

Deloitte.



Automation in the Age of With™
Your business processes with speed and precision

We are now in the Age of With,TM
when companies are harnessing the
power of “with” to identify unique
advantages through analytics and
artificial intelligence.



Automation with intelligence

Deloitte's second edition of the *State of AI in the Enterprise* survey confirms that early adopters of artificial intelligence (AI) are using AI technologies to effect positive change for their organizations.

Overall, survey respondents are bullish on AI. Eighty-two percent claim a positive financial return on their AI investment and close to nine in 10 plan to invest more in the future.¹

Among these early adopters, 78 percent of respondents think AI-based worker augmentation will lead to new ways of working.

And yet mention AI-driven automation to most business executives, and they think of robotic process automation (RPA) or bots performing highly repetitive tasks to create efficiencies and reduce costs.

That's a start.



Automation with intelligence

But with intelligent automation, those same business process automation capabilities can also be applied to high-value, decision-making tasks to help organizations thrive in the Age of With™. The Age of With is about human collaboration made greater with the machines we invent. It's about business leaders shifting their thinking from humans versus machines to humans with machines. It's about embracing technology transformation and new ways of doing business to gain competitive advantage and be more agile.

Intelligent automation (IA) combines AI with automation. When this is brought together with RPA, it gives bots cognitive and sensory abilities that can increase the number and breadth of business processes which can be automated and thus the value that can be captured.

The potential opportunities are significant: greater speed, more precision and accuracy, new, richer data enabling better decisions, and increased workforce capacity that frees workers to focus on higher-level, more fulfilling and value-add tasks.

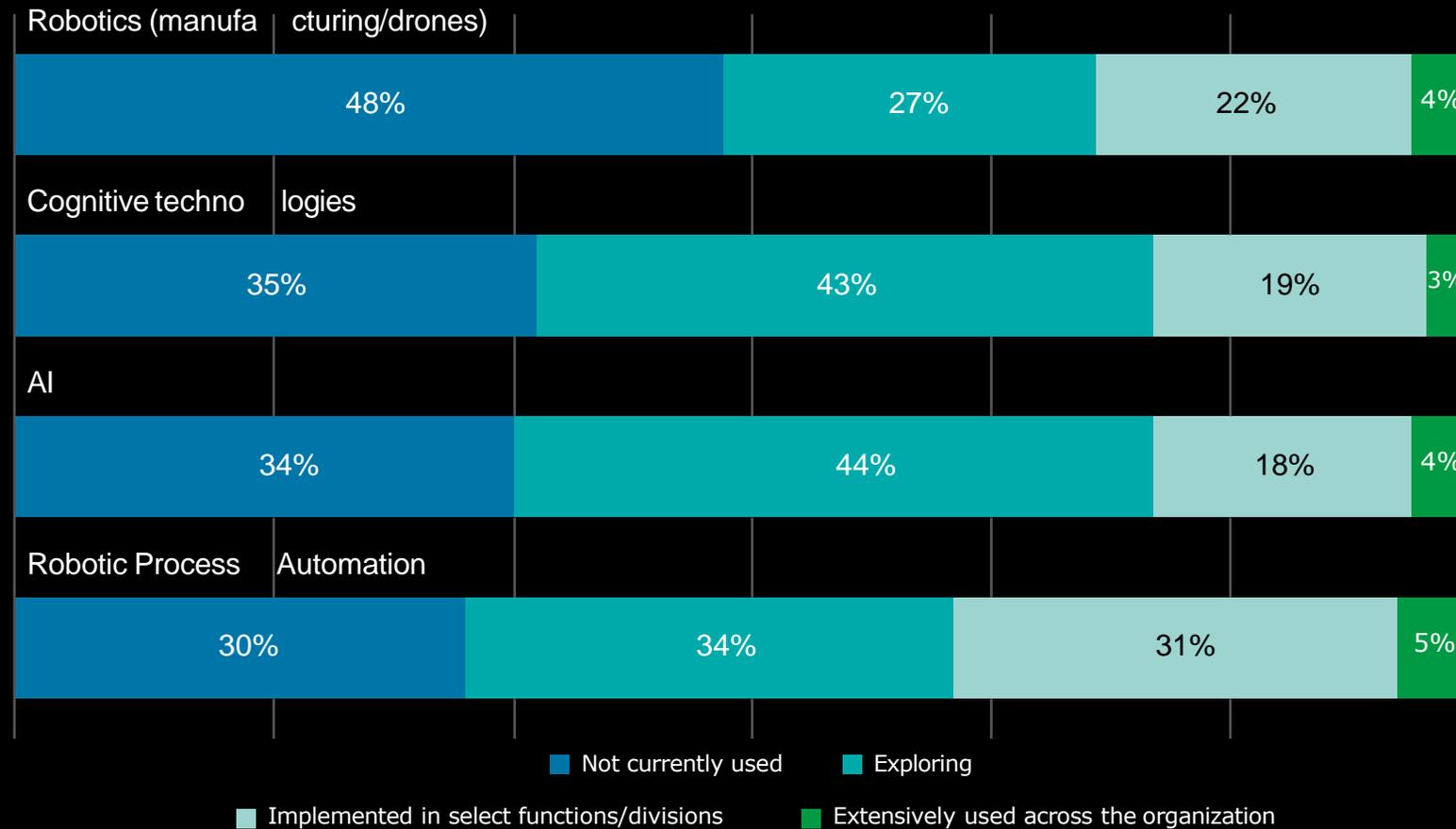
Yet for organizations to embrace the Age of With when it comes to automating processes, it will require them to think about their workforce in a new way—a holistic way. That means a company's organizational structure shows digital workers right alongside human workers, and it takes a progressive view of intelligent automation that transcends conventional notions of enterprise software or outsourced solutions.

