agents integrated into existing platforms offers flexibility, optimized performance, and scalability.[34] Prior to forming partnerships, organizations should thoroughly evaluate the vendor's data sourcing, management practices, security protocols, and adherence to industry standards to avoid legal issues.

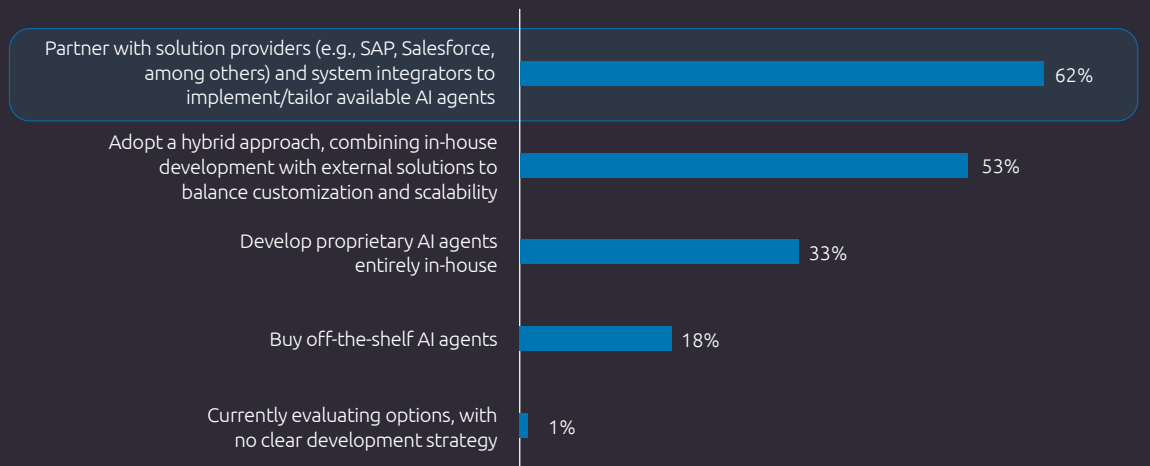
PepsiCo is accelerating its digital transformation by integrating Salesforce's Agentforce, a platform of autonomous AI agents, into its global operations. PepsiCo will utilize AI agents to streamline critical operations, elevate customer service, and boost efficiency thereby enabling sales teams to concentrate on strategic growth and build stronger relationships with retailers. This collaboration will allow PepsiCo to streamline GTM and B2B processes and elevate customer service through harmonized data and intelligent AI agents.[35]

Cisco has partnered with Mistral AI, an AI model developer, to enhance its customer experience (CX) offering through agentic AI capabilities. This partnership intends to embed AI agents into Cisco's collaboration and contact-center solutions. By using Mistral's open-weight LLMs, Cisco could enable real-time, intelligent interactions between businesses and their customers.[36]

Honeywell and Google Cloud have partnered to address labor shortages and upskill workers in the industrial sector. Honeywell's Internet of Things (IoT) platform, Honeywell Forge, will be integrated with Google Cloud's Gemini AI on Vertex AI, enabling AI agents to connect with industrial assets, people, and processes. These agents will assist engineers and technicians by automating tasks, speeding up maintenance, and reducing project design cycles, and will harness multimodal capabilities to process text, images, video, and sensor data. [37]

Figure 8.
Three in five organizations are looking to partner with solution providers and system integrators to implementor tailor available AI agents

Organizations' build vs. buy preferences for agentic solutions



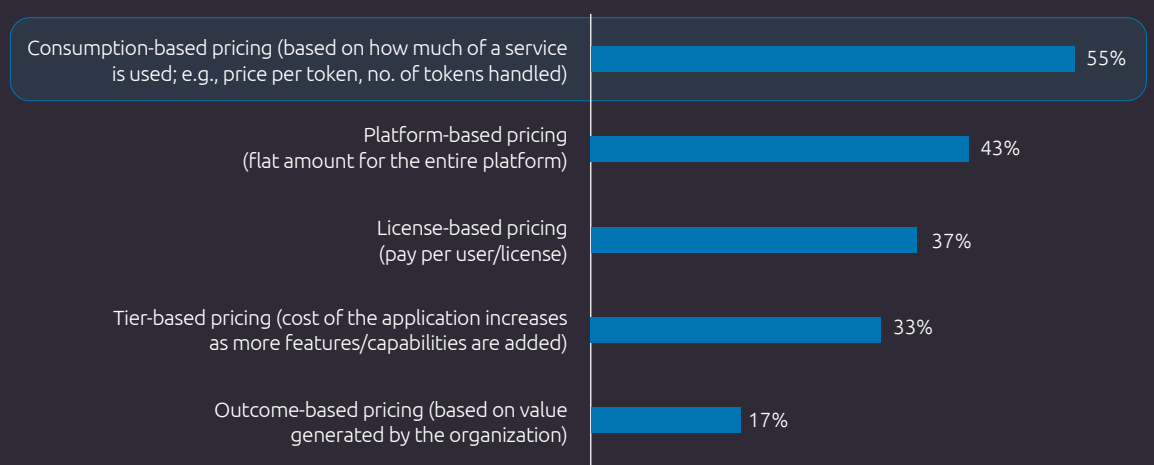
Source: Capgemini Research Institute, Agentic AI, April 2025, N = 900 executives from data/AI functions.
Question asked: What is your organization's current build vs. buy strategy for implementing agentic AI solutions? Respondents were allowed to select multiple options.

Lynn Comp, Head of Global Sales and GTM (AI Center of Excellence) at Intel explains: ***"Large enterprises, particularly in regulated industries, are cautious, preferring to develop AI agents internally, rather than relying on third-party solutions. Since most AI agent platforms are still evolving, organizations prefer internal control until the market matures."***

Most (88%) data/AI executives express a preference for utilizing these models in low-risk use cases that have lower runtime costs but offer similar performance. However, nearly half (49%) highlight that these models lack the capability to address legal, regulatory, and privacy concerns. A further 38% adopt a neutral stance. Approaching half (45%) of Europe-based executives indicate that they would consider non-European solutions, provided they are hosted on Europe-based servers and all data is stored within Europe.

Consumption-based, platform-based, and license-based models are the preferred pricing models among organizations for agentic AI solutions.

Figure 9.
Over half of organizations prefer consumption-based pricing for AI models within AI agents



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 834 from data/AI executives whose organizations prefer to buy agents or partner with solution providers to tailor AI agents.

Question asked: What kind of pricing model would your organization prefer for agentic AI solutions? Respondents were allowed to select multiple options.

"This wave of transformation is not about adding AI agents to workflows – it's about shifting from isolated use cases to end-to-end processes and rethinking workflows entirely."

Mark Oost
Vice President, AI and Generative AI Group Offer Lead,
Capgemini

Customer service, IT, and sales could see greater adoption of AI agents

Customer services and support, IT, and sales are the functions where most executives predict that AI agents will be actively performing at least one process or sub-process daily within the next 12 months. These functions often involve high volumes of interaction, require responsiveness over precision, and depend on contextual, conversational engagement. As a result, they operate effectively with non-deterministic, probabilistic agents that are context-aware and highly adaptable.

The use of AI agents is expanding to operations, product design, R&D, marketing, and finance, with expectations of performing at least one process or sub-process daily within the next one to three years.

Dr. Suraj Srinivasan Philip J. Stomberg Professor of Business Administration and Chair of the MBA Elective Curriculum, Harvard Business School, explains: *"The fastest wins are in functions where processes are well-defined and outcomes are known and measurable, like customer service and sales. AI agents will also enhance creative processes. In inherently creative functions like marketing, AI agents can simulate synthetic personas, which, when validated with real user data, can effectively mirror real people. In R&D, agents can help design and test product prototypes, create new molecular structures, and accelerate pace of innovation."*

The chief AI officer at a multinational engineering organization says: *"Our AI agents are evolving along two key paths: externally, as intelligent advisors helping technicians navigate complex machine manuals and perform actions; and internally, transforming from simple HR chatbots into proactive assistants that handle tasks such as leave approvals and workflow automation."*

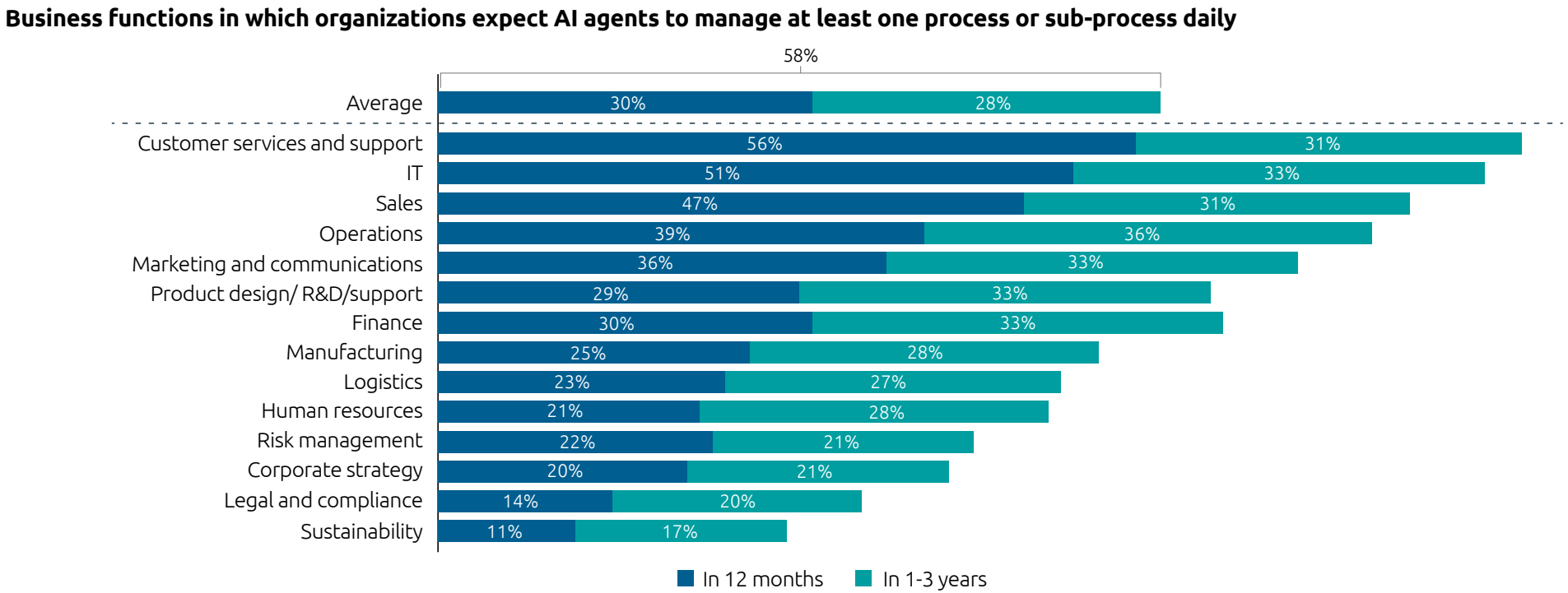
Google launched Project Mariner, an advanced AI web-browsing agent developed by DeepMind that can buy tickets, order groceries, or fill out forms on the internet. By engaging in a conversation with the AI, users can delegate these tasks entirely to it.[38]

Crédit Agricole Bank Polska partnered with Deviniti to enhance customer service efficiency by deploying an AI agent. The agent performed smart classification, emotional tone detection, automated responses, and workflow automation. As a result, the bank achieved a 50% reduction in document-processing time; saved over 750 hours per month; improved customer satisfaction and team morale; and accelerated the resolution of complex cases.[39]

"The fastest wins are in functions where processes are well-defined and outcomes are known and measurable, like customer service and sales. AI agents will also enhance creative processes."

Dr. Suraj Srinivasan
Philip J. Stomberg Professor of Business Administration and Chair of the MBA Elective Curriculum, Harvard Business School

Figure 10.
Within the next three years, a large majority of organizations will have AI agents deployed in customer service, IT, and sales



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.

Question asked: Which functions will have one or more AI agents actively performing at least one or more processes / sub-processes on a daily basis?

Vishal Singhvi, Director, Strategic Initiatives (Gen AI) at Microsoft, says: *"We see AI adoption unfolding in four phases. First, organizations focus on internal productivity by automating simple tasks with Gen AI. Next comes enhancing CX through personalized, AI-powered interactions. The third phase is where agentic AI automates workflows, with or without human oversight. The final phase – still a couple of years away – is the move toward scalable, general-purpose AI across the enterprise."*

Susan Emerson, Senior VP, AI Product at Salesforce, says: *"Across industries, agentic AI is moving the opportunity beyond productivity gains to fundamentally reinventing core business processes to deliver measurable impact, transformed customer experiences, and new operating models."*

58%

of business functions are likely to have AI agents handling at least one process or sub-process daily within 3 years

Organizations don't expect high levels of autonomy

Over the next 12 months, we expect AI agents with Level 3 autonomy or higher to manage 15% of processes and sub-processes in each business function. This will rise to 25% within the next one to three years. Fully autonomous AI agents (Level 5) are expected to handle around 4% of business processes within three years. This level of autonomy may apply to majorly well-scoped processes. While an in-process human-in-the-loop may not be present in these cases, strategic oversight is maintained through clearly defined goals, scope of execution, and robust technological guardrails to ensure safe and reliable execution.

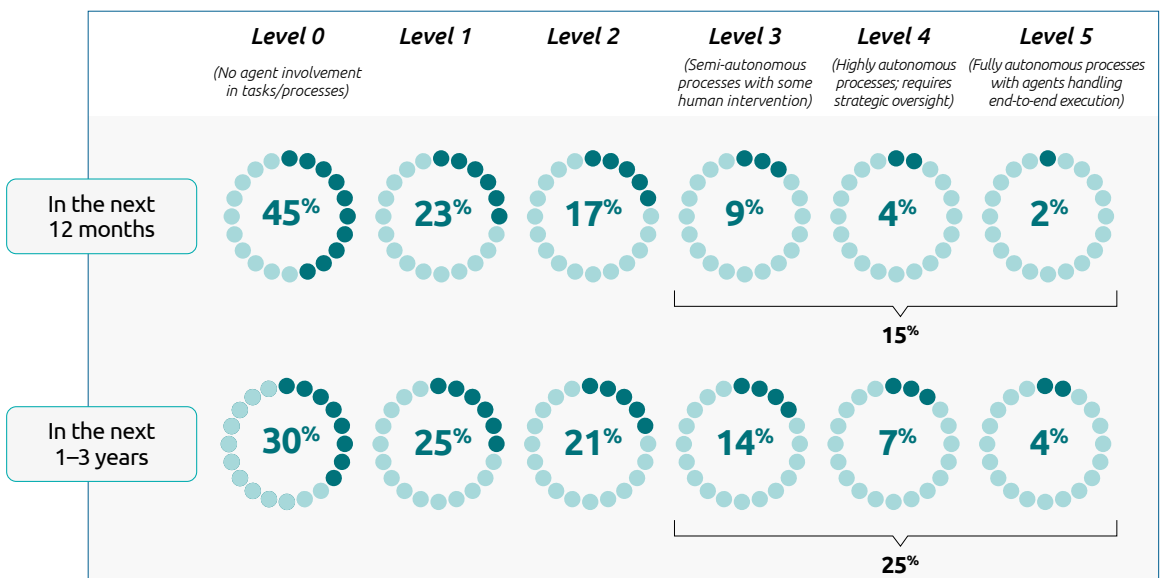
Organizations do not foresee a significant increase in the autonomy of AI agents. While organizations are not prioritizing full autonomy, AI agents can still deliver significant value at intermediate levels of autonomy. As a result, in the next 12 months, we expect AI agents to make 6% of day-to-day decisions, increasing to 8% in one to three years.

Joji Philip, Director, AI/ML Products at Ericsson, says: *"AI agents are undeniably accelerating the telecom sector's journey toward higher levels of network autonomy. Based on our prototypes and proofs of concept [PoC], we foresee it reaching Level 3 or 4 autonomy within the next two to three years. While full autonomy (L5) may still require caution due to the critical nature of communication networks, the trajectory is clear."*

Susan Emerson, Senior VP, AI Product at Salesforce, says, *"Trust in agentic AI grows through experience. By starting with human-in-the-loop models and observing consistent accuracy, transparency, and adherence to guardrails and instructions, organizations built the confidence to embrace higher levels of autonomy for both internal employee and external customer experiences."*

Eric Pace, Head of AI at Cox Communication, says, *"We're taking a measured approach to AI autonomy. While fully autonomous agents hold promise, they're not yet in production at scale due to ongoing concerns around trust, process, and system maturity. For now, most of our advanced agentic systems remain in pilot or proof-of-concept stages, with broader deployment planned as our confidence and capabilities continue to grow."*

Figure 11.
By 2028, one-quarter of business processes will be handled by AI agents with Level 3 or higher autonomy



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 600 executives from corporate functions.
Question asked: How would you prefer to allocate tasks/processes within your business function in a human-agent team in terms of autonomy?
*Figures may not sum to 100% due to rounding.

A risk director at a large, global banking group says: *"Today, AI agents are adept at handling basic Level 1 and Level 2 queries. Soon, they'll take on Level 3 interactions, such as fraud detection. Long-term, we envision AI agents becoming capable of managing even the most serious customer issues autonomously."*

Much like autonomous vehicles or networks, moving to high/full autonomy (L4/L5) could be challenged by various factors, including ethical, attitudinal, and regulatory issues. We explore this in the following chapters.

