

What can AI help us with?

There are many benefits to using AI technology to make our personal and work lives better. These benefits often help us do more (increasing our capacity) and doing things we couldn't do before (extending our capabilities):

Increasing capacity:

AI tools can automate tasks for us, which saves time and allows us to focus on other things.

Extending capabilities:

AI tools can help us do things that we couldn't do on our own before.

How can it increase our capacity?

AI technology can help us do more by taking over some of our tasks, giving us more time and energy for other things. Here are a few examples:

AI-Powered transcription:

Imagine an AI tool that writes down everything said in a lecture or meeting in real-time. This means students can pay full attention without worrying about taking detailed notes.

AI for Organisation:

An AI scheduling app can help students organise their homework, exams, and class schedules. It can automatically plan study sessions and set reminders, making it easier for students to manage their time.

Chatbots for Customer Service:

For a small business, AI chatbots can answer simple customer questions, like when the store is open or how much something costs. This frees up customer support staff to handle more complicated issues.

AI-Supported Language Learning:

An AI-powered language app can adjust lessons to fit each student's speed and skill level. It gives quick feedback and changes the difficulty of the lessons when needed, making learning more personalised and fun.

How can it extend our capabilities?

AI can help us do things that would be very hard or even impossible to do on our own. Here are some examples:

AI for Real-Time Translation:

AI translation tools can instantly translate text, speech, and images between many languages. This allows us to communicate across language barriers right away, something that would be very difficult for an individual to do on their own.

AI for Simulating Experiments:

AI-powered virtual labs can simulate real-life science experiments, letting students conduct them safely and as many times as they need. This gives students access to high-quality, interactive lab experiences, even if their college doesn't have the physical equipment.

AI for Fraud Prevention:

AI systems can detect fraudulent transactions by analysing patterns in real-time across thousands of transactions. This allows us to secure financial transactions and prevent fraud much faster and on a larger scale than human analysts could.

AI to Predict Climate Change:

AI can predict changes in the climate and model environmental impacts more accurately than traditional methods. This helps us understand and respond to climate change better by providing more precise insights that were previously too complex to figure out.

Can it do both?

Yes, AI tools can, and often, help us do both—extending our capabilities and increasing our capacity. These categories aren't strict rules about what AI can do, but they help us understand some of its uses.

In reality, a single AI tool might help us in both ways at the same time.

For example, AI in Graphic Design:

A graphic design tool uses AI to suggest design elements and layouts, making it easier for users to create attractive presentations and projects.

Extends Capabilities:

It helps students create professional-quality designs without needing to be experts in graphic design.

Increases Capacity:

It speeds up the design process, allowing students to create more content in less time.

Benefits case study: AI in assistive technology

AI has been helping disabled users for a long time through its use in assistive technology.

This technology includes tools like speech-to-text software, which helps people who have difficulty typing or writing by turning their spoken words into written text. Another example is voice-activated helpers like Siri or Alexa, which can make things easier for people who have mobility problems.

As AI keeps getting better, it's being used in more and more assistive devices and tools. For example, Microsoft's Seeing AI app can use AI to describe what's happening in a photo or a scene, creating detailed descriptions of objects, people, and even their surroundings. It now also uses generative AI to power an 'Ask SeeingAI' chatbot for users so they can ask questions about the image they've submitted or for more detailed descriptions.

These AI tools not only help with daily tasks but also give people more independence and access to information.

When is AI the right tool for the job?

We've explored a lot of potential benefits of AI tools and seen the opportunities they can present to save us time and help us explore new possibilities. However, it's important to think carefully about when and how we use AI tools.

For instance, we might be keen to automate a task and have that free up some time but, in some cases, it's the act of completing the task that is important and not the end result. For example, say you've undertaken a week of work experience in the industry you're keen on working in. After the week you're asked to write a reflective piece about your experiences and how they've affected your feelings about working in the industry. If for instance you heavily relied on a generative AI tool to produce ideas and text for your reflective piece, instead of thinking and reflecting on it yourself, then you wouldn't have achieved the real purpose of writing it, of expressing your own ideas and developing your thinking on your real-world experience.

If we let AI tools do too much of this work for us, we miss out on the opportunity to develop ourselves. We also might not agree on what tasks should be automated at all – after all, we don't always agree with others on what is boring or what is interesting!

So, while these can be powerful tools, we should always consider whether they're the right tool for the job.

Key Points

- AI tools can increase our productivity by automating tasks, freeing up time for us to focus on other important activities.
- AI can also enhance our abilities by allowing us to do things that would be difficult or impossible on our own.
- We need to decide which tasks are suitable for AI tools to automate and which aren't.