This is a summary of the second and third years' work on the research project on training teachers for the culturally disadvantaged, reported fully in SP 004 110, SP 004 111, and SP 004 112. The project was based on the hypotheses that students with academic difficulties could be made more academically successful, their grade-point averages could be significantly raised, their attitudes toward higher education, professors, study, and teaching the disadvantaged would become more positive, and that faculty members could be encouraged to modify existing courses and develop innovative approaches. Approximately 50 students, volunteers from a large group of probationary or "dropped" students, were involved during the 1968-1969 academic year, and approximately 100 during the 1969 summer session. Data on three control groups was also collected. The results of the second year's research are set out in detail. The process of assimilating project components into the main teacher education program was begun during the third year, so that the effect of the program on larger numbers of teacher education and non-teacher education students can be evaluated. It is recommended that other schools of the University and other institutions of higher education should be encouraged to continue experiments with the project components, and that related or replicative research activities in the areas with which the project has been concerned should be supported locally, at state level, and through Federally sponsored programs. (MBM)
SUMMARY OF THE FINAL REPORT

Project No. 9-0007
Contract No. OB5-0-8-077946-1734

with the

U.S. DEPARTMENT OF
HEALTH, EDUCATION AND WELFARE

Office of Education
Bureau of Research

QUANTITATIVE AND QUALITATIVE EFFECTS OF REVISED SELECTION AND TRAINING PROCEDURES IN THE EDUCATION OF TEACHERS OF THE CULTURALLY DISADVANTAGED

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June 1970
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SUMMARY

The U.S.O.E. Bureau of Research Grant for September 15, 1968 to September 15, 1969, provided support for the piloting of activities developed during the 1967-1968 planning year of the same project - also funded by the U.S.O.E. Bureau of Research.

The objectives during this second year were to:

1) identify and recruit a group of students similar to those identified and described during 1967-1968. These students would begin the program in June, 1969.

2) further develop and refine curriculum concepts - identified and described during the 1967-1968 planning year - and prepare these concepts for implementation beginning June, 1969.

3) continue program of faculty development through involvement in all phases of curriculum building within the experimental teacher education model.

4) involve students (20-25), identified during 1967-1968, in pilot programs in the areas of a) personal development seminars - regularly scheduled meetings designed to help students understand themselves, set goals, build positive self-images, develop skills including "schoolmanship", and keep channels of communication open between students and faculty members; b) learning centers - study and media centers located in various departments and containing materials of a review, remedial, and reinforcement nature, designed to aid in course work and skill development; and c) paid para-professional work experiences - student assistant positions designed to develop skills related to teaching and education, e.g. teacher-aid and audio-visual technician.

5) make necessary administrative arrangements for smooth commencement of the teacher preparation program as of June, 1969.

This year of the project and the preceding planning year (1967-1968) were but the beginning of a longitudinal study originally designed to spread over an eight to ten year period. Had continued funding been assured, the third year (starting in the summer session of 1969) would have initiated a four-year and five-year teacher education program with a two year follow-up program for a group of at least 100 students with control groups of at least another 100 students. As the prospects for funding the original longitudinal study became more remote the 1968-1969 year served as a transition stage for moving from planning and development into some sort of operational phase.
within the regular teacher education framework at Wisconsin State University-Oshkosh. For additional background, perspective, and information beyond the contents of this report the reader is referred to the Final Report for the 1967-1968 year, Project No. 9-0007, Grant No. OEG-0-8-077946-1734, entitled QUANTITATIVE AND QUALITATIVE EFFECTS OF REVISED SELECTION AND TRAINING PROCEDURES IN THE EDUCATION OF TEACHERS OF THE CULTURALLY DISADVANTAGED, and submitted December, 1968 and accepted by the Bureau of Research, United States Office of Education, United States Department of Health, Education, and Welfare.

Considerable piloting of project components took place during the year, and although the formal research originally planned did not materialize, several of the basic hypotheses were tested on a pilot basis. Pilot findings provided strong suggestions for further research and for implementing project components on a wider scale. The major hypotheses dealt with include:

1) students can be recruited to participate in a venture to make them more academically successful than before;

2) student's grade-point averages can be significantly raised through employment of project components;

3) project student attitudes toward higher education, professors, study, and teaching the disadvantaged will be positive and will suggest a positive increase over their attitudes before joining the project; and

4) faculty members can be encouraged to examine existing courses in terms of behavior objectives, to modify these courses, to develop innovative approaches to both teaching techniques and curriculum development, to build resource materials (including video tapes, auto-instructional devices, etc.) for student learning centers, and to look favorably upon course development involving interdisciplinary approaches and less traditional content.