25%

of processes within a business function are expected to be handled by AI agents with Level 3 or higher autonomy by 2028

The table below summarizes the top processes from some of the corporate functions with high potential for agentic AI:

Function	Top three processes where organizations see high potential to implement AI agents	Industry examples
 Corporate strategy	• Market and competitive intelligence • Scenario planning and decision-tree analysis • Devising strategy and roadmap	• **BlackRock** has launched an AI platform named Asimov, marking a major step in integrating AI agents into its core investment strategy and market intelligence operations. Asimov is already operational within BlackRock's fundamental equity division and is leveraged for real-time market analysis, competitor intelligence and scenario modeling.[25] • **Azumo** builds autonomous agents that assist in strategic planning, workflow automation, and cross-functional decision-making.[26]
 Financial services	• Financial planning and budgeting • Fraud detection and compliance auditing • Investment analysis and portfolio management	• **Wells Fargo** has deployed interacting AI agents (some built on open-source frameworks like LangGraph) to re-underwrite 15 years of archived loan documents and automate complex document analysis and compliance checks.[27] • **Wealthfront** uses AI agents to automatically manage portfolio, optimize tax strategies and adjust investments based on user goals.[28]
 Marketing	• Customer service and support • Advertising, promotions, and content marketing • Thought leadership/market research	• **Shopify** is integrating autonomous AI agents across its marketing and operations to reduce human dependency and boost efficiency.[29] • Fintech firms **Robinhood** and **Arta Finance** are using AI agents for investment research, enabling faster analysis of financial data and generation of investment insights.[30]

Function	Top three processes where organizations see high potential to implement AI agents	Industry examples
 Technology/IT/data	• Software code generation and testing • Data management, quality, and reporting • IT infrastructure and cybersecurity	• **Microsoft** has unveiled the GitHub AI Agent, a fully autonomous coding assistant designed to streamline software development. This AI agent can independently execute complex workflows and perform asynchronous code testing.[31] • **World Economic Forum's Centre for Cybersecurity** is working with over 170 partners including those in manufacturing, oil and gas, and energy to deploy agentic AI for cyber resilience. These AI agents autonomously identify vulnerabilities, patch systems, and coordinate across networks to prevent breaches.[32]
 Innovation/R&D/design	• Product design and prototyping • Research and ideation • Product testing and validation	• **PTC Inc. and Microsoft** are collaborating to help manufacturers integrate AI agents across their value chains by developing a multi-agentic model and enterprise data framework within Microsoft Fabric. The agents would autonomously access and analyze data from PLM (Product Lifecycle Management), ERP (Enterprise Resource Planning), and MES (Manufacturing Execution Systems) and generate insights and trigger actions across departments.[33]

Discussion with

Daniel Vassilev
Co-Founder and Co-CEO, Relevance AI (a low-/no-code platform that builds AI agents and multi-agent teams)

What is the potential of AI agents?

"The agentic AI market could be a trillion-dollar opportunity. AI agents resemble human systems more than software systems. Properly trained and implemented, AI agents can achieve human-quality work."

Could you highlight the benefits of integrating AI agents with human oversight?

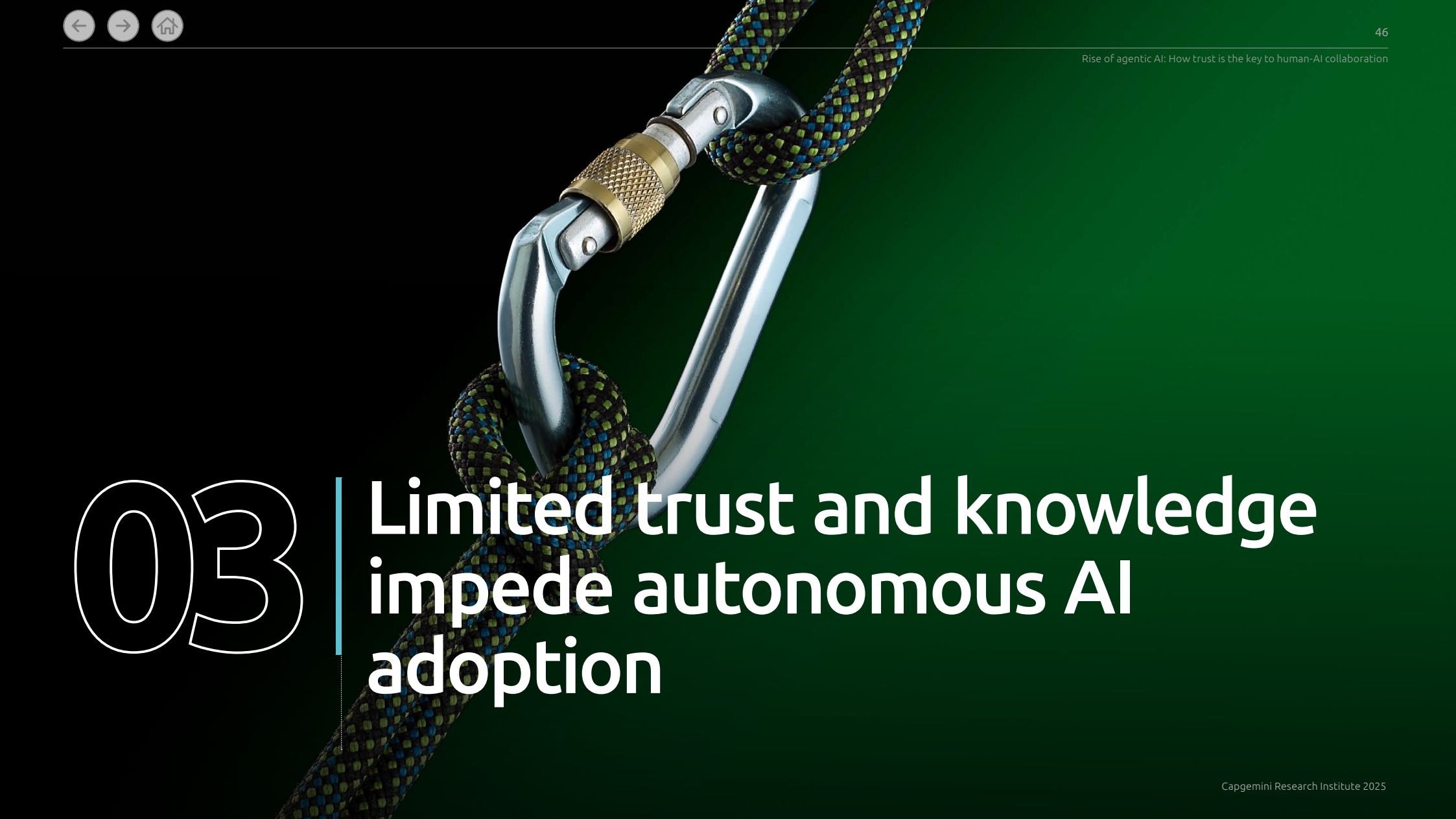
"Approvals, escalations, and collaboration between humans and AI are key to successful deployment. Integrating AI with human workflows drives better outcomes."

How should organizations decide whether to "build" or "buy" AI agents?

"Organizations should buy AI agents for internal process automation to avoid the complexities and overheads of building and maintaining them. They should build AI agents for integrating into their products, using engineering frameworks to avoid vendor lock-in. Building high-performing agents requires significant expertise. Non-technical teams often require approval processes and interfaces, which adds complexity. All agents must be autonomous, capable of making decisions and acting."

What are your views on the potential of AI agents?

"Productivity will no longer be limited by labor availability. AI agents will provide almost unlimited capacity, constrained only by data-center size and energy production."



03 Limited trust and knowledge impede autonomous AI adoption

"Trust is a major hurdle. Businesses need confidence in AI systems before granting them any level of autonomy. One way to build trust is starting with what I call 'read-only' AI implementations, where AI provides recommendations, but humans make all final decisions."

Dr. Walter Sun
SVP, Global Head of AI,
SAP

Trust in AI agents to manage large enterprise use cases is declining

Figure 12 below highlights that, while 23% of organizations report relatively high trust in AI agents, most (60%) do not fully trust AI agents to manage tasks and processes autonomously. These trust levels appear similar to people's trust in self-driving vehicles – a recent study found that 13% of US drivers would trust riding in self-driving vehicles, while 61% still report being afraid more than 54% who feared self-driving cars in 2021.[40] Studies report that those already using AI agents have trust issues: 47% believe they lack emotional intelligence; 40% feel uncomfortable submitting AI-generated work; and 34% consider AI output inferior to manual output.[41]

Stanford's *2025 AI Index Report* highlights that AI is past the experimental stage, yet societal confidence in its safety, fairness, and accountability remains fragile.[42] According to the report, in 2024 there was a three-percentage-point decrease in those who trust organizations using AI to protect their personal data, and a two-percentage-point decrease in respondents' trust that AI systems are unbiased and discrimination-free.

In 2025, Uber drivers have voiced growing frustration and distrust toward AI agents used by the company, particularly in areas like deactivation, job allocation, and customer dispute resolution. Many drivers reported being deactivated without explanation, often based on algorithmic decisions or customer complaints that were not properly investigated. The appeals process, largely handled by in-app chatbots, left drivers feeling powerless and financially vulnerable. 96% of uber drivers said their deactivation was unfair.[43]

Trung Nguyen, Machine Learning Lead at Jira AI, Atlassian, says: ***"Building trustworthy AI agents means looking beyond accuracy by evaluating hallucination rates, factual reliability, and safety in handling sensitive content. Continuous monitoring and user feedback loops are essential, especially when direct access to user data is limited."***

Dr. Walter Sun, SVP, Global Head of AI at SAP, asserts ***"Trust is a major hurdle. Businesses need confidence in AI systems before granting them any level of autonomy. One way to build trust is starting with what I call 'read-only' AI implementations, where AI provides recommendations, but humans make all final decisions."***

Almost half (47%) of organizations in the implementation phase report above average level of trust in AI agents, compared with 37% that are still in the exploration phase.

This strong correlation between trust and implementation confirms that trust plays a crucial role in the adoption of AI agents.

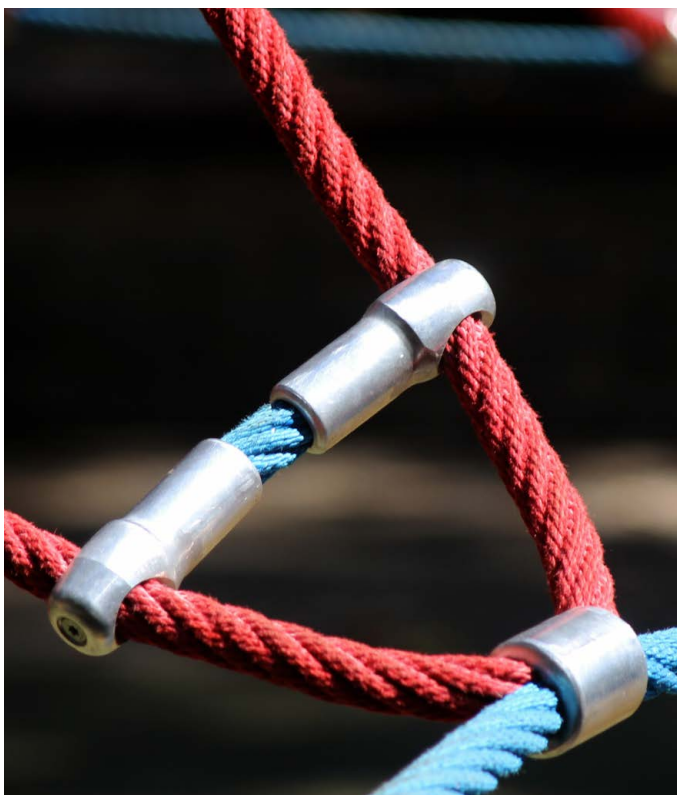
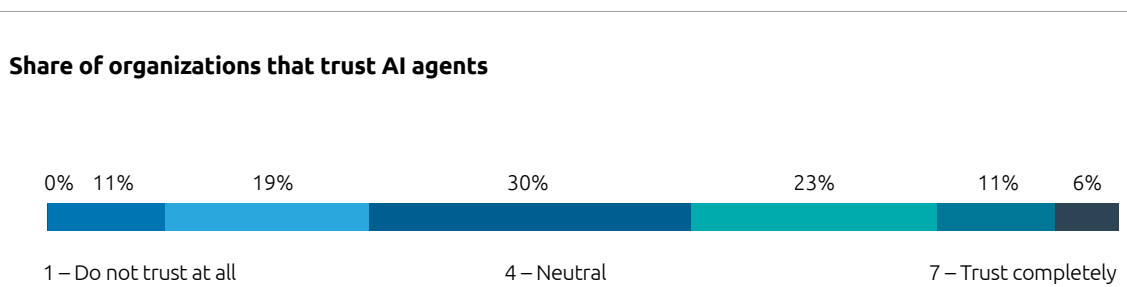


Figure 12.
60% of organizations do not fully trust AI agents



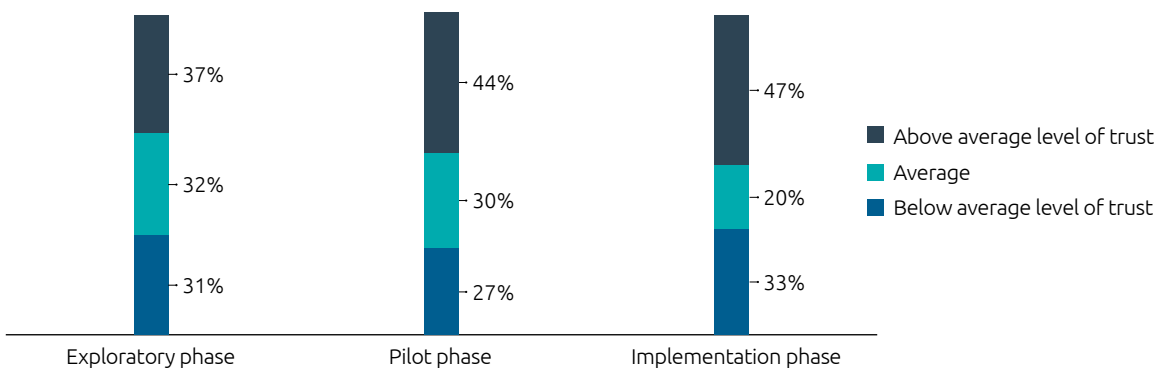
Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: On a scale of 1 to 7, where 1 = "Do not trust at all" and 7 = "Completely trust," please rate your overall trust in AI agents.

"Building trust in AI agents requires more than accuracy. It demands transparency in decision-making, safeguards against unintended behaviors, and clarity on human oversight."

Sergey Patsko
Vice President, Data and AI Group Offer Leader,
Capgemini

Figure 13.
Nearly half of organizations implementing AI agents report above average level of trust in their abilities

Share of organizations with their level of trust in AI agents, by current state of implementation



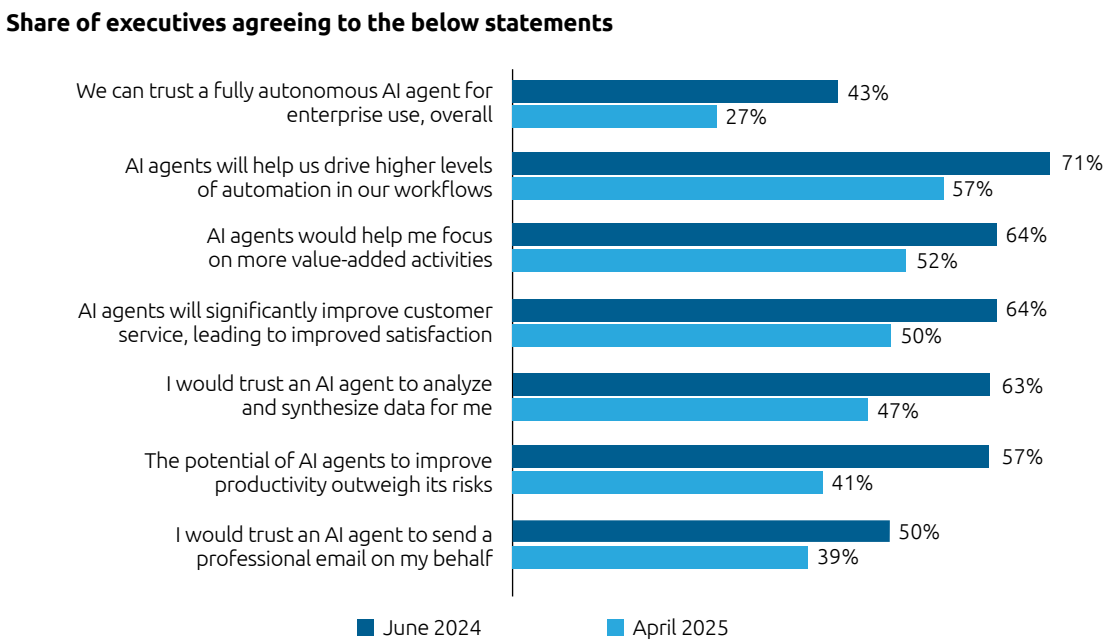
Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Note: Respondents rated their level of trust in AI agents on a scale of 1 to 7. Ratings of 1–3 indicate below average trust, 4 is average, and 5–7 represent above average trust.

Moreover, trust is declining. In 2024, 43% of executives expressed confidence in fully autonomous AI agents for enterprise applications. However, this percentage has decreased to 22% this year. Eroding trust hinders organizations from granting increased control or autonomy to AI agents. Figure 14 shows declining trust levels in agentic AI across actions ranging from sending professional mails to analyzing data. The decline in trust even as agentic AI adoption is increasing hints that this lack of trust is born out of experience rather than out of fear or uncertainty.

22%

of executives trust fully autonomous AI agents for enterprise applications, down from 43% in 2024

Figure 14.
Trust in AI agents has decreased since 2024



Source: Capgemini Research Institute, Generative AI executive survey, May–June 2024, N = 1,031 executives; Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: What are your views on the application of AI agents in your organization? Rate on a scale of 1–7, where 1= strongly disagree and 7= strongly agree, or unsure/don't know.

Organizations are highly concerned about ethical and safety risks – but fail to act

The lack of trust in AI agents is aggravated by ethical and safety concerns, with nearly two in five executives believing that the risks of implementing AI agents outweigh the benefits.

Organizations are acutely aware of risks, including escalating privacy and security concerns; potential for unintentional harm and bias; a lack of transparency in AI decision-making (the AI "black-box" effect); and the desuetude of human skills. These risks all stand against permitting higher levels of autonomy.

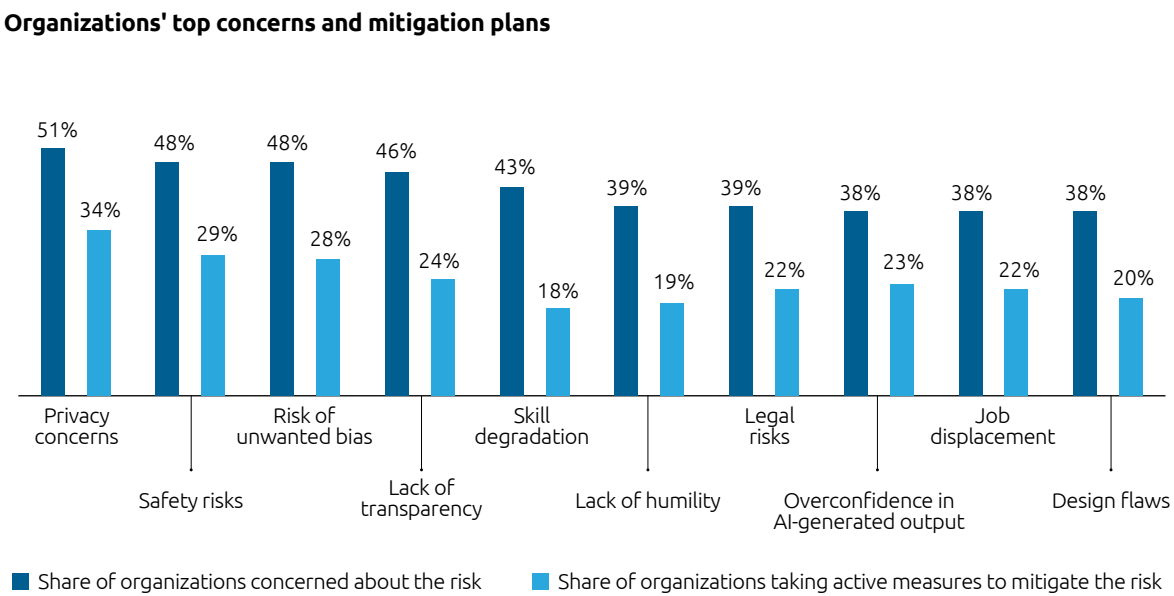
The decline in trust is not limited to AI agents; it extends to AI and Gen AI as well. Since 2023, concerns around Gen AI have either increased or remained constant. Worries about bias in Gen AI affected 68% of organizations in 2024, up from 36% in 2023.[44,45] Despite being aware of these risks, many organizations have yet to mitigate them.

