

ABSTRACT

Aprilian, Regy. 2024. 20033055. *The Effectiveness of Using Artificial Intelligence Based Perplexity.ai for Enhancing 10th Grade Students' Writing Skills at SMA Nurul Huda Pucuk*. Thesis. Faculty of Teaching and Training Education of English Department. Islamic University of Darul 'Ulum Lamongan.

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This study aimed to test the effectiveness of English writing skills using artificial intelligence-based Perplexity.ai as a learning medium for 10th-grade students of SMA Nurul Huda Pucuk. The researcher used a pre-experimental design with a quantitative approach. The instrument data of this study included writing tests (pre-test and post-test) and statistical analysis using SPSS 25.0 for Windows. The pre-test and post-test were utilized to measure students' English writing skills before and after the treatment.

The results showed that the pre-test mean score was 62.35, with the lowest score being 45 and the highest score 85. After the treatment, the post-test mean score increased to 75.88, with the lowest score of 50 and the highest score of 95. The normality test indicated that the data were normally distributed, making them suitable for further paired sample t-test analysis. The paired sample t-test revealed a significant improvement in the students' writing skills, with a mean difference of -13.529 between the pre-test and post-test scores. The correlation coefficient was 0.866 with a significance value of 0.000, indicating a strong correlation between the pre-test and post-test variables.

In conclusion, the study found that artificial intelligence-based Perplexity.ai significantly improved the English writing skills of 10th-grade students at SMA Nurul Huda Pucuk. The researcher suggests that future studies could further use the application of Perplexity.ai to other language skills. Practically, Perplexity.ai is recommended as an alternative model for teaching English writing, with teachers advised to address its limitations and students encouraged to practice actively. Pedagogically, it is important for teachers to use diverse teaching methods to enhance student understanding and create a more engaging classroom environment.