In the Age of With, AI with automation can deliver business processes with speed and precision, and a human workforce with the freedom to focus on what is important.

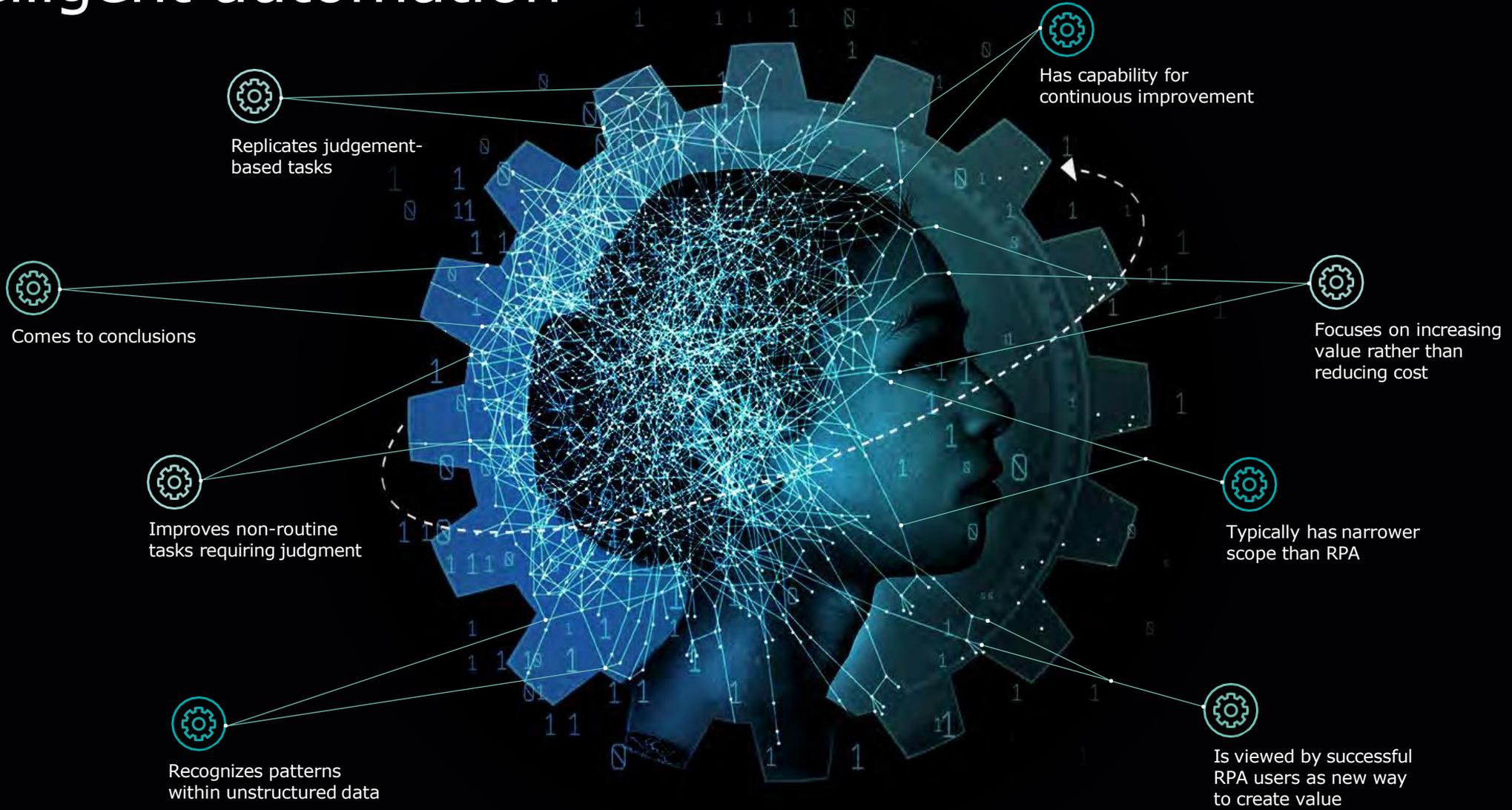


AI, cognitive technologies and RPA are already here

A majority of organizations surveyed in Deloitte's 2019 Global Human Capital Trends survey are already either exploring, implementing in select functions/divisions or using these technologies extensively across their enterprise.²



Intelligent automation



Beyond bots

When people encounter something new, it's human nature to compare it to things we already know. But executives seeking to adopt intelligent automation may find it difficult to realize its benefits if they don't consciously set aside a few pre-existing beliefs. The Age of With requires thinking beyond bots.

The first belief to shed is that intelligent automation is just like conventional software.

While most conventional software can run on its own with occasional updates, intelligent automation is a digital worker that mimics the work of human employees. As it moves from application to application, it will encounter variability in data and changes in systems and business processes: changes that can bring its work to a halt.

Like a human employee, the digital worker will need to learn how to modify its approach in the face of variables that can be as simple as a website restructuring its pages or a new column being added to a spreadsheet. What this means for organizations is the need to monitor and create a process for retraining their digital workforce when this occurs.

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Beyond bots

The second belief to leave behind is that intelligent automation is like conventional outsourcing.

In the early days of shared services outsourcing, many executives believed outcomes were the responsibility of the outsourcer. However, they quickly learned the business owner needed to retain responsibility for project success.

Similarly, if an automation is not achieving the goals set out in its service level agreement or it just breaks, organizations cannot view it as an IT problem. The business owner must have full-stop accountability for his or her digital workforce.

