

ABSTRACT

Azmi Aulia Kusuma. 2023. THE EFFECT OF THE DISCOVERY LEARNING MODEL ASSISTED BY ANIMATED VIDEO ON STUDENTS' CRITICAL THINKING SKILLS CONCERNING NEWTON'S LAW OF GRAVITY CONTENT

Students at Senior High School of 1 Cihaurbeuti struggle with low critical thinking skill. This is the context in which researchers can utilise the Discovery Learning model with the assistance of animated videos. Animated videos are used as learning media to provide interesting and interactive visualizations to clarify complex concepts that are difficult to understand. This research aimed to determine the effect of the Discovery Learning model usage assisted by animated video on students' critical thinking skills concerning the material of Newton's law of gravity. The study used a quasi-experiment method with a post-test only control group design. This study's population included all ten-grade students majoring in Mathematics and Natural Science at Senior High School of 1 Cihaurbeuti, which comprised seven classes with 248 students. The research sample was taken using cluster random sampling technique in as many as two classes; namely, ten-grade students majoring in Mathematics and Natural Science 2 class as the experimental class with a total of 35 students and ten-grade students majoring in Mathematics and Natural Science 3 class as the control class, with a total of 36 students. The data collection technique used a post-test strategies. Subsequently, the collected data was examined using the t-test. The results of testing the hypothesis using the t-test at the significance level ($\alpha= 0.05$) show that after applying the Discovery Learning model with the assistance of animated videos, is $4,30 > 2,00$, so that H_a is accepted. This means that at a confidence level of 95%, it can be concluded that there is an influence of the Discovery Learning model with the assistance of animated videos on critical thinking skills in Newton's law of gravity in ten-grade students majoring in Mathematics and Natural Science at Senior High School of 1 Cihaurbeuti, in the 2022/2023 academic year. This is because in the stages of t the Discovery Learning model usage assisted by animated video, there are activities that can train students' critical thinking skills.

Keywords: Critical Thinking Skill, Discovery Learning Assisted by Animated Video, Newton's Law of Gravity