In a recent survey, nearly 48% of respondents expressed concern about the ethical implications of deploying AI agents. Trust and safety remain among the most significant barriers to widespread adoption.[46]

The heightened risk may also arise from a fragmented and inconsistent AI regulatory landscape. There is no standard definition across different jurisdictions. Emerging AI regulations take various legal forms, including statutes, executive orders, and expansions of existing regulatory frameworks. Some are legally binding, while others are not; some are sector-specific while others apply across sectors. Some regulations are enforced, others serve merely as guidelines.[47]

The head of responsible AI and AI strategy at a UK-based retail and commercial bank says: ***"We're still in the experimental phase with agentic AI, and meaningful ROI is likely six to 12 months away. The risks are real, especially the potential for cascading errors if one agent's hallucination is passed to another. In a regulated environment like banking, the implementation of agents demands caution, robust validation, and time."***

Figure 15.
Few organizations are actively mitigating the risk of implementing agentic AI



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions. Question asked: 1. What are the top five primary risks associated while using AI agents? 2. Which of these risks does your organization working on mitigating?

"AI agents should be used to enhance humans' ability to make decisions and take actions, not to replace them. We need to keep humans in meaningful control of AI agents."

Anne-Violaine Monnié

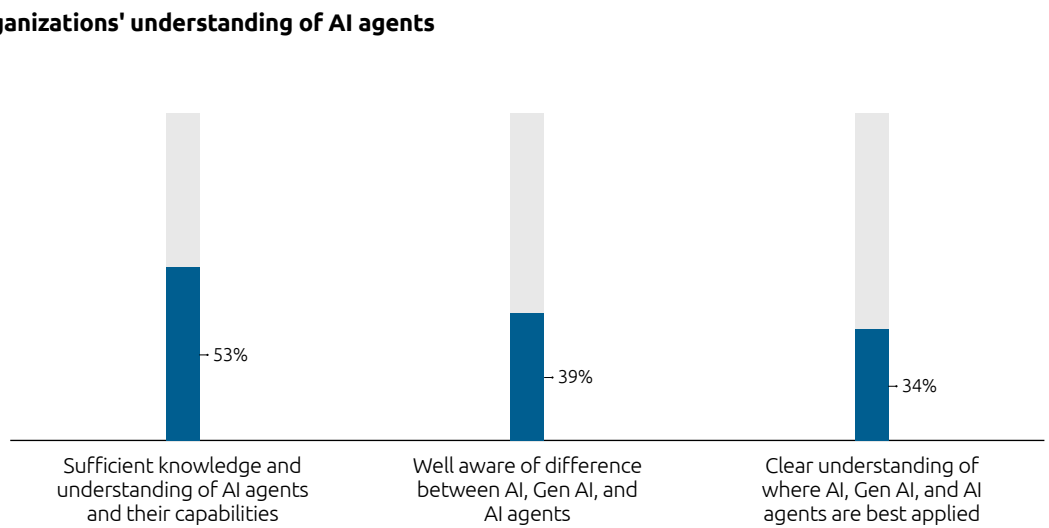
Group AI Ethics Leader,
Capgemini

Half of organizations have insufficient knowledge of the capabilities of AI agents

In addition to declining trust and escalating risk, half of organizations state that gaps in knowledge significantly impede their deployment of highly autonomous agents. Furthermore, only one-third clearly comprehend where AI agents should be preferred to Gen AI, AI/ML, or process automation. This may result in suboptimal deployment and underutilization of the technology.

A chief AI officer at a federal governmental healthcare service says: *"Start by deciding whether you want to build or buy. That determines your investment strategy and talent needs. Don't chase the 'cool' use cases. Focus on small, high-impact wins that deliver real ROI with minimal effort. If you're not ready to invest in top-tier talent, don't settle – go with third-party solutions instead. Success comes from aligning investment, talent, and use case selection with clear business value."*

Figure 16.
Only one-third of organizations understand where to employ AI agents



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.

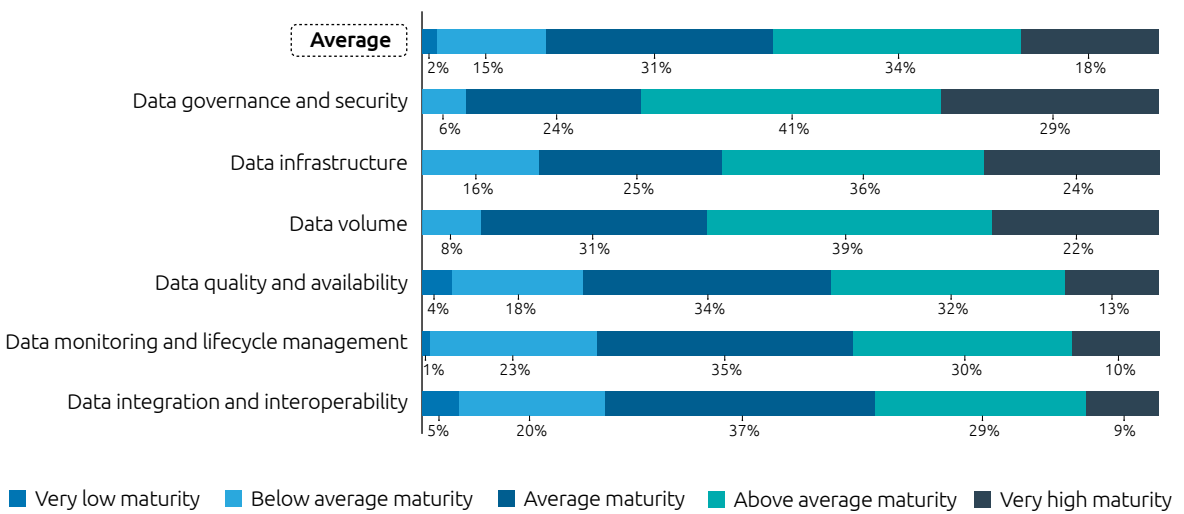
Organizations fall short of technology readiness

Data readiness:

Fewer than one in five organizations report high maturity in any aspect of data-readiness. Only 9% say they are fully prepared in terms of data integration and interoperability, while only 13% report strong readiness in data monitoring and lifecycle management. Similarly, maturity levels are low in data quality, availability, volume, infrastructure, governance, and security. Many organizations still face foundational hurdles to effective AI deployment. Rashmi Shetty, Strategy & Transformation, Digital Technology, Industrial Energy Technology at Baker Hughes says, ***"Agentic AI holds transformational potential—this could be the iPhone moment for artificial intelligence. To seize this opportunity, foundational elements must be in place: robust processes, quality data, scalable infrastructure, and the right talent. The real challenge lies in creating a convergence of those elements so we can maximize value for the organization."***

Figure 17.
Most organizations lack data readiness

Share of organizations by level of maturity across the following dimensions



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 900 executives from data/AI functions.
Organizations rated their maturity on a scale from 1 to 7: 1–2 means very low, 3 is below average, 4 is average, 5 is above average, and 6–7 is very high.
Note:
Data governance and security: Policies for data management, compliance, and protection against unauthorized access
Data infrastructure: Robust storage and processing systems that can scale with data demands
Data volume: Adequate amount of data to train and validate AI models
Data quality and availability: Clean, accurate, and accessible data
Data monitoring and lifecycle management: Tools for real-time data quality tracking and processes for data collection, storage, and deletion
Data integration and interoperability: Ability to combine data from various sources and ensure seamless data exchange

"If your data isn't ready for AI, your business isn't ready for AI."

Franck GREVERIE

Chief Technology and Portfolio Officer,
Head of Global Business Lines,
Capgemini

AI infrastructure maturity:

Over four in five organizations report low-to-medium maturity across dimensions such as computing, integration, orchestration, fine-tuning, and cybersecurity.

A VP of data science and AI at a software development organization highlights: *"Enterprises face key challenges in scaling AI, such as fragmented data silos hindering unified decision-making, while limited system performance restricts real-time insights. Trust and adoption depend on delivering reliable, business-relevant outputs. And without high-quality data, even the best models fail."*

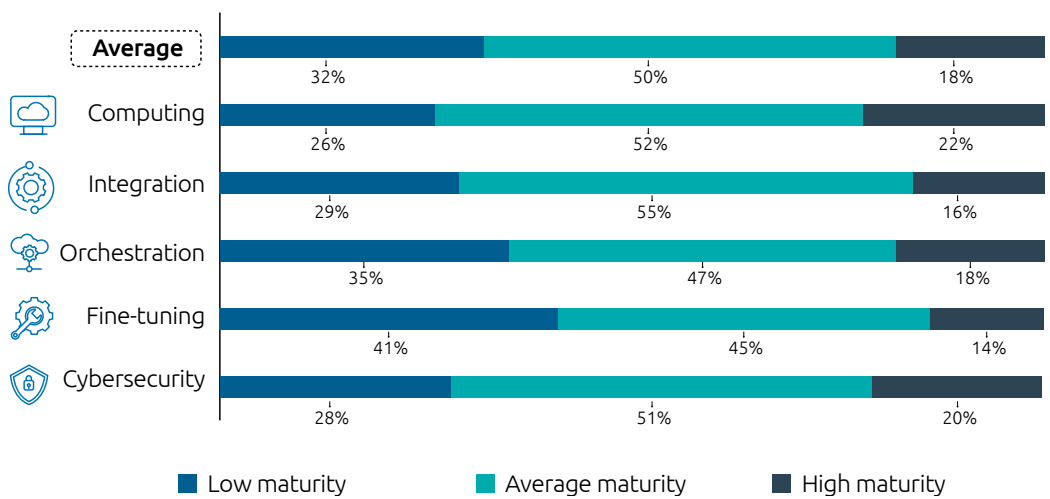
Vishal Singhvi, Director, Strategic Initiatives (Gen AI) at Microsoft, says: *"Organizations that invest in strong data foundations and effective change management are seeing 10%+ revenue uplift through agentic AI by expanding share of wallet with existing customers and unlocking new market segments."*

82%

of organizations report low-to-medium AI infrastructure maturity

Figure 18.
Only one in five organizations has a mature AI infrastructure

Share of organizations by level of AI maturity across the following dimensions



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 900 executives from data/AI functions.
The total may not equal 100% due to rounding.

"Trust in agentic AI grows through experience."

Susan Emerson
Senior VP, AI Product,
Salesforce

"Based on our prototypes and proofs of concept [PoC], we foresee it reaching Level 3 or 4 autonomy within the next two to three years."

Joji Philip
Director, AI/ML Products
Ericsson

Discussion with

Preetha Sekharan
VP, Digital Incubator – Applied AI and Transformation, Unum (an American insurer)

What are some of the use cases currently being deployed in your organization?

We prioritize high-impact use cases where AI can deliver measurable value for our customers, particularly in complex, people-intensive areas to help our employees with routine tasks. We're targeting simple, transactional use cases to test feasibility and build confidence. For our initial pilots, we're focusing on standardized processes with minimal variability to help ensure smoother implementation and more consistent outcomes.

What are the major challenges in implementing AI agents?

The biggest challenge is setting guardrails and deploying them consistently across our organization. Another major challenge is the lack of standardized language across the insurance industry. Terminology can vary significantly between companies and even departments, making it difficult for AI agents to interpret intent accurately. Agents need to be adaptable, but there must be clear triggers for human intervention. For example, we do not allow an AI agent to make certain significant decisions autonomously or interact directly with a customer.

How do you expect AI agents to shape the future of work?

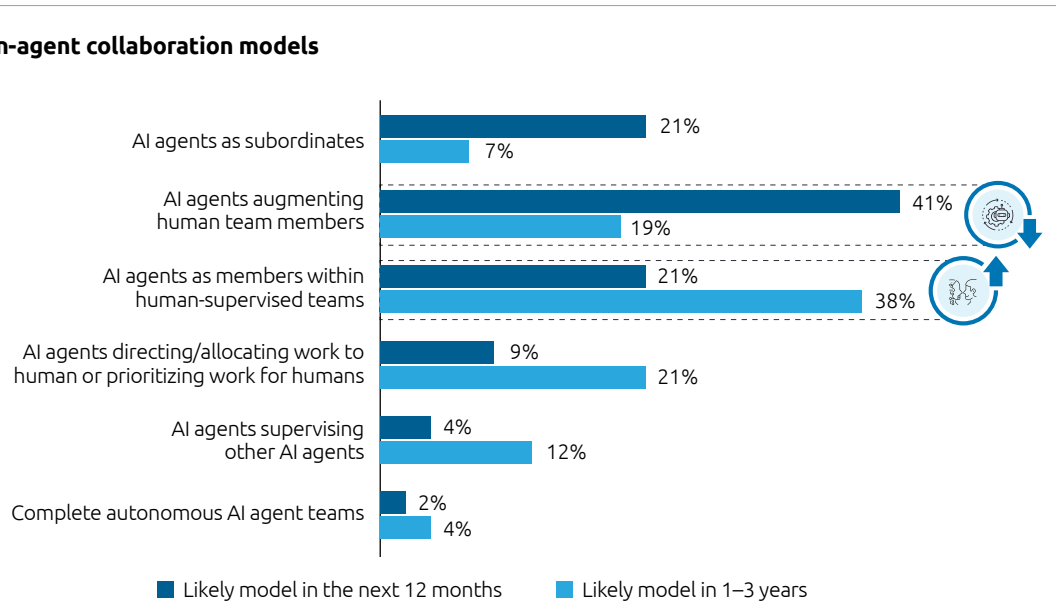
AI works side by side with our employees, allowing them to focus on where they can deliver most value. Employees could evolve into generalist orchestrators, coordinating with specialized AI agents to execute tasks, especially in fields such as software development. Human roles will focus more time on higher-level thinking, creative problem-solving, and strategic orchestration, supported by AI.

04 Humans and AI agents can collaborate to deliver greater benefits

A new hybrid workforce is emerging

In 12 months' time, we expect over 60% of organizations to have human-agent teams in which AI agents serve as subordinates/tools or enhancements to human capabilities. In one to three years, AI agents are likely to evolve into members within human-supervised teams. Itai Asseo, Head of Incubation and Brand Strategy (AI Research) at Salesforce, says: *"Human-AI interaction patterns are still taking shape and a seamless way to interact with AI agents is yet to surface. Just as the shift from BlackBerry to iPhone in early days of the smartphone era redefined how we engage with technology, the sooner humans can intuitively interact with AI agents, the faster will be the adoption of agentic AI and its subsequent benefits."*

Figure 19.
AI agents are likely to evolve to members in human-supervised teams



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.

Question asked: Which of the following human-agent collaboration models is likely to evolve in your team/function in the next 12 months and in one to three years? Please select the model that will apply to most AI agents for each timeframe. The percentage represents the share of organizations that expect a particular human-agent collaboration model to apply to the most AI agents in their team/function.

"Organizations should first assess their processes to determine where AI agents can be most effectively integrated, ensuring they complement human workers rather than displace them. This requires a profound transformation of work itself."

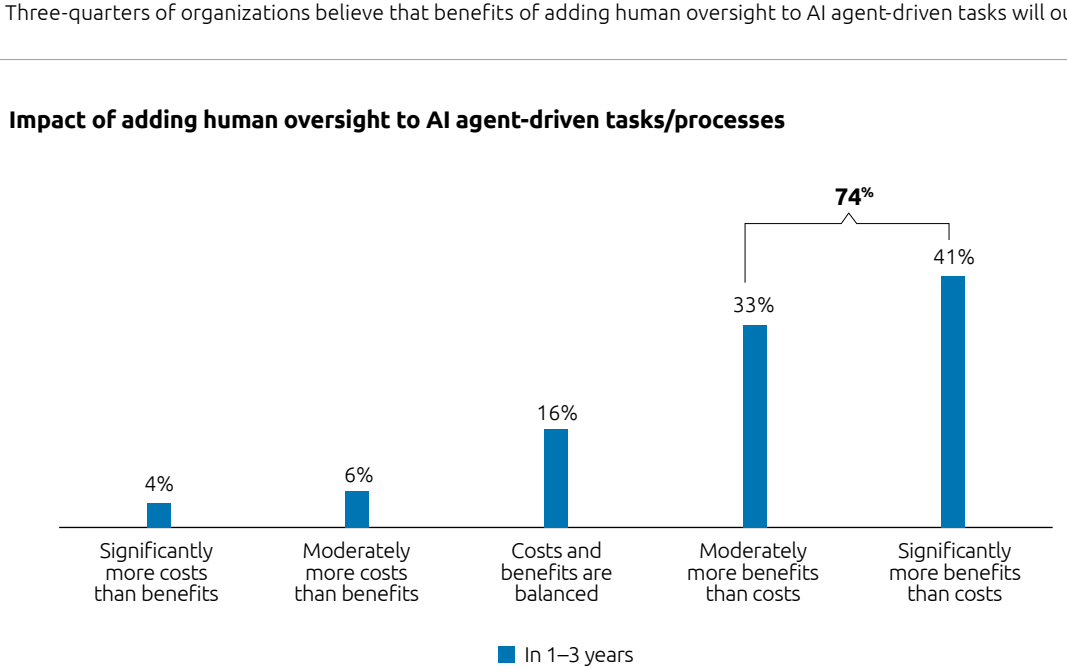
Anne-Laure Thibaud

Executive Vice President – Head of AI First Business & Analytics, Capgemini

Seamless human-agent collaboration elevates business outcomes

Nearly three-quarters of executives believe that benefits of adding human oversight to AI agent-driven tasks will outweigh costs (see Figure 20). In total, a significant 90% view human involvement in AI-agent driven workflows as either beneficial or at least cost-neutral. While human oversight will be irreplaceable in safety-critical applications such as healthcare, it will also be instrumental in aligning agentic outcomes with corporate strategy and values. A recent study from Stanford University and University of Pennsylvania found that subjects made better hiring decisions when using an algorithm that offered selective recommendations.[48] Human oversight can also be used to train AI agents to make better decisions over time.