Executives should also think of digital workers as entities that need managing. In the same way a manager reviews the quality and output of his or her human workers periodically, the digital worker requires this same oversight. Fortunately, it comes with a wealth of digital data that can show interesting insights about where programs aren't working or can't be handled by automation. To learn more, see [Scaling robotic process automation \(RPA\): Are you ready to manage your digital workforce?](#)

It all comes back to thinking beyond bots. Viewing digital workers as a part of the workforce, versus software applications or outsourced functions, can help put organizations on the path to enhancing human judgement and delivering actionable insights.

When an automation isn't doing its job, organizations can't say it's an IT problem. The business owner has to have full-stop accountability for the digital workforce.



Advancing along the continuum

According to Deloitte's most recent Global Robotics survey, 53 percent of respondents have already started their RPA journey.³ While a simple rule-based RPA is currently most commonly used, it provides a compelling path to more advanced technologies.

Organizations that are ready to follow that path should look at what their automations are doing and, even more importantly, are not doing—i.e., where does automation pass the process to a human, and what does the human need to do at that stage?

Looking at those handoffs can help organizations identify opportunities to leverage probabilistic inference or algorithmic analysis of the data to make predictions. By going from clearly defined IF-THEN logic to machine learning algorithms,

organizations can bring intelligent automation to more of the work done by humans and leave human employees to focus on tasks requiring unique, innately human skills. At the same time, moving along the continuum and showcasing the ability to execute complex, knowledge-based tasks is a sound way to help increase confidence and understanding across the organization.

It can be tempting to try to justify an RPA project by zeroing in on the benefits of reducing headcount. But Deloitte's RPA survey shows top-line and productivity benefits can outperform cost benefits. Eighty-six percent of respondents say their expectations of productivity improvement from RPA were met or exceeded, while only 61 percent say that in relation to cost reduction expectations.⁴

