

A Study of Educational Goals and Academic Performance

Joseph J. Motto

University of Michigan, Flint Extension Center

IN A RECENT investigation Weitz and Colver¹ examined the relationship between the academic performance of college women who indicated preferences for major fields as compared to those who were undecided about major fields at the start of college programs. A previous study² had demonstrated that students with clearly defined educational goals earned better grades in the first semester of study than did students who were undecided about a major or a field of concentration. Surprisingly, this relationship did not hold in a similar comparison of female students.

Using performance on The American Council on Educational Psychological Examination for College Freshmen as the predictor variable, Weitz and Colver found that groups of "decided" female students, i.e., definite majors expressed, were not significantly different from undecided students in terms of grade point average at the end of the first semester, percentage of each group being graduated, number of semesters required to graduate and grade point average at graduation.

The results were interpreted to mean that women perform equally well in the academic situation whether or not they have educational goals clearly defined by a major field of study. It will be noted that the subjects were female undergraduate stu-

dents. What would the relationship between specificity of vocational goal and cited criteria be for female graduate students having an average age of thirty-one, enrolled in a program leading to an M.A. degree in education? It would seem that selective factors might be operating in more mature students working at the graduate level which would not be true of undergraduate students, and which would result in a pattern of relationships different from those reported for undergraduates. It would seem that variables such as age, work experience, marital status, and clarification of role of professional life in the individual's total life adjustment could operate to produce definite vocational goals, and would find expression in an organization of behavior designed to achieve the goal.

The purpose of this study is to explore the relationship between conscious awareness of educational goals in female graduate education students, and the following criteria: (a) academic performance in the first ten hours of graduate work, (b) the proportion who complete a graduate program, (c) the number of semesters required to complete the program, (d) the grade point average at graduation. If the relationships found by Weitz and Colver hold true for graduate students, such knowledge would have definite implications for the na-

ture of advisement and counseling services offered to more mature students engaged in advanced study in the field of education.

The Problem

The academic performance of female graduate students in the field of education who indicate preferences at the time they enroll in M.A. programs does not differ significantly from the performance of students who are undecided about the major field of study at the initiation of their programs.

Procedure

Students who enrolled in graduate classes at the University of Michigan Flint Extension Center during the fall semester of 1954-55 were used as subjects for the present study. Admission procedures of the university require that a determination of a student's admission status be made at the time of enrollment. By examining office records, it was possible to discover whether or not a student had been admitted to the graduate school, courses taken, and grades earned. Education students may begin graduate work in a University Extension unit prior to graduate school admission. Students are permitted to complete ten semester hours of credit prior to acceptance by the graduate school.

The records necessary for this study were selected randomly from available office files to produce the following two groups of sixty subjects:

Group D (the "decided" group):

Students who expressed a desire to attain an M.A. degree and who selected a definite graduate sequence of study were accepted by the graduate school.

Group U (the "undecided" group): Students who expressed some indecision about working for an M.A. degree, who decided not to apply for admission to the graduate school, and who did not specify a definite graduate sequence of study.

The following criteria of academic performance were used: (a) grade point average at the end of ten semester hours, (b) percentage of each group graduated through the summer session, 1959, (c) number of semesters required to complete the graduate program, (d) grade point average at graduation. Thus, criterion "a" represents the student's academic performance for the first ten semester hours of graduate work, while criterion "d" represents academic performance for all work taken toward the M.A. degree. Criterion "c" is the number of semesters required to complete all degree requirements. Thus students who entered in the fall, 1954-55, had ten semesters and five summer sessions in which they could complete their work, a total of fifteen semesters including summers. It was felt that summers could be counted as semesters since all of the subjects of this study were employed as full-time teachers who are free during the summer months. The Flint Extension Center offers a relatively complete summer program of courses in the field of education. Criterion "b" represents the percentage of those students assigned to groups "D" and

"U" who subsequently completed degree requirements through the 1959 summer session.

At the University of Michigan, grade point averages for graduates are computed according to the following procedure: A+ = 9, A = 8, A- = 7, B+ = 6, B = 5, B- = 4, C+ = 3, C = 2, C- = 1. No marks below C- carry credit points for graduate students.

Some of the demographic characteristics of the 120 subjects were as follows: Mean age = 31.6 years; 79 per cent were married; the average number of years since completion of the bachelor's degree was 8.4.

Results

First ten hour GPA. Although the D group earned a higher grade point average in the first ten hours of graduate work, the difference of .22 proved to be statistically insignificant. Thus, this finding confirms the hypothesis. The similarity of these find-

ings to those of Weitz and Colver suggests that undergraduate liberal arts students and graduate education students earn about the same grades whether or not they have definite vocational or academic goals toward which they are striving.

Percentage graduated. The difference of 11.66 per cent in favor of the D group was found to be significant at the .01 level, $t = 5.71$. This finding means that a significantly greater number of students who have definite goals at the initiation of a program of training will ultimately achieve the goal than will be true of an undecided group.

Number semesters to graduate. The difference of .22 in favor of the D group proved to be statistically insignificant. The specificity or indecisiveness of the student's goals at the initiation of a program is evidently unrelated to the number of semesters which will be required to complete the program.

TABLE I
A SUMMARY OF CRITERION MEASURES

Criterion*	Group D	Group U
First 10 hours GPA	5.89	5.67
Percentage graduated	68.33** (41)	56.67 (34)
Semesters completed for graduation	7.71	7.93
GPA at graduation	6.51**	5.58

*Except for percentages, all data are means

**Significant at the .01 level

¹Henry Weitz and Robert Colver, "The Relationship between the Educational Goals and the Academic Performance of Women, A Confirmation." *Educational and Psychological Measurement*, XIX (1959), 373-380.

²Henry Weitz, Mary Clarke, and Ora Jones, "The Relationship between Choice of a Major Field of Study and Academic Preparation and Performance." *Educational and Psychological Measurement*, XV (1955), 28-38.

GPA at graduation. The difference of .93 in favor of the D group was significant at the .01 level, $t = 4.47$. This was interpreted to mean that students with definite goals do significantly better academic work than do students with indefinite goals. It might appear that differences in scholastic aptitude represent an uncontrolled independent variable operating in the two groups. The fact, however, that all of the subjects in the U group were admitted to the graduate school is evidence that a selective factor of intelligence reflected in undergraduate grade point average was not a critical difference between groups.

Conclusion

Graduate education students seem to perform in the academic situation about equally well whether or not they have specific educational or vocational goals in terms of the number of semesters required to attain an M.A. degree, and in the quality of the performance reflected in grade point averages during the first ten hours of graduate work. The students who had formulated definite educational and vocational goals earned a significantly higher grade point average for the thirty hour master's program, and a greater percentage of them graduated than was true of the undecided students.

These results are most meaningfully interpreted in relation to the

characteristics of the population of this study. The average student who had been out of school for some eight years, teaching full-time in a public school, would have had sufficient time and experience to crystallize her thinking about whether she would need or want to continue teaching, and if appropriate, to elect an educational goal which would tap interests developed during her vocational life. The association of better grade point averages for the whole program and a higher proportion of program completions suggest that the "decided" students had more realistic aspirations and greater motivation to achieve the goal.

The Flint Extension Center program is largely an evening program which requires that students attend class one or two evenings per week, and find time for library assignments and homework. That grade point average differences failed to appear in the first ten hours of work would seem to be the result of an inadequate sample of students' classroom performance at the graduate level.

These findings have implications for the advisement and counseling services provided to female graduate education students. Assisting individuals to identify specific educational goals prior to initiating a graduate program would presumably increase the number who complete programs and would result in a higher quality of academic work.