Figure 20.
Three-quarters of organizations believe that benefits of adding human oversight to AI agent-driven tasks will outweigh costs



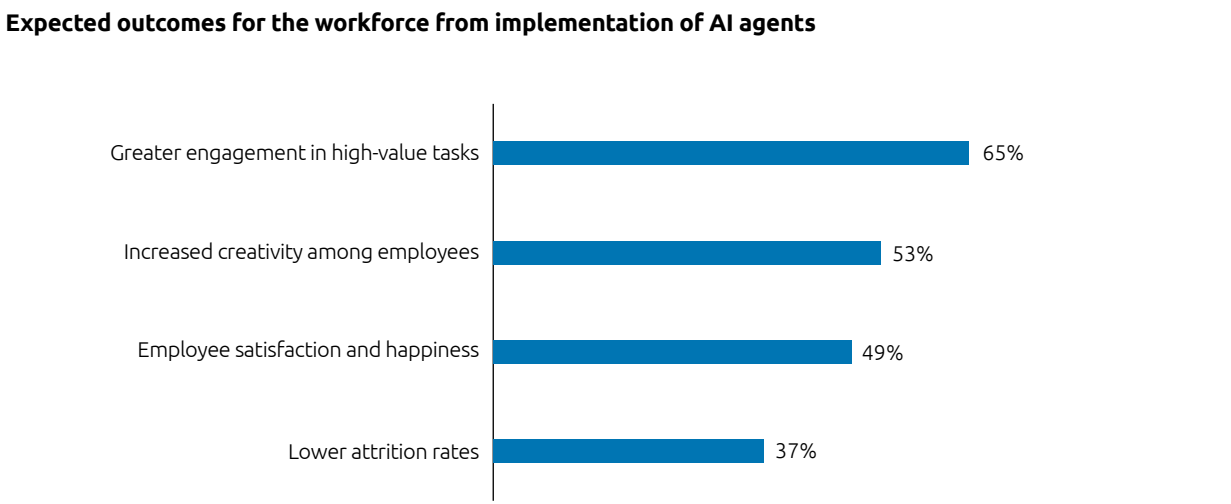
Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: How does adding human oversight to AI agent-driven tasks impact the balance between benefits (e.g., accuracy, safety) and costs (e.g., labor, time), assuming that agentic solutions are expected to mature and become more accurate and reliable over time?

By effectively integrating human and agentic workforces, organizations expect 65% greater engagement in high-value tasks; 53% increased creativity; and 49% greater employee satisfaction. A recent study assessing teamwork, productivity, and performance indicates that collaborating with AI agents resulted in 137% more communication and a 60% increase in productivity compared with human-only teams.[49]

90%

of organizations view human involvement in AI-agent driven workflows as either beneficial or at least cost-neutral

Figure 21.
Implementation of AI agents can lead to 65% greater engagement in high-value tasks



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 100 executives from strategy and HR functions.
Question asked: To what extent do you believe the implementation of AI agents in your organization will lead to the following outcomes?

A recent study compared clinician diagnostic performance across four settings: using conventional resources; using AI as a first opinion; using AI as a second opinion; and relying on AI alone. Clinicians using conventional resources scored significantly lower (75%) than those using AI support (85% using AI as first opinion and 82% using AI as second opinion). AI alone achieved the highest score (87%).[50]

Combining human expertise with AI agents significantly enhances output quality, speed, scale, and operational efficiency, while minimizing risks such as reputational damage.

The human workforce is worried

In our 2017 research, 63% of organizations that had implemented AI at scale said it had not destroyed any jobs.[51] However, with the rise of agentic AI, organizations are becoming cautious about its implications for the workforce. Over half (52%) of organizations believe AI agents will displace more jobs than they create.

"Just as the shift from BlackBerry to iPhone in early days of the smartphone era redefined how we engage with technology, the sooner humans can intuitively interact with AI agents, the faster will be the adoption of agentic AI and its subsequent benefits."

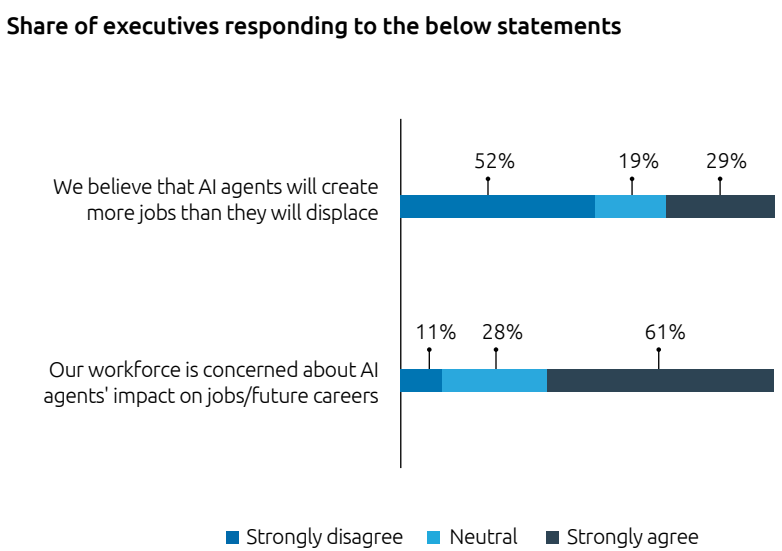
Itai Asseo

Head of Incubation and Brand Strategy (AI Research), Salesforce

The World Economic Forum (WEF) predicts that AI and data processing alone will create 11 million roles and replace nine million by 2030. Robots and automation, meanwhile, are forecast to displace five million more jobs than they create.[52] In a study conducted by Microsoft, nearly half of leaders (46%) report using agents to fully automate workflows or processes. However, functions will advance at different rates and to different extents, depending on the nature of their responsibilities.[53]

The CEO of Klarna, a Swedish provider of buy-now, pay-later services, admitted over-relying on AI to cut customer service jobs. Klarna is now bringing back more human employees.[54] This highlights that getting the right human-agent collaboration is crucial to stability. As the human workforce is confronted by the true implications of AI adoption, business leaders, academics, and politicians will need to work together to find a viable solution.

Figure 22.
The workforce is concerned about AI agents' impact on jobs



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 100 executives from strategy and HR functions.
Question asked: Please indicate the extent to which you agree with the below statements regarding the potential impact of AI agents on the future of work, on a scale of 1 to 7, where 1= strongly disagree and 7= strongly agree.

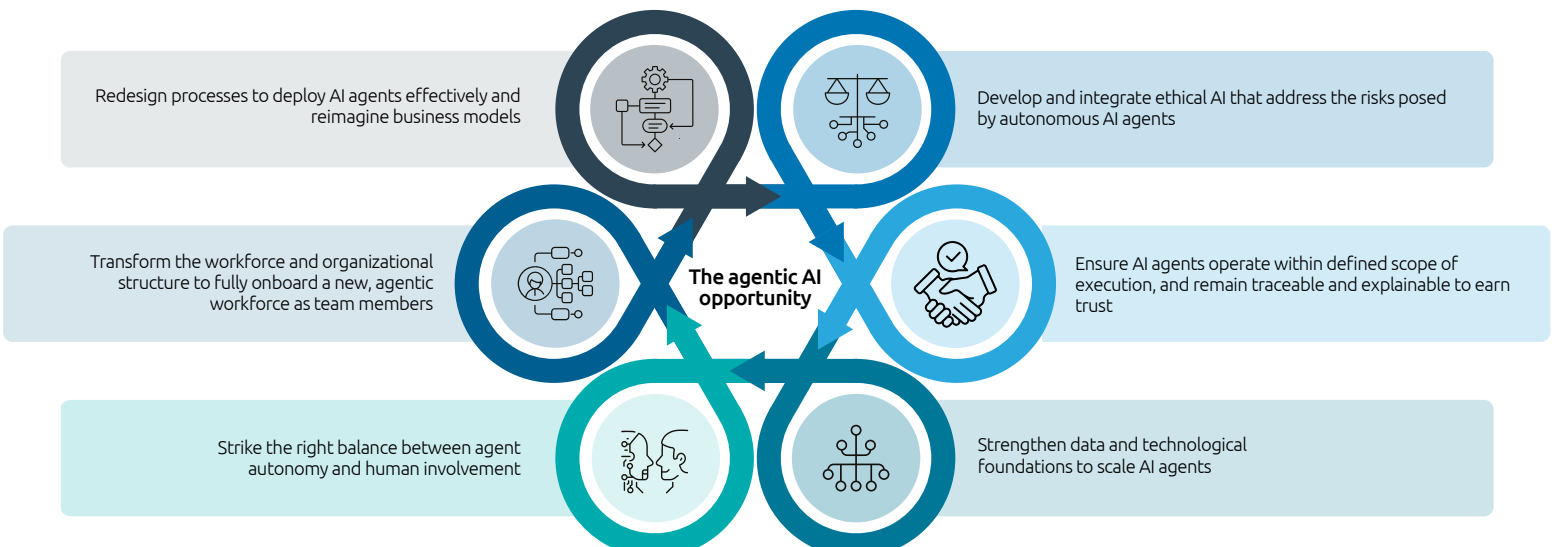
"Organizations that treat AI agents only as a productivity tool are missing the point. Those that don't redefine roles, incentives, team structures, and leadership models may soon find themselves irrelevant."

Marjolein Wenderich

Vice President, Global MD – Workforce and Organization, Capgemini

05 How can organizations capture the agentic AI opportunity?

Figure 23.
The agentic AI opportunity



Source: Capgemini Research Institute analysis.

Redesign processes to deploy AI agents effectively and reimagine business models

a. Start with the process, not the technology

Organizations must redesign processes with AI at their core. This requires moving from incremental automation to a deliberate orchestration of AI agents, Gen AI models, and traditional AI systems.

For example, a process redesign could include agents proactively resolving mismatches, flagging anomalies in real time, and learning from approval behaviors to improve decision-making.

b. Use a structured framework to select the right AI mix

Each type of AI brings different strengths. AI agents are well-suited for autonomous coordination and action across systems. Gen AI adds value in creative, generative, or language-heavy tasks. Traditional machine learning excels at prediction and optimization. And RPA and rule engines are effective for structured, deterministic workflows.

When assessing processes and technology options, a structured framework can help:

- **Volumetrics:** Automation brings a quick ROI in high-volume/high-frequency tasks. Low-volume tasks may not warrant agentic solutions unless the per-transaction value is exceptionally high.

"At ServiceNow, our priority has been to provide our customers with AI agents that integrate seamlessly into existing enterprise workflows - accelerating outcomes without disrupting what already works."

Dorit Zilbershot

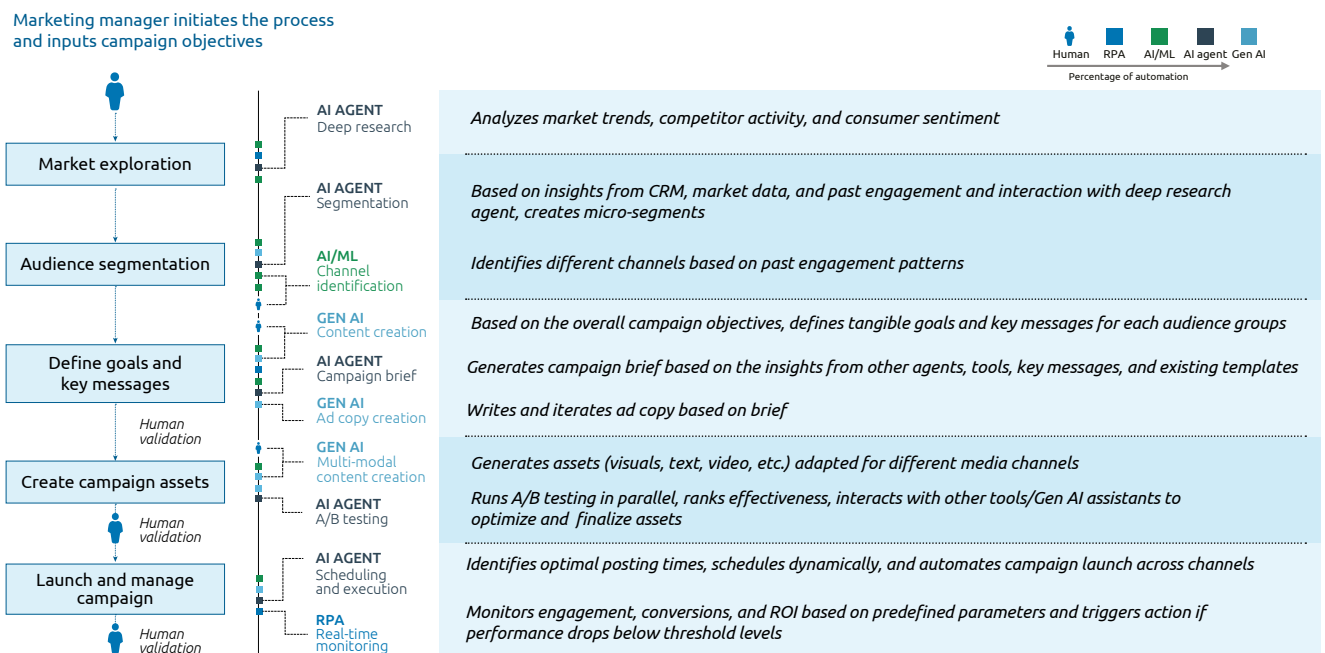
GVP, AI Experiences & Innovation, ServiceNow

- **Decision type:** Evaluate the decisions based on the factors outlined in the upcoming section to determine the optimal level of autonomy.
- **Data:** Reliable automation depends on accessible, high-quality, and well-integrated data.
- **Level of digitalization**: Digital-first processes are easier to automate and integrate into AI workflows
- **Process stability**: Stable and standardized processes are generally easier and less risky to automate. Highly variable or frequently changing processes may require more sophisticated AI.
- **Error rate and amount of exceptions:**
  - Fewer exceptions improve automation performance and reliability
  - If certain actions of agentic AI have the potential to create a cascading effect on downstream systems, people, and processes, assess the risk-benefit ratio to determine whether such scenarios require high automation.

Combining AI agents, Gen AI, AI/ML, and RPA technologies can help bring down operational costs. Organizations may also assess the adoption of open-source models for certain applications, as these can reduce runtime costs while delivering comparable performance.

Figure 24.

Illustrative scenario of orchestrating a mix of AI agents, Gen AI, AI/ML, and RPA for a typical marketing campaign



Source: Capgemini Research Institute analysis.

"The future of enterprise operations lies in the seamless integration of agents, other forms of AI, automation, in tandem with and under the oversight of human co-workers."

Itziar Goicoechea-Martinez

Senior Director, AI and Generative AI Offer, Capgemini

c. Design for interoperability and orchestration

Instead of standalone deployments, organizations must invest in a modular architecture where different AI systems interact. An orchestration agent can manage the entire marketing campaign process by delegating tasks to other AI agents, Gen AI, AI/ML, or automation tools based on the problem, context, and level of expertise required. Dorit Zilbershot, GVP, AI Experiences & Innovation at ServiceNow highlights: *"At ServiceNow, our priority has been to provide our customers with AI agents that integrate seamlessly into existing enterprise workflows - accelerating outcomes without disrupting what already works. These agents are built to operate across platforms and not just within ServiceNow environment. For instance, in HR, they streamline talent screening, onboarding and personalize trainings. And in customer service, they pre-fill case details, analyze historical data, and assist human workers provide faster and more informed responses to customers."*

Recent developments have reinforced the importance of orchestration. For example:

- In April 2025, Google introduced a new open protocol called Agent2Agent (A2A), which enables AI agents to communicate with each other, securely exchange information, and coordinate actions across various enterprise platforms and applications.[55]
- At Microsoft Build 2025, Microsoft introduced multi-agent orchestration in Copilot Studio. This feature allows agents to share data, collaborate on tasks, and delegate.[56]

d. Scope for business model innovation

Agentic AI can accelerate innovation, save costs, and create new revenue streams and business models. Yet, most organizations don't yet recognize this potential – only 26% of executives in our survey highlighted the potential to develop entirely new business models or revenue streams though agentic AI.

Organizations can innovate faster and more intelligently with agentic AI. With capabilities like iterative reasoning and refinement, AI agents can accelerate the pace of innovation and widen the scope of innovation across sectors. For example, Google's AI co-scientist, built on Gemini 2.0, is a multi-agent system designed to support scientific discovery. This system can not only perform tasks such as market research, literature review, and document review, but also generate original insights and propose and test novel hypotheses. They are especially valuable in high-stakes fields like drug discovery, target identification, molecular design, and material science simulations. In consumer goods, agents can autonomously test product-market fit and create new product ideas. In financial services, AI agents can hyper-personalize financial products and services at scale.

Dow, a global materials science organization, is deploying agents to ferret out hidden losses and streamline shipping operations. Once the system is fully scaled, Dow expects increased accuracy in logistic rates and billing that will save millions.[57] Agents in Bayer's crop science R&D team save up to six hours per week, accelerating the innovation process and raising productivity.[58] AI agents can boost upselling and cross-selling with hyper-personalized recommendations and 24/7 proactive outreach.

Agentic AI is not a technological upgrade; it's a strategic shift in how value is created and captured.

70%

of organizations believe that AI agents will necessitate organizational restructuring

Transform the workforce and organizational structure to fully onboard a new, agentic workforce as team members

Reimagining the businesses and redesigning processes calls for a shift in mindset – organizations must begin to view AI agents as part of the organization and create an environment where human and AI agents work in harmony. To this end, organizations must rethink how they structure teams, how roles evolve, and how they measure performance.

a. Restructuring workforce to account for human-agent teams

A notable 70% of organizations believe that AI agents will necessitate organizational restructuring. However, skill development, and organizational restructuring are not top strategic focuses.

Rather than treating AI agents as tools or assistants, organizations must embed them into core teams. This includes:

Defining roles and responsibilities of AI agents

- Organizations must establish formal roles for agents within team structures – for example, as research agents, workflow coordinators, or testing agents – with well-scoped mandates and boundaries, defined goals, clear business ownership and accountability, and buy-in from human team members.
- Organizations can also consider creating AI personas, assigning them appropriate responsibilities and integrating them within the team dynamics.

Clearly redefining the roles and responsibilities of human workers

- 68% of organizations noted that employees could use additional capacity to deliver higher-value tasks such as strategic planning, innovation, client interaction, upselling, and cross-selling.
- 59% indicated the possibility of creating new roles such as AI agent supervisors and agent behavior analysts.

This also entails providing the workforce with the skills and support to effectively manage change.

Establishing clear accountability for decisions made by/with assistance of AI agents and create a process to continuously monitor alignment to intended business goal

As AI agents begin to take on decision-making responsibilities, organizations must clarify accountability structures. It is essential to.

