

# Does ChatGPT Add Value to University Students' Academic Performance?

Parveen Kaur<sup>1\*</sup>, Arif Jawaid<sup>2</sup>, Rochelle Ooi Jin Qi<sup>3</sup>, Raes Dashreen bin Che Mohd Rokman<sup>4</sup>, Sadra Selmah Anak Awai<sup>5</sup>, Samantha Suntie Liew<sup>6</sup>, Seri Nurellisa binti Mohd Yunus<sup>7</sup>

<sup>1</sup>Associate Professor, University Malaysia Sarawak, Malaysia; E-mail: [sspkaur@unimas.my](mailto:sspkaur@unimas.my)

<sup>2</sup>Professor, Lahore Garrison University, Pakistan

<sup>3,4,5,6,7</sup>University Malaysia Sarawak, Malaysia

**Abstracts:** The researchers were concerned about the effectiveness of ChatGPT with respect to students' educational performance. This was because a lot of students were producing the assignments with little substantial evidence drawn from their own effort. To examine the extent of their personal contribution in academic work, a randomly selected group of university students were administered a questionnaire. The questionnaire comprised demographic information of the students, ChatGPT validity, reliability, advantages, disadvantages, and recommendations. The data analysis was carried out using Microsoft Excel. It was found out that the ChatGPT is useful academic resource. However, it should be used appropriately without compromising academic standards and honesty. More research with large diverse student community may bring useful results.

**Keywords:** ChatGPT, Open AI, University, Academic, Performance, Malaysia.

## 1. INTRODUCTION

A modern Artificial Intelligence (AI) chatbot called ChatGPT enables its consumers to communicate with a virtual assistant using machine learning and natural language processing (King, 2023). Its foundation is the GPT-3.5 architecture, an enhanced version of the GPT-3 architecture that is programmed for a sizable quantity of text data, including web pages, novels, and other materials. With the capacity to comprehend and answer complicated requests in a way that seems natural and easy to understand.

ChatGPT, a product of Open AI, is made to be extremely intelligent and intuitive (Cotton et al., 2023). In addition, ChatGPT's capabilities are revolutionizing how we engage with technology and ushering in a new era of interactive intelligent AI. According to Cotton et al. (2023), as of 2021, ChatGPT is one of the biggest language models in use, has 175 billion parameters. It has shown outstanding results on several natural languages processing tasks, such as text generation, query resolution, and language translation. It has been utilized in several applications, including text completion, content production, and chatbots.

Chatbots like ChatGPT have the potential to be utilized for educational purposes despite the fact that they might be used with dishonesty. By entering the essay question and having ChatGPT produce a whole essay as a response, students might theoretically utilize ChatGPT to cheat on essay writing assignments. This would enable students to submit an essay that has already been completed without having to conduct any original research or writing. According to Abdelaal (2019), higher education officials are becoming more concerned about the usage of AI-powered essay writing services, which are becoming more complex and challenging to identify.

The use of AI essay writing tools in higher education may encourage plagiarism. This implies that it is possible for students to utilize these systems to submit essays that are not their own to complete assignments, which would undermine the goal of higher education, which is to challenge and educate students (Cotton et al., 2023). Additionally, relying too heavily on chatbots may discourage the use of critical analysis and research techniques,