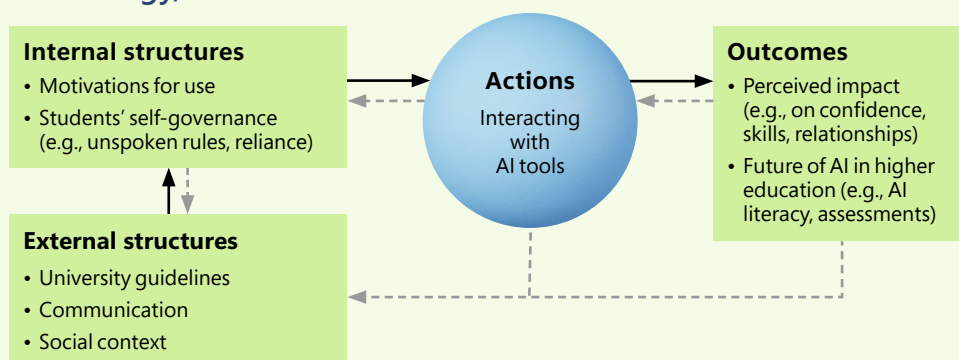


How Students and Educators See AI in Higher Education

Generative AI is already transforming higher education, and students, educators, and institutions have differing attitudes and levels of access to the technology. Microsoft Research has produced a “snapshot in time” study of AI in higher education to understand how practices and norms are developing around practical and policy realities. We also discuss what this might mean for the future.

Framework of interactions between agency, technology, and outcomes



Surveys and semi-structured interviews were conducted with 26 university students and 11 educators from two UK universities between December 2023 and February 2024. Black arrows reflect aspects that were explored in the data, and dashed grey arrows reflect potential interactions that should be explored in future research.

Source: [The New Calculator? Practices, Norms, and Implications of Generative AI in Higher Education](#)

An Educational Enhancement that Requires Engagement

Students used AI tools like Copilot and ChatGPT as:

Tutor	Assistant	Ideation partner
Students asked AI to explain study materials , offer feedback on work, and guide them through tasks.	Students asked AI to summarize information and search for information. They also used it to help structure their work.	They asked it questions to help them spark ideas , which they viewed as a collaborative activity.

Student “I first do my own brainstorming, and then I see like, okay, what does ChatGPT have to say about this?”

Educator “I worked especially with one student I was mentoring for a paper, and together we used it to explore how it could be helpful for him in writing the paper. And he was not an English speaker, so there were some issues with language, and I was going through all the possibilities of how he could use it.”

They also said it was:

Available and efficient	Helpful in steering thinking	Complementary to traditional learning
<p>Students said that AI was available outside of standard office hours and over the holidays, enabling round-the-clock support. AI could also save them time by explaining material.</p>	<p>They reported it could help them overcome creative blocks, and that even incorrect responses by AI tools could serve to stimulate their thinking.</p>	<p>Many said AI helped them learn beyond the school-provided material, and they sometimes used it to reframe the material from a different perspective.</p>

Student "I've read the stuff that the Uni sent, but I just want a bit more. I might then ask it [...] what would you suggest reading further?"

A Need for Ongoing Conversations and Clear Guidelines

Students developed strategies to overcome the limitations of AI, and educators saw it as a useful support, but both groups were anxious about how to have fruitful discussions.

Educators	Students
<p>... felt unclear on current rules and guidelines for how AI should be used.</p> <p>... felt unable to talk openly about the use of AI.</p> <p>... felt that students should continue to produce original ideas themselves, with AI as a support, not a replacement.</p> <p>... were unsure about the rules and how to communicate them to students, reporting concerns about "playing detective."</p>	<p>... tended to be unaware of guidelines or had not read them, but many assumed they would be focused on plagiarism.</p> <p>... discussed AI use freely among themselves.</p> <p>... were aware of the limitations of AI tools and developed strategies to avoid overreliance on the technology.</p> <p>... were confused about how much they could use AI and how assignments would be evaluated, creating an atmosphere of disconnect and "plagiarism anxiety."</p>

Educator "It's very much a playground. Everyone's kind of testing it out. You know what is useful in what it can do, and what its limitations are. But I think with that, hopefully we'll develop some clearer guidelines and pointers for what it might be valuable to use for and what not to use it for."

Student "You can interrogate it to check that it's saying all the right things, and then you can also go back to the original paper and read that, and cross-check it and see if that makes sense to you."

Outcomes and the Future Role of AI in Education

Both students and educators want AI to be more integrated into the learning process as a complement to other learning methods. But both groups need help in a few areas:

- They worry that overreliance on AI will keep students from developing crucial skills, especially problem solving, writing, and critical thinking.
- They fear losing the interpersonal connection between educators and students.
- They see the need for new ways to assess the academic integrity of work that incorporates the use of AI.

Students and educators **want training and open communication** about the opportunities and risks of AI in education, as well as clarity around use guidelines, boundaries, and expectations. But they are concerned that pervasive plagiarism anxiety holds them back from having important conversations around how AI should be used.

Next Steps to Consider

It's still early days and more research is clearly needed, but a few guiding principles are beginning to emerge.

- Both students and educators should be involved in guideline development.
- Students need to be able to explore small-scale opportunities to try using AI to support their learning. For example, educators could incorporate AI into assignments and explain the steps taken to use AI for the task.
- Training should include exposure to errors in AI output to help develop the ability to recognize mistakes.
- AI-enabled personalized learning should be designed to explicitly include roles for collaborative learning and interpersonal interaction between students and educators.