- Define who is responsible and accountable for actions taken by AI agents or supported by them
- Ensure human oversight is embedded in high-stakes or sensitive decisions
- Introduce formal protocols for continuous monitoring as well as specific auditing agent actions and verifying outcomes alignment with initial business goal.

b. Evolving operating models demand a new kind of leadership

One of our recent studies found that many organizations are leaning toward a diamond model of the organizational structure – with strong leadership at the top, a broader middle layer, and a leaner entry level as AI takes on foundational tasks.[59]

Leaders must build the agentic AI vision into their actions and behaviors. As organizations need to view AI agents as part of the workforce, recruitment becomes capability assessment and onboarding involves defining responsibilities in access. Performance, reliability, and alignment with business goals are key. Managing AI agents alongside tools through an HR lens can help in creating a safe and scalable structure.

28% of organizations are confident they can extract the full potential of AI agents.

Therefore, organizations should establish a team dedicated to AI resource management to systematically allocate and manage intelligent resources similar to human resources. As AI agents operate in real environments, it's critical to manage how they work with humans, teams, and tools to achieve shared outcomes. Since AI tools are reusable and often shared across teams, tight coordination is essential. Companies should build an accessible ecosystem for AI agents, with platforms that track agent capabilities to reduce redundancy, support reuse, and standardize processes. Finally, managing also includes onboarding new agents, retiring outdated ones, and updating tools and databases as needed.

Karim R. Lakhani, Chair of the Digital Data Design Institute at Harvard, and Dorothy and Michael Hintze Professor of Business Administration at Harvard Business School, says: ***"As AI democratizes access to expertise and intelligence, we'll see the rise of intelligence resources departments – much like how HR and IT evolved into core functions. These new divisions will be essential for managing the interplay between humans and AI agents, emerging as a critical source of competitive advantage in the AI-enabled enterprise."*** [60]

c. Reskilling/upskilling the workforce

Only 28% of organizations are confident they can extract the full potential of AI agents.

Trung Nguyen, Machine Learning Lead at Jira AI, Atlassian says: *"Organizations can bridge the AI talent gap by upskilling employees in prompt engineering and low-code tools, enabling rapid prototyping and innovation. But building trustworthy agents also requires robust evaluation, safety checks, and continuous feedback to ensure outputs remain accurate, ethical, and aligned with user expectations."*

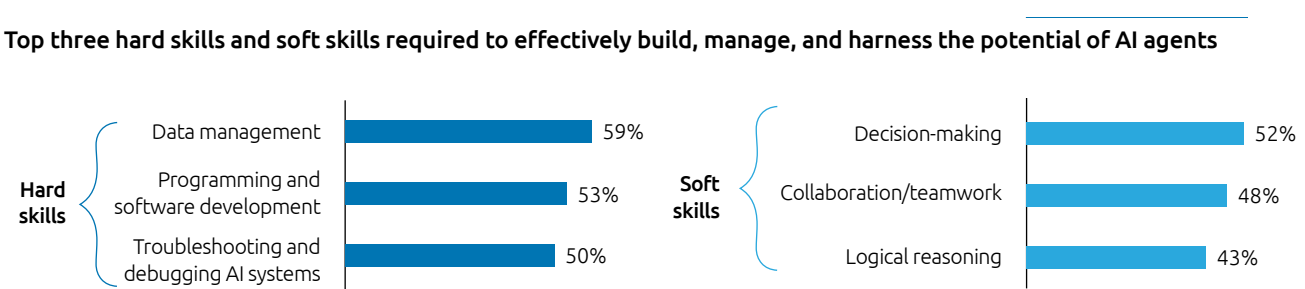
Anna Kopp, Digital Lead Germany at Microsoft, says: *"We have structured academy programs that take employees through a step-by-step journey, starting with the basics and progressing to more advanced AI use cases."*

Our survey reveals that data management and decision-making are critical skills required to fully harness the potential of AI agents. Soft skills such as collaboration, logical reasoning, emotional intelligence, and ethical judgement are also crucial to working alongside AI agents. Organizations must retain and further develop such critical skills.[61]

According to LinkedIn, AI literacy is the most sought-after skill in 2025. "Human" skills such as conflict resolution, adaptability, and innovative thinking remain in demand, highlighting the importance of combining AI expertise with exclusively human abilities.[62]

Rashmi Shetty, Strategy & Transformation, Digital Technology, Industrial Energy Technology at Baker Hughes says, *"To fully realize the potential of agentic AI, organizations must progress from AI awareness to AI literacy, and ultimately to AI fluency across the enterprise, by investing in targeted areas where AI can deliver measurable value and sustained competitive advantage."*

Figure 25.
Data management and decision-making are critical skills to build



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 950 executives from strategy and data/AI functions.
Question asked: What are skills employees require for building, managing, and harnessing the potential of AI agents? Select top three hard skills and soft skills.

d. Create new performance metrics to gauge hybrid performance

Traditional metrics may not fully capture the performance of human-agent teams. Organizations should consider:

- **Joint productivity metrics** – measuring outcomes delivered through collaborative efforts between humans and agents.
- **AI agent evaluation metrics** – evaluating how AI agents contribute to quality, speed, and innovation.
- **Collaboration effectiveness** – assessing how well human and agent roles are aligned and how smoothly they interact.
- **Skill adaptability** – tracking how effectively employees adapt their roles and skillsets in response to working with AI agents.

A combination of human feedback, agent performance logs, and business KPIs can help create a holistic view of hybrid team performance.

"We have structured academy programs that take employees through a step-by-step journey, starting with the basics and progressing to more advanced AI use cases."

Anna Kopp

Machine Learning Lead at Jira AI, Atlassian

Strike the right balance between agent autonomy and human involvement

Autonomy is not binary but exists on a spectrum. Rather than defaulting to full or no automation, the goal is to find the right mix of human and agentic workforce that maximizes business impact and minimizes risk. Therefore, for each task/process, organizations need to assess: what level of autonomy is required, how humans can contribute, and where human-agent collaboration will generate better outcomes?

68%

of organizations noted that employees could use additional capacity to deliver higher-value tasks such as strategic planning, innovation, etc.

a. Categorize decisions

The act of delegation requires clarity and trust. But trust itself depends on evidence of capability. This creates a paradox: unless organizations delegate meaningful work to AI agents, they cannot assess performance or build confidence. But not all decisions are equally important, and not all require the same level of oversight. Categorize each decision or action an AI agent would take along the following dimensions:

- **Risk level** of outcomes (e.g., financial, reputational, regulatory)
- **Reversibility** (Can it be undone or corrected?)
- **Ethical nature** (Are there ethical issues such as lack of fairness or transparency?)
- **Creativity** (Does the task require human innovation, intuition, or empathy?)
- **Breadth of impact** (To what extent will this decision affect processes, systems, or people? Will it trigger cascading consequences?)
- **Compliance** (Does the task involve adherence to internal policies, regulatory standards, or industry norms?)

This informs autonomy thresholds: that is, where agents operate independently, where collaboration between agents and humans is required, and where tasks should be performed solely by humans. In some cases, this will be dictated by law. For instance, the EU AI Act requires providers of high-risk AI systems to allow human oversight.[63]

Organizations can determine the appropriate level of autonomy by evaluating the criticality and complexity of decisions or actions, alongside their readiness across processes, technology, data, and workforce capabilities. AI agents with varying degrees of autonomy can operate concurrently across different workflows and evolve with system maturity.

b. Define “autonomy boundaries” in digital business architecture

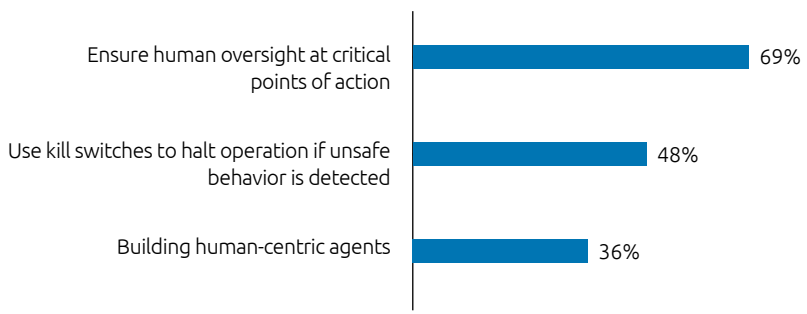
The digital business architecture defines how data, systems, processes, and people interact within the organization and establishes clear escalation triggers. Human ability to override decisions made by AI agents should be frictionless, well-communicated, and should be allocated according to role to ensure proper accountability.

69%

organizations cite human oversight mitigates the risks associated with AI agents

Figure 26.
Nearly seven in 10 organizations cite human oversight as risk mitigation

Mitigation plans for risks associated with implementing AI agents



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: How does your organization plan to mitigate potential risks associated with implementing AI agents? Select the top three.

Strengthen data and technological foundations to scale AI agents

a. Build a robust data foundation

We highlight that very few organizations have high maturity across all aspects of data-readiness. To address this, organizations should establish robust data infrastructure and governance protocols to underpin AI agent initiatives:

- **Establish standardized data governance protocols** to ensure consistency, transparency, and accountability throughout the data lifecycle – collection, processing, storage, and sharing.
- **Implement strict data validation protocols** for all datasets used by AI agents. This includes having policies around the source, usage rights, access controls, and processing methods for each dataset used by AI agents. As AI agents may have access to external data and tools, it is important to assess and certify data before it enters production environments.
- **Adopt common data standards** to enable seamless data exchange across AI agents, other tools and systems, business functions, and external ecosystems.
- **Ensure AI-readiness of enterprise data** – ensure high data quality for training and operating AI agents.
- **Address cybersecurity and privacy risks** by embedding compliance with data privacy laws (e.g., GDPR, HIPAA), using secure storage solutions, and protecting sensitive data with encryption.
- **Invest in modern data architecture** such as vector databases, real-time data pipelines, and scalable data lakes to enable efficient agent performance and data retrieval.

18% of organizations have high maturity across all aspects of data-readiness

b. Upgrade technology infrastructure to support scalable AI agent deployment

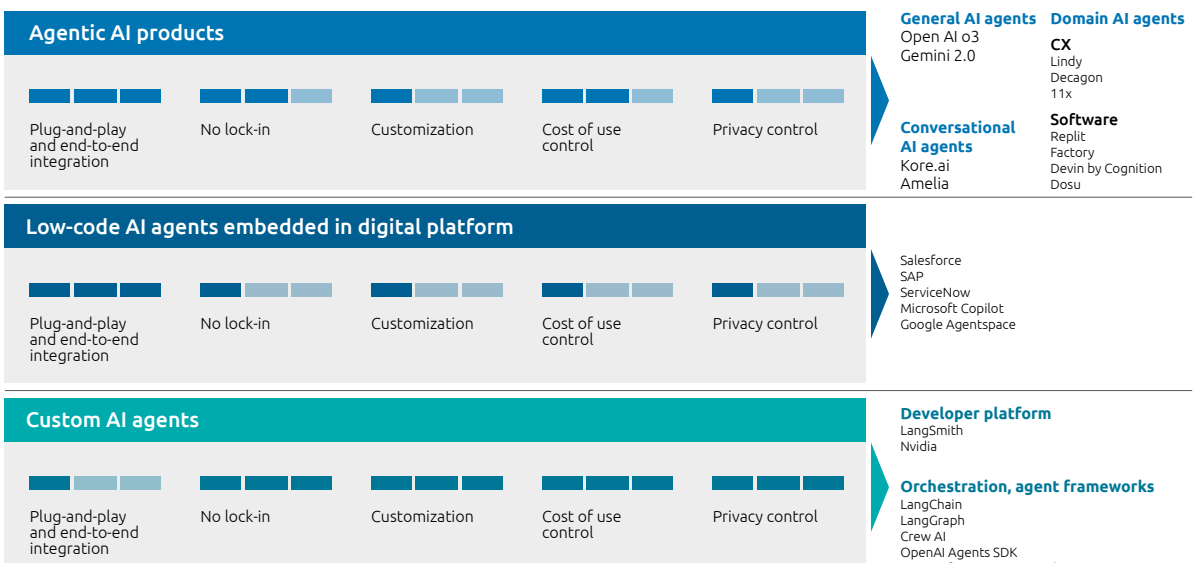
- **Computing power and scalability:** Ensure infrastructure can support high computational workloads (e.g., GPUs, TPUs) and scale with demand.
- **Connectivity and latency:** Maintain high-speed, low-latency networks for seamless agent communication and task execution.
- **Interoperability across platforms:** Enable smooth integration of AI agents with enterprise applications, APIs, and cloud environments.

- **Licensing and platform access:** Evaluate costs and limitations of platform-specific licenses; opt for models with flexibility and minimal vendor lock-in.
- **Future-proofing architecture:** Build with modularity to accommodate evolving AI models, newer tools, and increased workloads.

c. Choose the most suitable AI agent technology for each task/ process

Organizations need to focus on making informed, context-specific decisions about whether to build, buy, or adopt a hybrid approach for AI agent implementation. The figure below provides a practical lens to evaluate these options based on ease of integration (plug-and-play vs. bespoke integration), degree of vendor lock-in, level of customization, control over cost and usage, and privacy control. Aligning this decision with long-term business goals is essential for sustainable and scalable AI integration.

Figure 27.
Select the most suitable AI agent technology



Source: Capgemini.

The cost of building custom AI agents can be significant, requiring investment in data foundations, model development, and compute resources. Additional costs may arise from proprietary datasets and the integration of AI agents with legacy systems.

To manage these costs, organizations must carefully evaluate different AI agent deployment models. AI services are offered through various pricing structures, making it essential to assess not just functionality, but also long-term cost control.

Cost containment also depends on choosing scalable, energy-efficient solutions. By optimizing infrastructure and upgrading to more sustainable hardware, businesses can reduce compute overhead and environmental impact while keeping AI initiatives financially viable.

"Organizations that invest in strong data foundations and effective change management are seeing 10%+ revenue uplift through agentic AI by expanding share of wallet with existing customers and unlocking new market segments."

Vishal Singhvi

Director, Strategic Initiatives (Gen AI),
Microsoft

Ensure AI agents operate within defined scope of execution, and remain traceable and explainable to earn trust

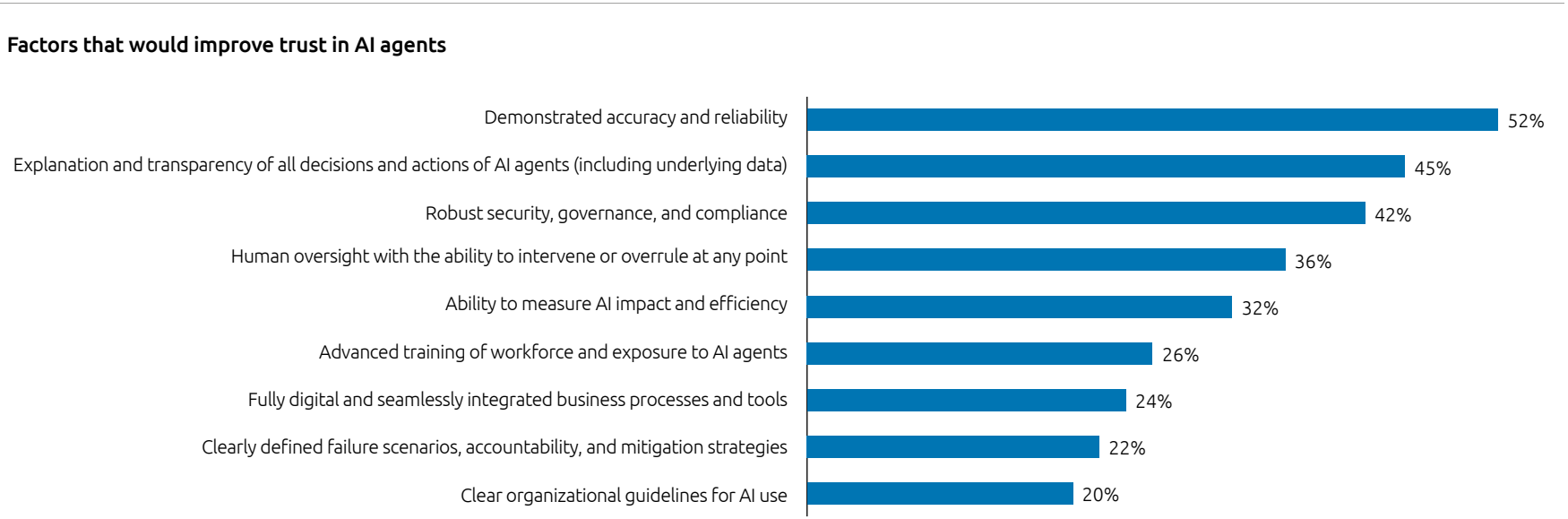
As agents gain independence and capability, alignment becomes both more important and more challenging.

a. Establish goal alignment between humans and AI agents

Defining an agent's intended purpose, scope of execution, and measuring fulfillment are crucial. Purpose may be explicitly coded through rules and objectives or implicitly shaped by learning processes. Even at advanced levels of autonomy, AI agents operate within established boundaries: clearly defined goals and mechanisms for monitoring compliance and strategic oversight are built into the system's design.

Organizations must establish continuous feedback and improvement cycles to refine and enhance AI agents' performance. Nearly two-thirds (65%) of organizations indicate that they plan to develop reporting and feedback systems.

Figure 28.
Demonstrated accuracy and transparency into all actions of AI agents are top factors that could improve trust



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 897 executives from corporate and data/AI functions who do not trust AI agents.
Question asked: What factors would increase your trust in AI agents and agentic AI? Select the top three factors.

"For people to trust AI agents they need to be able to understand its boundaries and know it will only operate within them. Most companies do not have digital definitions of those boundaries which prevents people trusting AI."

Steve Jones

Executive Vice President – Data Driven Business and Generative AI, Capgemini

b. Ensure observability

Trust comes from observability. Observability refers to increasing visibility of the decisions and actions of AI agents. This means offering insights into the inputs, tools invoked, parameters used, and the reasoning behind decisions and actions to address the black-box nature of advanced AI systems.

