

Effect of environmental education modul towards pupils knowledge and behaviour intention among primary pupils

ABSTRACT

This study was undertaken in response to evaluate an instructional method in Environmental Education which is the Environmental Education Module in enhancing pupils' knowledge and behavior intention. One group pre and the post-quasi-experimental study was conducted involves 32 primary five pupils from two identified schools via purposive sampling. Four series of test were conducted namely pre-test (to access initial level of knowledge and behavior intention before intervention), post-test (to access immediate effects of intervention), one-month post-delayed test (to access continuous effects of intervention) and six months post-delayed test (to access continuous and long-term effects of intervention). Based on the analysis of Repeated Measure ANOVA it is found that there is a significant difference in knowledge Wilks' Lambda = .409, $F(3,29) = 13.951$, $p = .00 < 0.005$, $\eta^2 = .591$ and in behavior intention Wilks' Lambda = .60, $F(3,29) = 1.193$, $p = 0.002 < 0.005$, $\eta^2 = .04$. Thus, hypothesis Ho1 and Ho2 were rejected. Further analysis by pairwise comparison, Post Hoc with Bonferroni adjustment found that there is a statistically difference found in knowledge in the pair of post-test ($M = 15.53$, $SD = 2.94$) compare to the pre-test ($M = 11.50$, $SD = 3.50$), one month post-delayed test ($M = 15.28$, $SD = 2.79$) compare to the pre-test ($M = 11.50$, $SD = 3.50$) and six months post-delayed test ($M = 14.75$, $SD = 2.90$) compare to the pre-test ($M = 11.50$, $SD = 3.50$). This indicates that the module able to give positive impacts to enhance pupils' knowledge towards the environment and persist it until six months upon completion of the intervention. On the other hand, a similar result was also found in behavior intention in the pair of post-tests ($M = 4.12$, $SD = 0.31$) when compared pre-test ($M = 3.88$, $SD = 3.041$). This indicates that the module able to trigger and enhance the behavior intention towards the environment for a very short time. This suggested that the usage of the module as the main teaching and learning tool is capable of enhancing knowledge and behavior intention.

Keyword: Environment education; Modular approach; Behavior intention; Knowledge