

# EXPLORING STUDENT PERCEPTIONS AND ACCEPTANCE OF ARTIFICIAL INTELLIGENCE (AI)-GENERATED VIDEOS IN TERTIARY CHEMISTRY: A PILOT STUDY

Alexandra Yeung<sup>a</sup>, Phillip Koh<sup>a</sup>, Robert Atkin<sup>b</sup>, and Dino Spagnoli<sup>b</sup>

Presenting Author: Alexandra Yeung ([alexandra.yeung@curtin.edu.au](mailto:alexandra.yeung@curtin.edu.au))

<sup>a</sup>School of Molecular and Life Sciences, Curtin University, Perth WA 6185, Australia

<sup>2</sup>School of Molecular and Life Sciences, University of Western Australia, Crawley WA 6009, Australia

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**SUBTHEME:** Other

The emergence of Generative AI technology, like ChatGPT, has taken the public's attention in all different fields and of all different ages. In terms of Higher Education, there are some concerns with how the use of this technology is managed and how the technology can be introduced to students. We understand students will be using AI to help in the completion of their assignments. However, we are unaware of studies that have asked students about their acceptance of AI-generated teaching videos in their chemistry education.

In this pilot study, we conducted a survey with students enrolled in chemistry units during semester 1 2025 at the University of Western Australia and Curtin University. The online survey started with a two-minute example AI generated teaching video. Students were then asked to complete a series of questions which was based on the Technology Acceptance Model (TAM). The survey probes several variables which is essential to understand if a student will accept this technology. These variables include perceived ease of use, perceived usefulness and intention to use. Moreover, the survey has been extended from its original design to include embodiment, which will probe variables such as human likeness, credibility, learning facilitation, and engagement.

At Curtin University, an additional survey was distributed to explore students' knowledge and attitudes about Gen AI and factors influencing these attitudes. Semi-structured interviews were conducted gain a deeper understanding of student responses to the survey.

This presentation will discuss the TAM and present the preliminary results of this study.

## REFERENCES

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