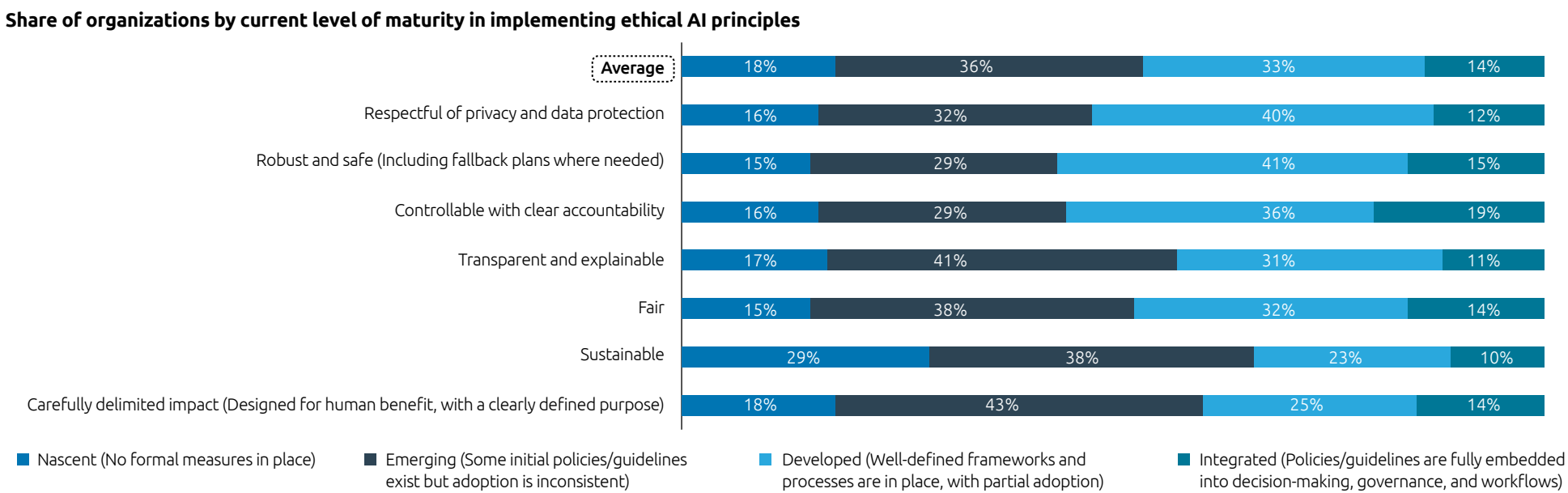
To achieve this, organizations need to establish robust observability frameworks to ensure that AI agents perform reliably and transparently under various conditions.

This trust can be further amplified by implementing mechanisms such as:

- Scenario testing under edge cases and high-risk conditions
- Error detection and reporting systems to identify anomalies in real time
- Failover strategies for underperformance
- Incident response plans for agent failures or unexpected behavior
- Third-party audits of training data, decision logic, and bias mitigation.

Develop and integrate ethical AI that address the risks posed by autonomous AI agents

Figure 29.
Only 14% have fully integrated ethical AI principles



Source: Capgemini Research Institute, Agentic AI, April 2025, N = 1,500 executives from corporate and data/AI functions.
Question asked: Rate your organization's current level of maturity in implementing ethical AI principles.

Beyond trust, AI agents must uphold ethical values, guard against misuse, and prevent failure cascades. As they assume greater operational control, AI agents will heighten all the risks posed by traditional AI and Gen AI.

Organizations are also increasingly concerned about privacy, security, legal liability, bias, and the risks of overreliance on AI agents. Yet only 14% report having fully embedding ethical AI principles into decision-making, governance, and workflows. Sustainability is the least integrated principle among ethical AI principles.

A risk assessment framework can guide safe and appropriate use of AI agents. This includes checking whether risks have been identified, assessed, and approved by relevant stakeholders, whether inputs and outputs are acceptable and accurate, and whether proper verification processes are in place. If not, organizations should either proceed with caution and use mitigating measures or refrain from using the solution all together.

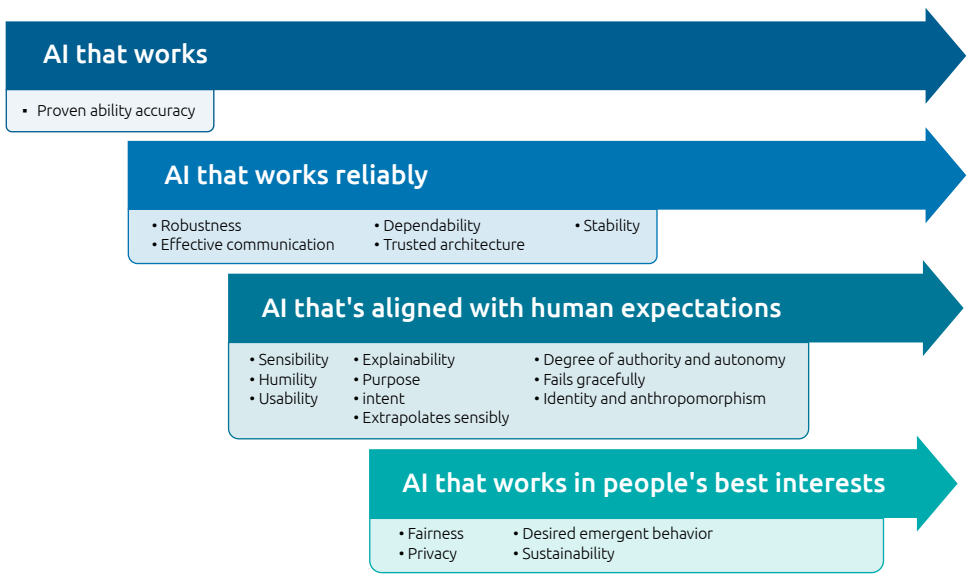
Itai Asseo, Head of Incubation and Brand Strategy (AI Research) at Salesforce, says: ***"IT will be a strategic enabler in the AI agent ecosystem—ensuring resilient infrastructure, seamless performance, and enterprise-grade availability. As gen AI and agentic AI adoption accelerates, IT leaders must proactively address ethics and safety concerns, token usage and optimization costs, turning operational oversight into a competitive business advantage."***

Organizations must establish or revisit existing ethical AI guidelines. They can look to international frameworks such as ISO/IEC 42001, which provides structured guidance on managing AI risks and opportunities.[64]

- **Embed ethical reasoning into AI agent design:** This allows AI agents to flag dilemmas to human decision-makers. For example, if an AI agent testing marketing campaign assets finds that provocative or sensational content increases engagement, it flags a dilemma regarding the potential impact on brand credibility and prompts human review.
- **Make agent decision-making traceable and auditable:** Establish mechanisms to trace the full "thought process" of AI agents, from input to action, to ensure transparency and accountability. This includes detailed action logs, prompts or goals, and embedded reasoning chains that can be reviewed in audits or challenged in real time.
- **Create layered governance by design:** Prevent failure cascades by designing layered systems where multiple AI agents can critique, supervise, or override each other. Introduce "guardian agents," tasked with reviewing high-stakes decisions or stress-testing outputs for bias, hallucinations, or safety risks. This agent-of-agents architecture mirrors human checks and balances and builds resilience into autonomous systems. Dr. Suraj Srinivasan at Harvard Business School says: ***"While deploying AI agents, organizations must move beyond technical implementation and consider how core values are embedded into these systems. Unlike humans, who naturally understand context and are guided by organizational ethos, AI agents require these principles to be explicitly defined and built into their design. Ethics can no longer be managed by exception; they must be embedded into the system from the start."***
- **Train human workers for ethical fluency:** Equip human teams across the organization with the fluency to anticipate ethical and safety challenges posed by AI agents. This includes scenario-based training, decision-making frameworks, and cross-functional simulations to strengthen ethical reflexes, particularly in fast-moving or ambiguous situations.
- **Appoint AI ethicists to embed ethical oversight across the lifecycle:** AI ethicists are responsible for defining and maintaining a clearly articulated code of ethics for AI agents, aligned with organizational values. They play a critical role in ensuring the right questions are being asked around AI agent implementation, and that ownership of ethical and operational risks is clearly defined. By coordinating with governance, delivery, legal, and executive teams, AI ethicists establish mechanisms to track compliance, embed ethics into AI systems, and create clear escalation and reporting channels. This team should be composed of individuals from diverse cultural, educational, and professional backgrounds to reflect a broad range of worldviews and mitigate individual biases in decision-making.

Continuous monitoring and improvement mechanisms will ensure these solutions evolve with changing business needs and technological capabilities, creating a virtuous cycle.[65] In addition, organizations should also stay abreast of evolving national and international AI regulation, including government policies and sector-specific frameworks, to ensure responsible deployment of agentic AI.

Figure 30.
Confidence in agentic AI



Source: Capgemini, "Business, meet agentic AI: Confidence in autonomous and agentic system," May 2025.

Ethical design is not a one-time effort. Organizations need to regularly audit agent behavior, monitor drift in real-time, and recalibrate systems in response to evolving risks.

14%

of organizations have fully integrated ethical AI principles

Conclusion

AI agents mark a new frontier in enterprise automation and human-machine collaboration that shifts the conversation from task-level efficiency to a holistic transformation of business processes across enterprise domains. The potential is vast: from unlocking billions in value to reshaping the nature of work itself. Organizations must move beyond experimentation toward purposeful scaling, grounded in trust, transparency, and human-centric design.

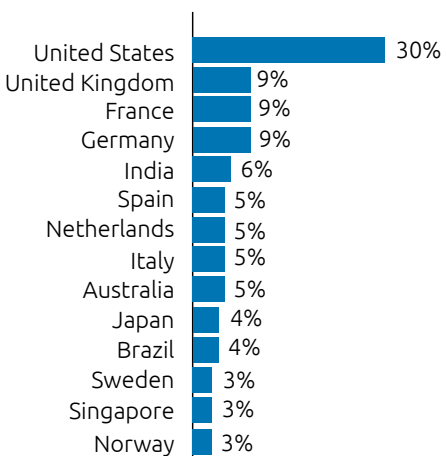
The winners in this next wave of AI will not be those who simply deploy more AI tools. Rather, they will be those who rethink their business, reimagine workflows, reskill their workforces, restructure their organizations, and embed ethical safeguards from the outset. Ensuring seamless integration of human and agentic workforces requires a shift in mindset from isolated innovation to ecosystem thinking and from siloed experimentation to enterprise orchestration. As agentic AI evolves, so too must the capabilities, cultures, and leadership required to harness it.

Research methodology

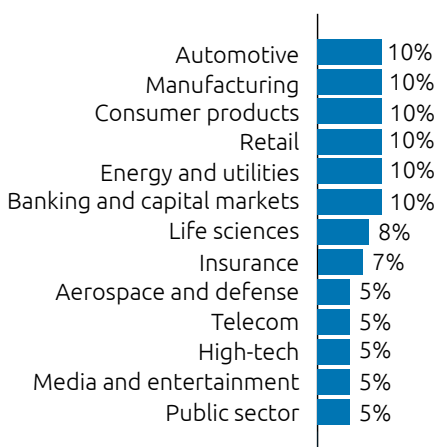
We conducted a global survey of 1,500 executives at organizations each with more than $1 billion in annual revenue, across 14 countries. Organizations operate across 13 sectors. All have started to explore agentic AI. The global survey took place in April 2025. Executives surveyed are at director level and above. Of these, 60% are from data and AI functions, while 40% are from diverse business functions.

The distribution of respondents and their organizations is provided below.

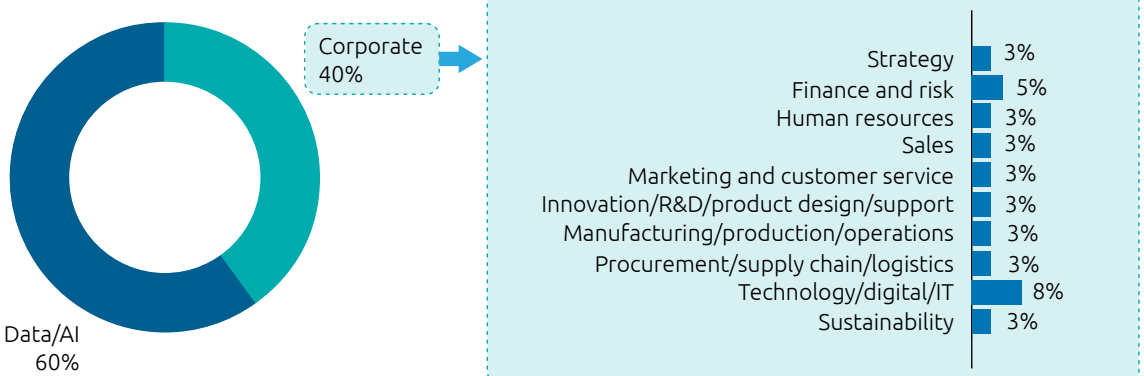
Organizations by country



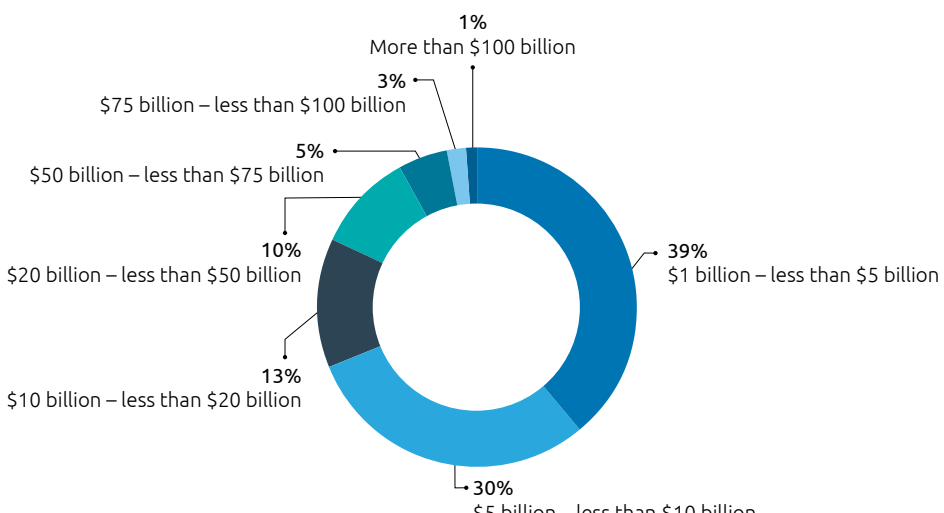
Organizations by sector



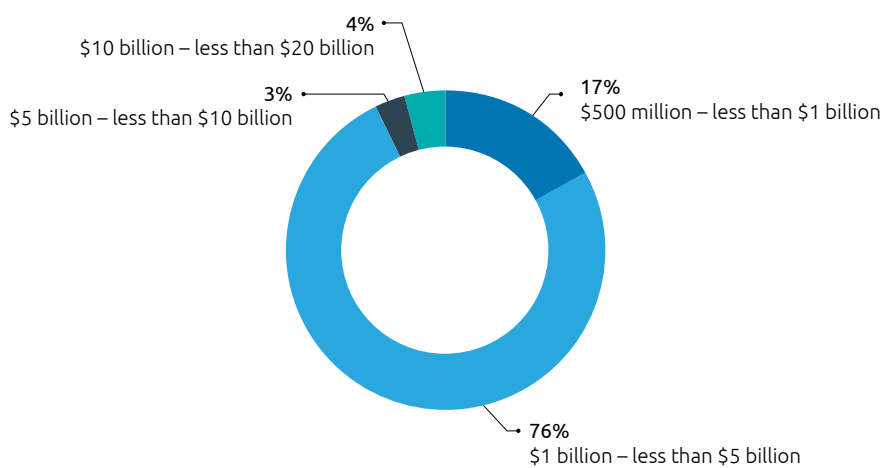
Share of executives by function



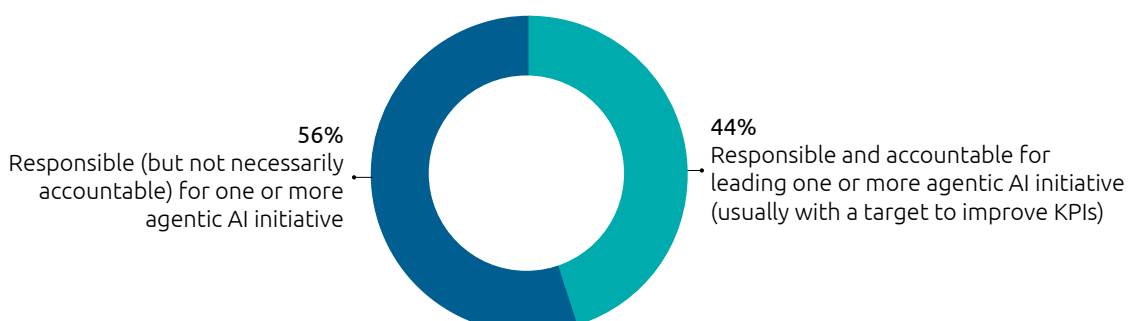
Organizations by annual revenue



Pubic sector organizations by annual budget



Executives' level of involvement in their organization's agentic AI initiatives



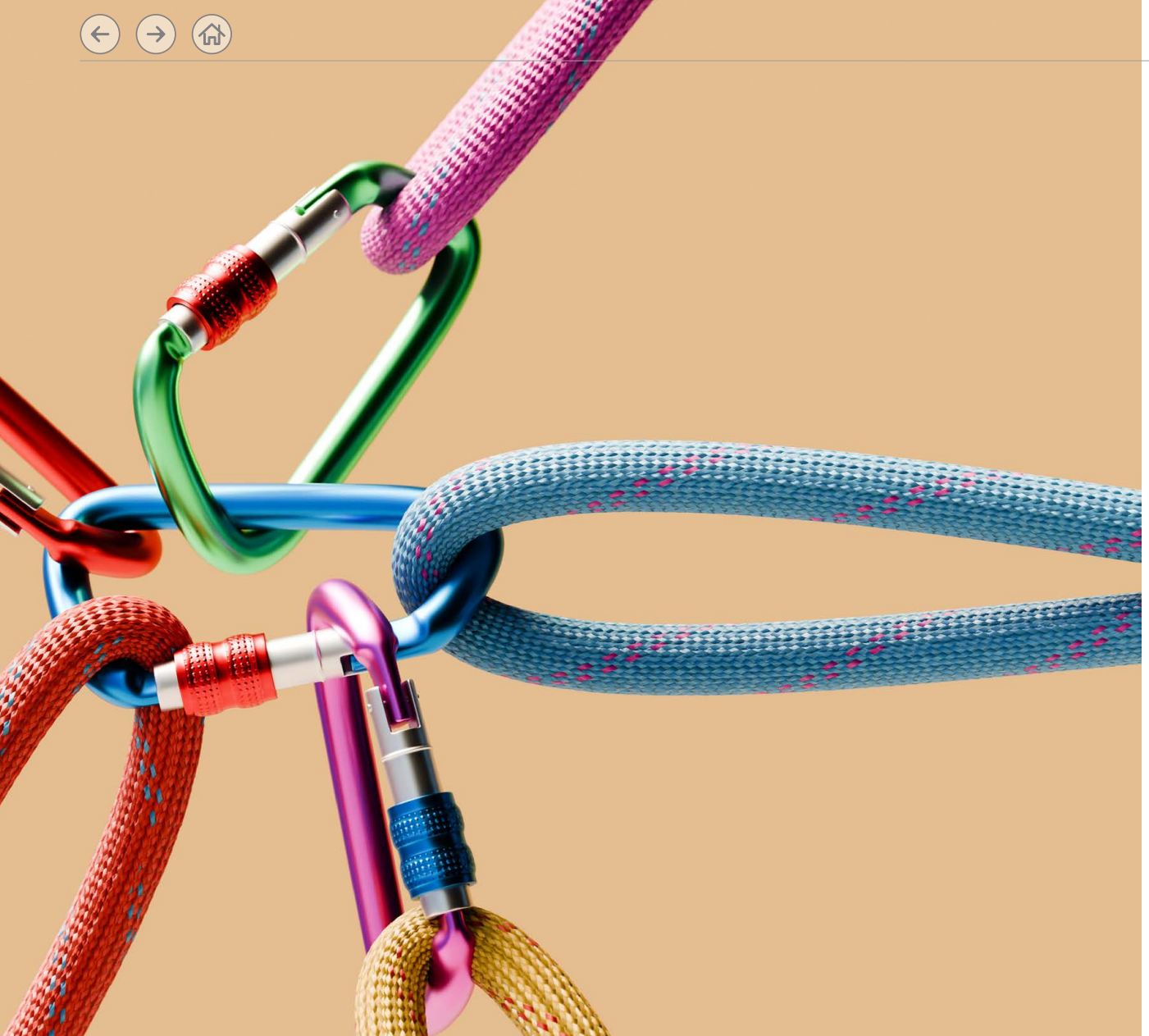
We also conducted in-depth discussions with 33 senior executives from the industry, hyperscalers, startups, and academia to complement the survey findings.

