The Effect of Math Instructional Interventions on Math Anxiety and Attitude towards Mathematics

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Abstract

In recent years, mathematics is an essential aspect of all areas of daily life and the best predictor of being successful in economic situations of society. For many students, the mathematics accompanied with frustration, anxiety and negative attitudes towards mathematics. These students believe their anxiety have been derived from their math teachers, math misconception and weakness in math assignments that derived from traditional classes. New perspectives in math teaching emphasize on cooperative learning, problem solving, exploring, action, self-instruction, self-assessment and using manipulative tools for learning math. The purpose of this study is to examine the effect of some new math interventions on math anxiety and negative attitudes towards mathematics in girl students. The method of research was Quasi experimental with pre-post test. For data collection, mathematics anxiety scale for children from Chui and Henry and Aiken attitudes towards mathematics scale were administrated on eighty-nine girl students that randomly placed in control and experimental groups. Results from covariance analyzing of data showed that new math interventions significantly reduced math anxiety and attitudes towards math, that is, math interventions improved negative attitudes towards math. Because of importance of math in all areas of new technology, new math instructional methods based on psychological and educational researches should be tested by the teachers in math classes that reinforce cooperative learning, cause positive attitudes towards math and lead to the high achievement level in international evaluations.

Keywords: Math Interventions, Attitude towards Mathematics, Math Anxiety.

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