

ABSTRACT

Title : The Effects of Three Methods of Remedial Teaching
on Student's Achievement in Selected Topics of
College Algebra

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The Problem

This study focused on the effects of three methods of remedial teaching to help "mathematically" deficient college students. The investigator attempted to determine which method of remedial teaching in College Algebra had the best effect on the achievement scores.

The Methodology

A total of 240 first year technical students who were intact groups were the subjects of the study. There were six sections composed of 40 students each with different shop majors. They were given pretest of the achievement test, mental ability test and a mathematics attitude scale at the start of the experiment. The six



groups were taught by the same teacher in College Algebra during the regular class schedule and after each class a remedial class followed. Two sections had their remedial class using the lecture or traditional method, the other two used individualized programmed lessons while the remaining two used the team-assisted individualization method. The scores of the quizzes of the first three groups using the three remedial teaching methods were given a weight of 20% of their grades, while the quiz scores of the remaining three groups were not given any weight. The analysis of covariance was used to test the achievement differences of the groups while the analysis of variance was used to test the variance in attitude deviations. The pretest was used as covariate in the study.

Findings

Results of the analysis had the following findings:

- (1) Students whose remedial quiz scores were given a weight of 20% of their grades achieved higher than those whose quiz scores were not given weight in their grades.
- (2) There was a significant difference between the team assisted individualization method and the traditional method; there was also a significant difference between the TAI method and the II method. The students who were taught using the team assisted individualization method of



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remedial teaching achieved higher scores than the students who were taught in the traditional and individualized instruction methods. (3) No significant difference in achievement was found among the groups taught in the traditional and the individualized method. (4) There was a significant difference in the deviation of attitudes of students towards mathematics with the team-assisted group having exhibited a significant change in attitude.

Recommendation

Based on the study the following recommendations were made: (1) Similar studies be made in other mathematics subjects so that more general conclusions can be formulated regarding remedial class, (2) Team-assisted individualization of remediation should be included in College Algebra curriculum with quizzes as part of the grade of the course and (3) Team-assisted individualization method of remediation be adopted by mathematics teachers.



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