The study findings reflect the views of the respondents to our online questionnaire for this research and are intended to provide directional guidance. Please contact one of the Capgemini experts listed at the end of the report to discuss specific implications.

Appendix

Glossary

- **Agentic workflow:** Agentic workflows are AI agent-driven processes where AI agents manage, coordinate, and execute end-to-end processes with less human intervention.
- **Multi-agent system:** A multi-agent system (MAS) consists of multiple independent agents operating within a common environment, working together to achieve goals beyond what any individual agent could accomplish. These systems, sometimes called agentic architectures or frameworks, represent the cutting edge of autonomous system development.[66]
- **Model Context Protocol (MCP):** MCP is an open protocol that standardizes how applications provide context to LLMs. Think of MCP like a USB-C port for AI applications. Just as USB-C provides a standardized way to connect your devices to various peripherals and accessories, MCP provides a standardized way to connect AI models to different data sources and tools.[67]
- **Agent-to-Agent (A2A) Protocol:** A open protocol that provides a standard way for AI agents to communicate with each other, securely exchange information, and coordinate actions on top of various enterprise platforms or applications, regardless of the underlying framework or vendor. It complements Anthropic's Model Context Protocol (MCP).[68]
- **Internet of AI agents:** An open, interoperable, and quantum-safe Internet for agent-to-agent collaboration between AI agents across organizational boundaries.[69]
- **Orchestration:** The coordination and management of multiple AI agents, workflows, tools, and systems towards shared objectives.



Economic potential of AI agents

We have taken two approaches to estimate the total economic value generated by agentic AI over the next three years by organizations in surveyed countries.

Approach 1: $450 billion in economic value over the next three years in the countries surveyed.

- We assume that organizations that have scaled implementation of AI agents can capture 50% of the expected benefits, while those that have not scaled can realize 10% of the expected benefits.
- The overall economic value generated by surveyed organizations in a given year is the weighted sum of the value captured by both segments (scaled and non-scaled).
- The total revenue of organizations surveyed accounts for approximately 34% of the total GDP across countries surveyed. We extrapolate the overall economic value generated by agentic AI for surveyed organizations to the surveyed countries by assuming a proportional relationship between economic contribution and the potential for AI agent-driven value creation.

		2025	2026	2027
A.	Number of surveyed organizations		1,500	
B.	Share of business processes expected to be handled by AI agents at level 3 or higher autonomy *(survey data)*	15%	20%	25%
C.	Share of business processes contributing to financial impact *(According to MIT, only 23% of exposed tasks are cost effective to automate using AI technologies within the next ten years)*[70]	3.5%	4.6%	5.8%
D.	Projected GDP growth[71]	3.3%	3.3%	3.3%[72]
E.	Average annual revenue per organization (*survey data)*	$14.7 billion	$15.2 billion	$15.7 billion
F.	Expected revenue growth from AI agents (*survey data)*	14%	20%	25%
G.	Estimated revenue growth (assuming 10– 50% of expectations materialize)	1.4–7.2%	2–9.8%	2.5–12.3%
H.	Estimated revenue growth per organization *(=C*E*G)*	$7 million–$35 million	$13 million–$66 million	$21 million–$107 million
I.	Average cost of goods sold (COGS) per organization[73]	$9.4 billion	$9.7 billion	$10 billion
J.	Expected cost savings from AI agents *(survey data)*	15%	25%	35%

		2025	2026	2027
K.	Estimated cost savings (assuming 10–50% of expectations materialize)	1.5–7.5%	2.5–12.6%	3.5–17.6%
L.	Estimated cost savings per organization *(=C*I*K)*	$5 million–$25 million	$12 million–$58 million	$21 million–$105 million
M.	Total value generated per organization *(=H+L)*	$12 million– $58 million	$24 million–$119 million	$41 million–$204 million
N.	Total value generated over the next three years, per organization		$76 million–$382 million	
O.	Share of organizations with scaled implementation of AI agents	2%	7%	12%
P.	Overall economic value generated by surveyed organizations *(= (O* M upper bound)+((100%-O) * M lower bound)))* *(Assuming that those with scaled implementation will realize 50% of expected benefits and the remaining will realize 10% of expected benefits)*	$19 billion	$46 billion	$92 billion
Q.	Overall economic value generated over the next three years by surveyed organizations		$157 billion	
R.	Overall economic value generated over the next three years by surveyed countries		$456 billion	

Source: Capgemini Research Institute analysis.
*Note: It is assumed that the adoption of AI agents will increase at the same rate as that of Gen AI. Since 2023, the adoption of Gen AI has grown sixfold.

Approach 2: $3.3 trillion in economic value over the next three years in surveyed countries.

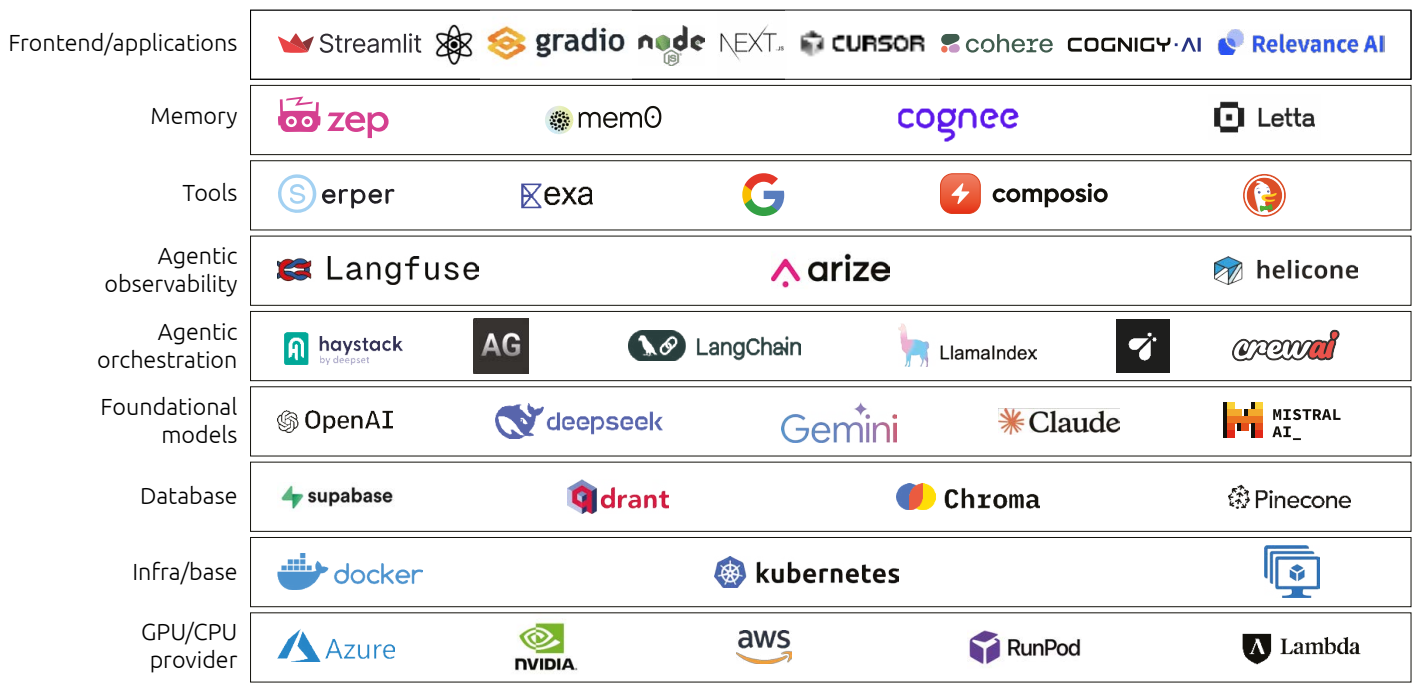
In this approach, we assume that the full value of expected revenue growth and cost savings from agentic AI accrues to all organizations, regardless of their level of scaling.

		2025	2026	2027
A.	Number of surveyed organizations		1,500	
B.	Share of business processes expected to be handled by AI agents at level 3 or higher autonomy *(survey data)*	15%	20%	25%
C.	Share of business processes contributing to financial impact *(According to MIT, only 23% of exposed tasks are cost effective to automate using AI technologies within the next ten years[74])*	3.5%	4.6%	5.8%
D.	Projected GDP growth[75]	3.3%	3.3%	3.3%[76]
E.	Average annual revenue per organization *(survey data)*	$14.1 billion	$14.6 billion	$15.1 billion
F.	Expected revenue growth from AI agents *(survey data)*	14%	20%	25%
G.	Estimated revenue growth per organization *(=C*E*F)*	$70 million	$131 million	$214 million

		2025	2026	2027
H.	Average cost of goods sold (COGS) per organization[77]	$9 billion	$9.3 billion	$9.6 billion
I.	Expected cost savings from AI agents *(survey data)*	15%	25%	35%million
J.	Estimated cost savings per organization *(=C*H*I)*	$47 million	$107 million	$194 million
K.	Total value generated per organization *(=G+J)*	$117 million	$238 million	$408 million
L.	Total value generated over the next three years, per organization		$763 million	
M.	Overall economic value generated by surveyed organizations (=A*K)	$175 billion	$358 billion	$612 billion
N.	Overall economic value generated by surveyed organizations, over the next three years		$1.15 trillion	
O.	Overall economic value generated by surveyed countries		$3.3 trillion	

Source: Capgemini Research Institute analysis.

The AI agents/agentic AI ecosystem - examples of companies and startups with products/services in each layer of the AI tech stack



Source: Capgemini Research Institute analysis.
*Logos and trademarks belong to respective owners. Some players offer products/services that span multiple layers.

References

1. OpenAI website, accessed June 2025.
2. Devin website, accessed June 2025.
3. Manus website, accessed June 2025.
4. Capgemini, “TechnoVision: Top 5 Tech Trends to Watch in 2025,” November 2024.
5. Arxiv, “Measuring AI Ability to Complete Long Tasks,” March 2025.
6. Stanford University HAI, Artificial Intelligence Index Report 2025, 2025.
7. Bond, “Trends – Artificial Intelligence,” May 2025.
8. Stanford University HAI, Artificial Intelligence Index Report 2025, 2025.
9. Reuters, “DeepSeek sparks AI stock selloff; Nvidia posts record market-cap loss,” January 2025.
10. Bond, “Trends – Artificial Intelligence,” May 2025.
11. “At scale” implementation refers to the phase following a successful partial scaling, where several AI agents are generally available within a function or where multiple functions have agents that are generally available.
12. Goldman Sachs, “Gen AI: Too much spend, too little benefit?” June 2024.
13. IDC, “The global impact of artificial intelligence on the economy and jobs: AI will steer 3.5% of GDP in 2030,” August 2024.
14. Goldman Sachs, Gen AI: Too much spend.
15. Capgemini Research Institute, “Generative AI in organizations,” July 2024.
16. Ericsson, “Talk to your network: Igniting the AI revolution in autonomous networks,” March 2025.
17. Siemens press release, “Siemens introduces AI agents for industrial automation”, May 2025
18. Blog, “Google Cloud’s Automotive AI Agent arrives for Mercedes-Benz”, Jan 2025
19. Analytics India Magazine, “Rolls-Royce, EY leverage ServiceNow AI agent orchestrator for complex tasks,” January 2025.
20. The Wall Street Journal, “Everyone’s talking about AI agents. Barely anyone knows what they are,” March 2025.
21. Tech in Asia, “ANZ Bank plans AI agents to boost productivity,” May 2025.
22. WSJ, “Walmart is preparing to welcome its next customer: The AI shopping agent,” May 2025.
23. Investor Nvidia, “NVIDIA Partners With Novo Nordisk and DCAI to Advance Drug Discovery”, June 2025
24. Forbes, ”Transforming Telecom Operations Through Agentic And Generative AI”, Feb 2025
25. Coincentral,” BlackRock Taps AI to Read the Markets, Starting with New Analyst Platform”, June 2025
26. Azumo, “Top AI Agent Development Companies Transforming Work in 2025”, May 2025
27. Aimsresearch, “Fargo Handled More Than 200 Million Requests Without Sending Customer Data to an LLM”, April 2025

28. Oyelabs, “AI Agents Revolutionizing Finance with Smarter Decisions”, February 2025
29. Shopify, “Expanding your AI Horizons, Summer ‘25 Edition, May 2025
30. Forbes, “Fintech’s Latest Trend: AI Agents For Investment Research”, April 2025
31. Github, “GitHub Introduces Coding Agent For GitHub Copilot”, May 2025
32. World Economic Forum, “AI agents could tip the cybersecurity balance towards defenders”, June 2025
33. Microsoft, “Industrial AI in action: How AI agents and digital threads will transform the manufacturing industries”, March 2025
34. Capgemini, “Agentic AI for Enterprise by Capgemini,” accessed June 2025.
35. Prnewswire, “PepsiCo Leverages Salesforce’s Agentforce to Advance AI Agenda”, June 2025
36. Cisco News, “Cisco and Mistral AI partner to deliver on Cisco’s mission to transform the customer experience with AI,” February 2025.
37. Technology magazine, “Why Honeywell & Google Cloud have teamed up on industrial AI,” October 2024.
38. TechCrunch, “Google rolls out Project Mariner, its web-browsing AI agent,” May 2025.
39. Deviniti, “AI Agent: A smart team member in customer service at Credit Agricole,” accessed May 2025.
40. American Automobile Association, “AAA: Fear in Self-Driving Vehicles Persists,” February 2025.
41. Forbes, “New research finds why some surveyed workers don’t trust Agentic AI,” January 2025.
42. Stanford Journal, “Stanford 2025 AI Index reports surge in adoption, investment, and global impact as trust and regulation lag behind,” April 2025.
43. ACRE Campaigns, “Driven Out By AI: How Uber Deactivations Force Drivers into Chatbot Hell and Financial Crisis,” March 2025.
44. Capgemini Research Institute, Harnessing the value of generative AI: Top use cases across sectors, July 2023.
45. Capgemini Research Institute, Harnessing the value of generative AI: Top use cases across sectors (2nd edition), July 2024.
46. DataStax, “New AI agents survey: Trust, control, and reliability remain concerns,” February 2025.
47. White & Case, “AI Watch: Global regulatory tracker,” March 2025.
48. Stanford Graduate School of Business, “Designing AI that keeps human decision-makers in mind,” May 2025.
49. Arxiv, “Collaborating with AI Agents: Field Experiments on
50. MedRxiv, “From tool to teammate: A randomized controlled trail of clinical-AI collaborative workflows for diagnosis,” June 2025.

51. Capgemini Research Institute, “Turning AI into concrete value: The successful implementers’ toolkit,” June 2017.
52. World Economic Forum, “Future of Jobs Report 2025: These are the fastest growing and declining jobs,” January 2025.
53. Microsoft, Work Trend Index Annual Report 2025, April 2025.
54. The Economist, “Welcome to the AI trough of disillusionment,” May 2025.
55. Google for Developers, “Announcing the Agent2Agent Protocol (A2A),” April 2025.
56. Microsoft, “Introducing Microsoft 365 Copilot Tuning, multi-agent orchestration, and more from Microsoft Build 2025,” May 2025.
57. Microsoft, Work Trend Index Annual Report 2025, April 2025.
58. Ibid.
59. Capgemini Research Institute, Gen AI at work: Shaping the future of organizations, October 2024.
60. Microsoft, Work Trend Index Annual Report 2025, April 2025.
61. Capgemini, “Business, meet agentic AI: Confidence in autonomous and agentic system,” May 2025.
62. LinkedIn, LinkedIn skills on the rise 2025: The 15 fastest-growing skills in the US, March 2025.
63. EU Artificial Intelligence Act, “High-level summary of the AI act,” February 2024.
64. ISO, ISO/IEC 42001:2023, 2023.
65. Capgemini, “Business, meet agentic AI: Confidence in autonomous and agentic system,” May 2025.
66. Capgemini, “Business, meet agentic AI: Confidence in autonomous and agentic system,” May 2025.
67. Anthropic, “Introducing the Model Context Protocol,” November 2024.
68. Google for developers, “Announcing the Agent2Agent Protocol (A2A),” April 2025.
69. Cisco, “Internet of AI agents”, January 2025.
70. Goldman Sachs, “Gen AI: Too much spend, too little benefit?” June 2024.
71. IMF, “Global growth: Divergent and uncertain,” January 2025.
72. Assuming constant GDP growth for 2027.
73. Vena, “Industry benchmarks of gross, net and operating profit margins,” August 2024.
74. Goldman Sachs, “Gen AI: Too much spend, too little benefit?” June 2024.
75. IMF, “Global Growth: Divergent and Uncertain, January 2025.
76. Assuming constant GDP growth for 2027.
77. Vena, “Industry benchmarks of gross, net and operating profit margins,” August 2024.

Authors

Meet the experts

Anne-Laure Thibaud
Executive Vice President – Head of AI First Business & Analytics, Capgemini
annelaure.thibaud@capgemini.com

Anne-Laure Thibaud leads a worldwide team accelerating the adoption of Generative and Agentic AI, helping organizations unlock business value through AI-driven transformation. With a focus on designing and operating high-impact solutions in collaboration with key technology partners, Anne-Laure champions new ways of working where human and AI agents collaborate to drive meaningful and sustainable outcomes at scale.

