

ABSTRACT

Tedi Apendi, Application of Learning Cycle 7E (Elicit, Engage, Explore, Explain, Elaborate, Evaluate, and Extend) to Improve Ability Mathematical Connections Student Vocational

The ability of students mathematical connection is influenced by several factors, one of which is a model of learning. In general, teachers within execute of activities teaching and learning always using conventional models until students capability of mathematical connection is still low. One alternative model of learning which can improve students mathematical connection is a model Learning Cycle 7E. This research as purpose to: 1) To knowing the mathematical connection capabilities increase vocational students who obtained Learning Cycle 7E with mathematical connection capabilities vocational students who obtain conventional learning. (2) To knowing the students attitudes toward Learning Cycle 7E. (3) To Knowing there is a correlation between the attitudes of the students with the mathematical connection capabilities Learning Cycle 7E. This research used experimental research design with pretest-posttest control group. The population in this study were all students of class X SMK Negeri 15 Bandung in the academic year 2015/2016. Samples were taken two class with randomly selected classes is class X PS 1 as a class ekpserimen and X PS 2 as the control class. The data collection was done using two types of instruments that is test and non-test. The tests used form of a mathematical connection tests with narrative form, whereas non-test that attitude scale questionnaire. Based on the analysis of data obtained as follows: (1) Improving the ability of mathematical connections vocational students who obtained Learning Cycle 7E (Elicit, Engage, Explore, Explain, Elaborate, Evaluate, and Extend) better than students who received conventional learning; (2) the attitude Students are more favorable to use Learning Cycle 7E (Elicit, Engage, Explore, Explain, Elaborate, Evaluate, and Extend) in mathematics. (3) there is not correlation between the increase in the ability of mathematical connections with students' attitudes toward learning mathematics model Learning Cycle 7E.

Keywords: Learning Cycle 7E, Mathematical Ability Connections.