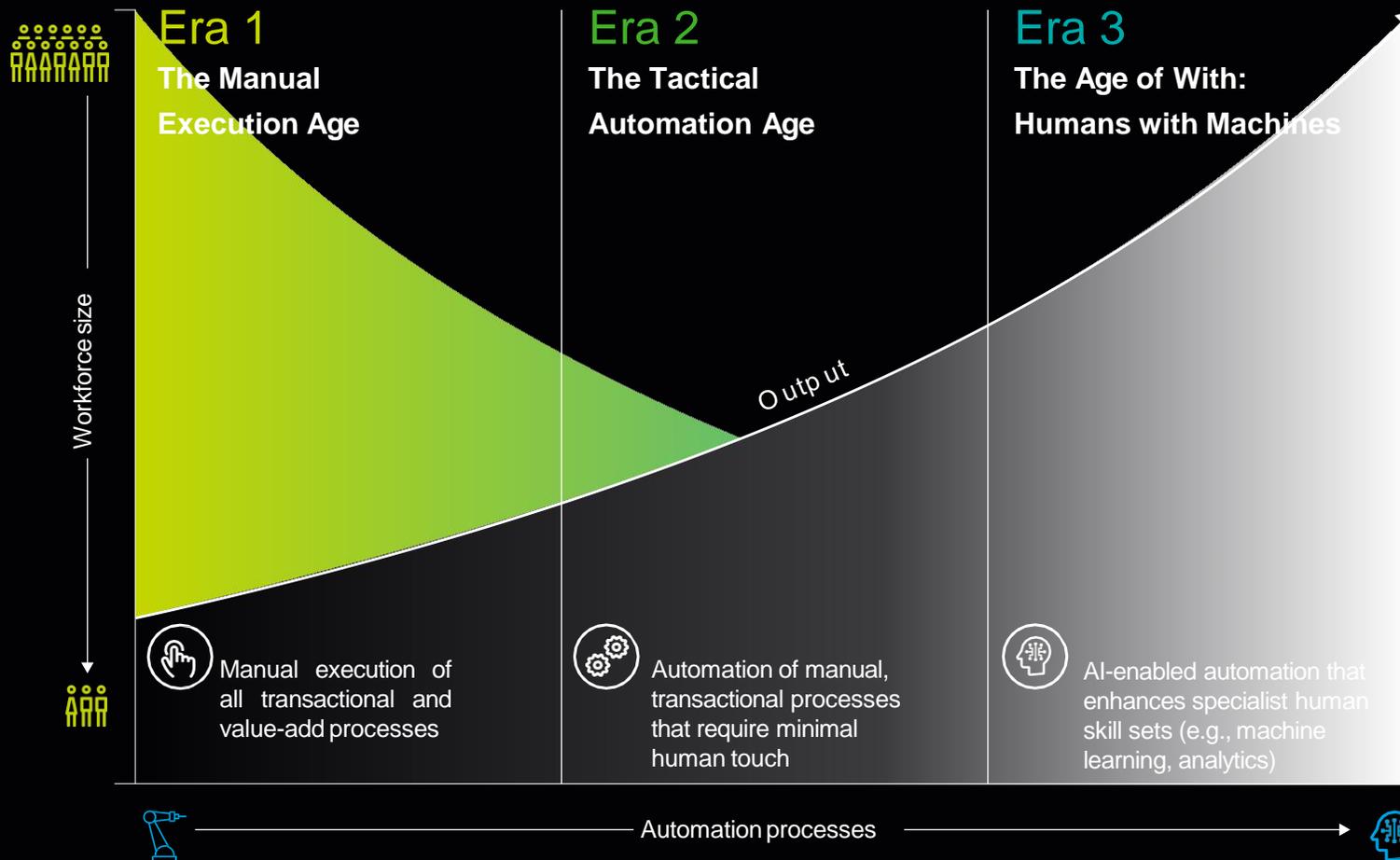
While it can be easier to quantify tangible benefits like headcount and error reduction and faster process execution, substantial value can be derived from harder-to-quantify gains: improved customer experience and engagement, enhanced employee experience, improved decision making, and creation of a digital data trail.

The Age of With is increasingly on the agenda. Among organizations surveyed by Deloitte that have implemented or scaled RPA, 44 percent have identified suitable solutions and a further 28 percent are already implementing intelligent automation.⁵



The evolution of automation

From manual execution to humans with machines



Transactions transformed

Examples of intelligent automation at work



Reduce the time it is taking employees to validate thousands of company records from weeks to hours by combining machine learning with RPA for address match and verification.



Speed up time to insights by processing invoices using intelligent text extraction with RPA, replacing a manual and error-prone task of extracting data to populate planning and tracking systems.



Reduce long wait times and processing errors while reducing customer frustration by using a 'Start Service' chatbot that gets its intelligence from natural language processing with RPA.



5 questions

Answer these five questions to help add speed and precision to business processes.

1

Is your approach to automation holistic and enterprise-wide?

2

Is your automation program supported by business, IT and functional leadership?

3

Do you have an initial pipeline of opportunities with clearly defined ROI and timeline?

4

What implementation prerequisites do you need to address before starting an automation program (e.g., functional centralization, process standardization, digitization, etc.)?

5

How prepared are you to instill a culture of innovation and foster adoption of emerging technologies?



Let's talk

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Endnotes

1. *Deloitte Global State of AI in the Enterprise, 2nd Edition, 2018.*
2. *Deloitte Global Human Capital Trends Survey, 2019.*
3. *Deloitte Global Robotics Survey, 2017.*
4. Ibid.
5. Ibid.





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