Sergey Patsko
Vice President, Data and AI Group Offer Leader, Capgemini
sergey.patsko@capgemini.com

Sergey Patsko is a VP and Data & AI Group Offer Leader at Capgemini. He leads the team of Capgemini Offer Leaders in the core area of the Group – Data & AI. By developing offerings like Generative AI or Agentic AI, Capgemini enables businesses to optimize processes, create personalized customer experiences, and uncover opportunities for growth. Prior to joining Capgemini, Sergey worked on applications of AI for automation of manufacturing processes and Digital Transformation for Fortune 500 companies at General Electric. He was at the forefront of developing IoT platforms and applying AI to industrial operations. Sergey has a rich venture capital experience, having collaborated with AI startups in Silicon Valley. He holds a PhD in Applied Mathematics and a Master's degree from Stanford Graduate School of Business.

Pascal Brier
Group Chief Innovation Officer and member of the Group Executive Committee, Capgemini
pascal.brier@capgemini.com

Pascal Brier is the Group Chief Innovation Officer and member of the Group Executive Committee at Capgemini, a role he has held since 2021 after a long career in leadership positions at Microsoft, AT&T and NCR. In his current position, Pascal oversees Technology, Innovation and Ventures for the Group worldwide. His efforts center on tracking analyzing, and implementing more than 1,000 emerging technologies annually. Under his guidance, the company constantly strives to be at the forefront of technological innovation, making significant impacts on the world of business and wider society.

Itziar Goicoechea-Martinez
Senior Director, AI and Generative AI Offer, Capgemini
itziar.goicoechea-martinez@capgemini.com

Itziar brings over 15 years of international leadership in technology and data, with deep expertise in machine learning across the e-commerce, technology, and pharmaceutical sectors. She previously served as Director of Data Science at Adidas and worked in machine learning for Bayer and Apple. She holds a PhD in Physics.

Authors

Meet the experts

Marjolein Wenderich
Vice President, Global MD – Workforce and Organization, Capgemini
marjolein.wenderich@capgemini.com

Marjolein is the Global Head - Workforce & Organization at Capgemini Invent. Previously associated with Alliander, Atos Consulting and KPMG in both consulting and managerial roles. With over 25 years of experience in the public and corporate market, she has helped the organizations reimagine work, workforce evolution and workplace models in the age of digital disruption. She specializes in driving enterprise-wide transformation through agile operating models, skills-based workforce planning and AI- enabled talent ecosystems. A trusted advisor and speaker, Marjolein brings a unique blend of strategic insight and tech-enabled execution to future-proof organizations in a rapidly evolving world of work.

Steve Jones
Executive Vice President – Data Driven Business and Generative AI, Capgemini
steve.g.jones@capgemini.com

Steve is the EVP for Data Driven Business & Agentic Architecture at Capgemini, he is a published author and contributor to numerous journals and conferences on the challenges of the business adoption of new technologies. His focus today is on how companies prepare themselves for the 50% AI future.

Robert Engels
Vice President and Head of Generative AI Lab, CTO, Insights and Data, Capgemini
robert.engels@capgemini.com

Robert (Dr. Bob) Engels is serving as CTO, AI for the Insights & Data Business Line. He has a long track record in the fields of AI, cognitive psychology, and knowledge presentation. Before joining Capgemini, he worked for startups, angel investors, and the Oslo municipality, had his own startup, oversaw radio and television production infrastructures with AI, and built a digital (AI-based) experience center for popular music. Robert holds a master's degree in cognitive psychology and AI, and a PhD in AI and reasoning.

Daniela Rittmeier
Head of Generative AI Accelerator, Germany, Capgemini
daniela.rittmeier@capgemini.com

Daniela Rittmeier is a Supervisory Board member, a trusted C-level-advisor and the Head of Capgemini's Generative AI Accelerator. She brings more than two decades experience in initiating, developing and realizing transformation in health, life science, automotive, IT & beyond.

Daniela gained deep dive automotive industry knowledge in the decade she was part of the BMW Group. Daniela Rittmeier was responsible for the integration of Artificial Intelligence technologies based on the realization of the first autonomous driving platform, the corporate AI strategy, the AI Hub of the Center of Excellence incl. a portfolio of ~600 data driven use cases along the entire value chain. As multiple awarded thought leader she is focusing on data value creation and sustainable human centric solutions. Daniela is committed to empower Women in Tech, Coding for Kids and the digital sovereignty of society.

Authors

Meet the Capgemini Research Institute

Jerome Buvat
Head, Capgemini Research Institute
jerome.buvat@capgemini.com

Amol Khadikar
Director, Capgemini Research Institute
amol.khadikar@capgemini.com

Vaishnavee Ananth
Senior Consultant, Capgemini Research Institute
vaishnavee.a@capgemini.com

Abhiruchi Masurkar
Senior Consultant, Capgemini Research Institute
abhiruchi.masurkar@capgemini.com

The contributors would like to thank, Franck Greverie, Mark Oost, Mark Roberts, Alex Marandon, Andreas Sjostrom, Andy M Feinstein, Andy Vickers, Ralf Bus, Anne-Violaine Monnie-Agazzi, Juliette Merour, Weiwei Feng, Jiani Ziang, James Wilson, Sebastien Guibert, Marek Sowa, Prasad K Shyam, Ajay Mohan, Claudia Crummenerl, Elisa Farri, Gabriele Rosani, Eric Reich, Kary Bheemaiah, Courtney Pace, Mathilde Gailledreau, Miguel Viedma, Etienne Grass, Ramon Angel Antelo Reguengo, Jonathan Aston, Lucy Mason, Javier Moreno, Bashkim Berzati, Karine Sacepe, Alvaro Cuya, Nicolas Gaudilliere, Menno Van Doorn, Joakim Wahlqvist, Aashish Sharma, Vincent Biraud, Pravin M Amnieh, Dheeren Velu, Efi Raili, Alex Smith-Bingham, Daniel Garschagen, Vivian Yang, Angela Sahi, Larry Villaret, Damien Stulemeijer, Máté Vincze, Meenu Dahiya, Shilpashree S, Susanna Östberg, Fleur DU PASQUIER, Toni Sullivan, Raveena Sharma, Bridget N Pietsch, Martyn Wronkowski, Subrahmanyam Kanakadandi, Dominique Banon, Donald Francis, Shreya Bansal, Punam Chavan, Aparajita Paul, Vibha Palekar, Manish Saha, Amitabha Duttu and Jaydeep Neogi for their contributions to the research.

About the Capgemini Research Institute

The Capgemini Research Institute is Capgemini's in-house think tank on all things digital. The Institute publishes research on the impact of digital technologies on large traditional businesses. The team draws on the worldwide network of Capgemini experts and works closely with academic and technology partners. The Institute has dedicated research centers in India, Singapore, the United Kingdom, and the United States. The Institute was ranked #1 in the world for the quality of its research by independent analysts for six consecutive times - an industry first. Visit us at www.capgemini.com/researchinstitute/

For more information, please contact:

Central team:

Sergey Patsko
Vice President, Data and AI Group Offer Leader, Capgemini
sergey.patsko@capgemini.com

Anne-Laure Thibaud
Executive Vice President, Head of AI First Business & Analytics, Capgemini
annelaure.thibaud@capgemini.com

Itziar Goicoechea-Martinez
Senior Director, AI and Generative AI Offer, Capgemini
itziar.goicoechea-martinez@capgemini.com

Marc Chemin
Executive Vice President, Global Sales Officer, Insights and Data, Capgemini
marc.chemin@capgemini.com

Mark Oost
Vice President, AI and Generative AI Group Offer Lead, Capgemini
mark.oost@capgemini.com

Rajesh Iyer
Vice President, Global Head of AI&A, Capgemini Financial Services
rajesh.iyer@capgemini.com

Regional team:

North America

Ajay Mohan
Head of AI, Analytics, and Data Science, Center of Excellence, Insights and Data North America, Capgemini
ajay.mohan@capgemini.com

India & APAC

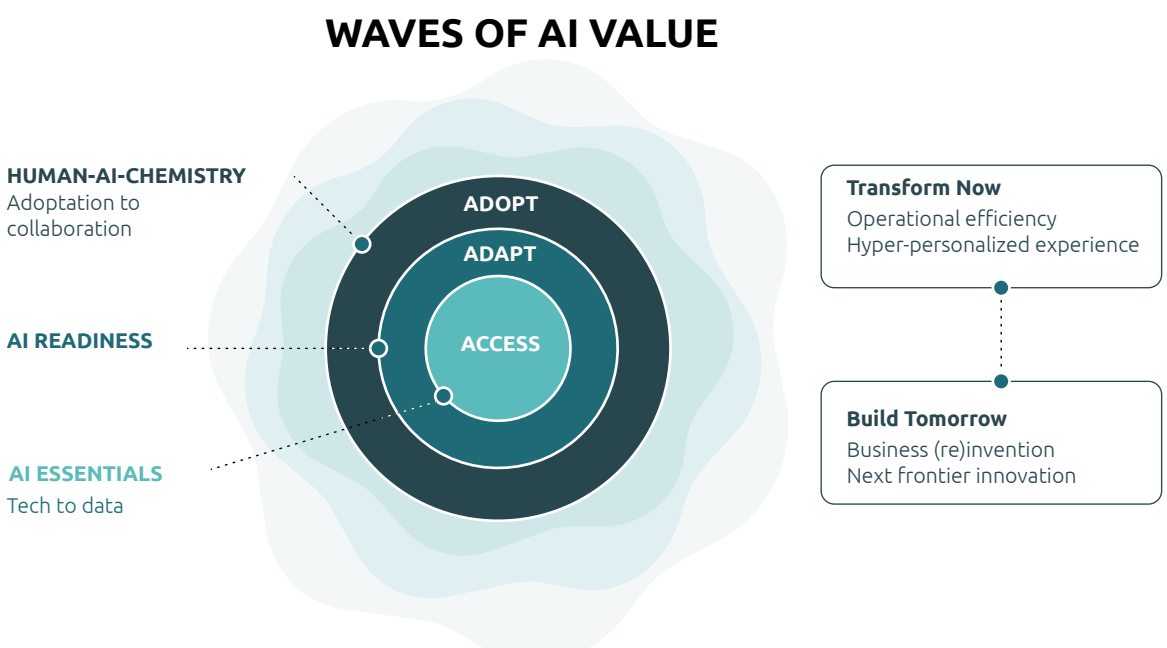
Balasubramaniam Natarajan
Vice President, Generative AI & Analytics
bala.natarajan@capgemini.com

UK & Europe

Craig Suckling
Vice president, Head of AI, Capgemini Europe
craig.suckling@capgemini.com

Resonance AI framework by Capgemini

The Resonance AI framework by Capgemini provides a sequential approach to the conceptualization, structuring, and implementation of successful AI-driven transformation. It helps business leaders realize AI's potential and achieve market leadership regardless of the industry. Anchored in transformation strategy, the Framework helps integrate operations and culture while accelerating AI value creation– to both transform today and build for tomorrow.



AI essentials

To access the transformative power of AI, organizations must establish 'Intelligence-as-a-Service.' That includes scalable and robust enterprise data foundations combined with advanced language and vision models, and applications with built-in AI capabilities. These provide the foundation to build, operate, and scale AI with real, enterprise-specific impact.

AI readiness

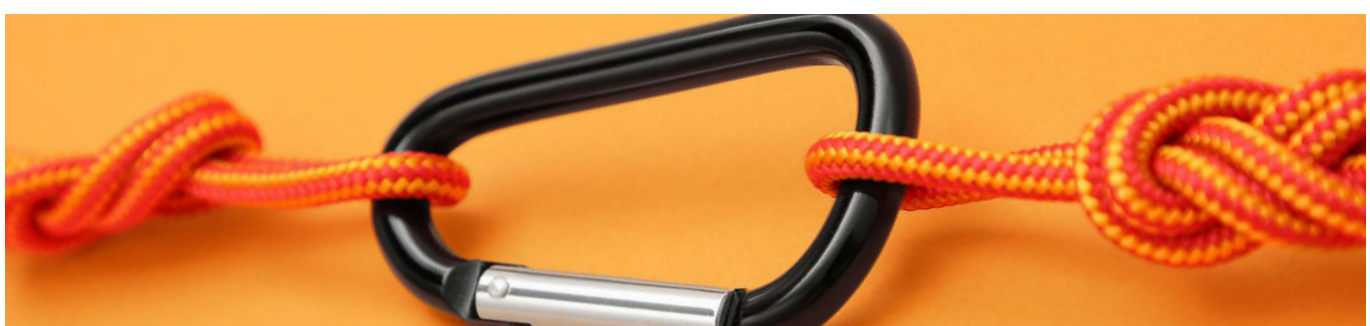
Adapting AI to an organization's context requires the right enablers and guardrails to secure, govern, customize, and operationalize AI. Success hinges on the ability to empower an organization to scale AI while ensuring secure, ethical, and aligned organizational AI capabilities deployed on trusted Data foundations and managed as business resources.

Human-AI chemistry

Organizations adopt hybrid forms of collaboration by designing the clear roles and intuitive interactions that enable seamless collaboration between humans and AI. This mutual reliability and collaboration defines 'human–AI chemistry'– the new alchemy of innovation and defining success factor in your AI journey.

Waves of value

With the technological, governance and collaborative foundations in place, AI value creation is poised for acceleration across an organization, ready to deliver the operational efficiency, personized experiences, business reinvention and next frontier innovation that enable an organization to transform today and build for tomorrow.



Driving enterprise transformation through seamless, scalable & intelligent Agentic AI integration

AI agents are autonomous, goal-oriented, context-aware, adaptive, proactive, and language-aware enabling 24/7 hyper-automation of business and IT operations for tasks and inputs that are variable by nature. They interact with users and perform tasks autonomously, making human-AI interactions more natural and efficient.

Agentic AI for Enterprise by Capgemini

As AI agents transform the way businesses operate, leading to unprecedented levels of productivity, scalable efficiency and innovation, we help organizations navigate the complexities of implementing agentic AI solutions, bringing robust governance frameworks that allow compliance, scalability, and consistent performance. We also address strategic objectives such as:

Process based methodology

By adopting a process-based methodology for an AI based transformation we ensure we deliver significant ROI due to the end- to-end approach.

Implementing AI agents at scale

We select the most suitable technology per agent, develop, integrate them into the IT system, orchestrate and control them, and ensure trust

Adapting operating model

By adjusting the organization and enterprise processes and improving the needed skills. We propose different models of collaboration between human and AI agents.

By embracing agentic AI, businesses can significantly enhance operational efficiency through seamless collaboration between AI agents and human teams. These AI agents act as powerful knowledge and capability multipliers, enabling teams to deliver greater value and drive growth.

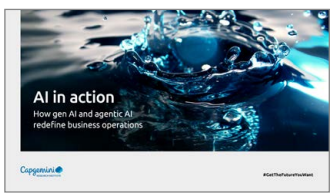
Our partnership with NVIDIA in building over 100 bespoke AI agent-driven solutions tailored to various industry use cases, from life sciences, telco or financial services to manufacturing and retail, and also our strategic partnership with Google Cloud to revolutionize CX across industries with agentic AI, is the testament to the act that the future of enterprise operations lies in the seamless integration of AI agents working together with humans and under their control.

More on our Agentic AI offerings: https://www.capgemini.com/solutions/agentic-AI-for-enterprise-by-capgemini/

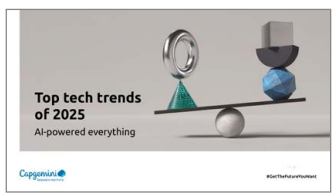
This report is a part of Capgemini Research Institute's series on Generative AI

*Upcoming reports
To find out more, please go to https://www.capgemini.com/insights/research-institute/

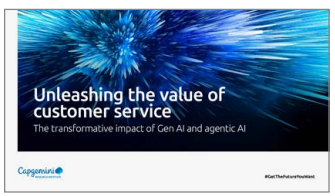
More Capgemini Research Institute publications



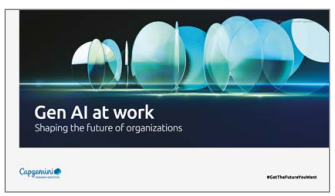
AI in action: How gen AI and agentic AI redefine business operations



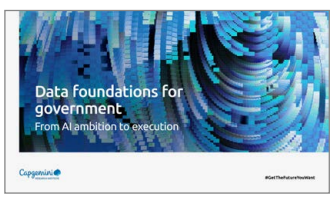
Top tech trends of 2025: AI-powered everything



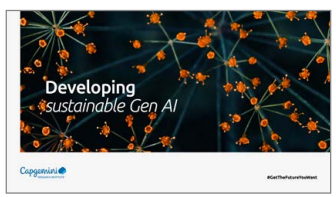
Unleashing the value of customer service: The transformative impact of Gen AI and agentic AI



Gen AI at work: Shaping the future of organizations



Data foundations for government: From AI ambition to execution



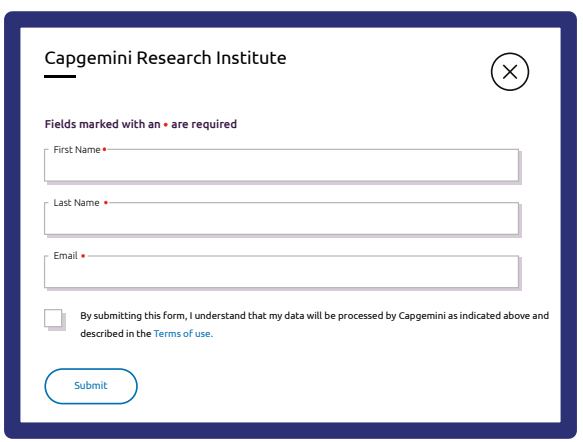
Developing sustainable Gen AI

AI and Generative AI in cybersecurity

Data-powered enterprises: The path to data mastery

Subscribe to latest research from the Capgemini Research Institute

Receive copies of our reports by scanning the QR code or visiting
https://www.capgemini.com/capgemini-research-institute-subscription/



Notes

Notes

About Capgemini

Capgemini is a global business and technology transformation partner, helping organizations to accelerate their dual transition to a digital and sustainable world, while creating tangible impact for enterprises and society. It is a responsible and diverse group of 340,000 team members in more than 50 countries. With its strong over 55-year heritage, Capgemini is trusted by its clients to unlock the value of technology to address the entire breadth of their business needs. It delivers end-to-end services and solutions leveraging strengths from strategy and design to engineering, all fueled by its market leading capabilities in AI, generative AI, cloud and data, combined with its deep industry expertise and partner ecosystem. The Group reported 2024 global revenues of €22.1 billion.

Get the Future You Want | **www.capgemini.com**