Methods Used

In fulfilling the objectives of the second year and testing the hypotheses noted above, volunteer students from the large group of probationary or "dropped" students were recruited to pilot the project components. Approximately 50 students were involved during the 1968-1969 academic year. The major recruitment devices were the prospects of 1) being aided in achieving a better scholastic record and 2) being assured of admission second semester or the following year regardless of earned grade-point average. During the 1969 summer session approximately 100 students were involved. Twenty-one of these were "qualifiers" -- incoming freshmen with poor prognoses for success who must obtain a summer session grade-point average of 1.50 to be
admitted in September. Two of the experimental sections of existing courses designed in connection with the project were piloted during the 1969 summer session (General Psychology and English Composition).

Data regarding grade-point averages at time of entrance to the project were gathered for each group and for 39 of the first semester group. Data for three matched groups not in the project were also gathered. These control groups were from the School of Education, the School of Letters and Science, and the School of Business Administration. Records of course work taken and grades received were kept for all three groups. Resulting grade-point averages were computed and comparative analyses made.

Inventories, taped staff and student discussion sessions, and staff judgment were used to note attitudes and attitude changes. Only during the 1969 summer session was an attempt made to get a pre-test and post-test attitude inventory.

The University encouraged faculty participation in the curriculum development component of the project by 1) providing released time for certain faculty members cooperating with the project and 2) allowing funds from a Board of Regents allocation for curriculum research during the summer to be used by certain faculty members cooperating with the project. The project encouraged faculty participation through utilization of certain faculty members during periods when not employed by the University and available for intensive work on project components related to curriculum development.

**Results Obtained**

Forty-six students were enrolled in project pilot activities for the first semester. All were experiencing academic difficulties. Personal Development Seminars - designed to help students understand themselves, build positive self-images, set goals, develop skills, and keep channels of communication open between students and faculty-- were organized for four groups of from ten to thirteen students. A Learning Center was established and many activities and materials of a review, remedial and reinforcement nature were made available to the students. Paid Paraprofessional Work Experience was organized and made available to students on a voluntary basis. Thirty-five students participated. Work assignments were made on the basis of student interest, job availability and relevancy to education. Payment was at the rate of $1.40 per hour and students worked from 8 to 10 hours per week, most frequently in teacher-related duties.

An analysis of the grade results for Semester I, 1968-1969 of 39 project students - carrying an average of 12.5 credits per student plus the project activities revealed the following data:

1. Eight students received eleven A's involving 25 credits of course work.
2. Twenty-six students received forty B's involving one-hundred and nine credits of course work.

3. Thirty-eight of the thirty-nine students received at least one "C" grade. These thirty-eight students received ninety C's involving two-hundred and fifty-three credits of course work.

4. Only five students received a grade of "F", or a total of seven "F" grades involving twenty-two credits of course work.

5. Twenty-two students made a 2.0 or better Grade Point Average (G.P.A.):

<table>
<thead>
<tr>
<th>G.P.A.</th>
<th>No. of Students</th>
<th>Range of Previous Cumulative GPA Each Class of Students</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Highest</td>
</tr>
<tr>
<td>3.0 and above</td>
<td>2</td>
<td>1.8</td>
</tr>
<tr>
<td>2.5 and above</td>
<td>(a) 8</td>
<td>2.2</td>
</tr>
<tr>
<td>2.2 and above</td>
<td>(b) 17</td>
<td>2.2</td>
</tr>
<tr>
<td>2.0 and above</td>
<td>(c) 22</td>
<td>2.2</td>
</tr>
</tbody>
</table>

(a) Six of these students have never before achieved a 2.0 G.P.A.
(b) Thirteen of these students have never before achieved a 2.0 G.P.A.
(c) Eighteen of these students have never before achieved a 2.0 G.P.A.

6. Twenty-six students raised their cumulative G.P.A. as a result of this first semester's work. The average G.P.A. raise was .28 and the average difference between this semester's G.P.A. and the previous cumulative G.P.A. was .63. Five students achieved a G.P.A. for the first semester which was one full letter grade above their previous cumulative average.

7. There were several rather dramatic individual cases of improved grade point averages. Some of these are listed below for illustrative purposes.

<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Student A</td>
<td>.80</td>
</tr>
<tr>
<td>Student B</td>
<td>1.44</td>
</tr>
<tr>
<td>Student C</td>
<td>1.51</td>
</tr>
<tr>
<td>Student D</td>
<td>1.80</td>
</tr>
<tr>
<td>Student E</td>
<td>1.39</td>
</tr>
</tbody>
</table>
----------------------|-----------------------------
Student F             | 1.72                        | 2.50
Student G             | 1.23                        | 2.16
Student H             | 1.62                        | 2.42
Student I             | 1.55                        | 2.23
Student J             | 1.26                        | 2.00

8. Fifteen students in the pilot group ended the first semester with a cumulative G.P.A. of 2.0 or better. Prior to this semester only seven students had achieved a cumulative G.P.A. of 2.0.

9. The average of G.P.A. for the group for the first semester was 1.91. The average cumulative G.P.A. for the group just prior to first semester was 1.71. The average cumulative G.P.A. for the group after the first semester was 1.86.

Analysis of first semester grade reports of project and non-project students recalled differences all of which favored the project group. More specifically, the project students recorded 28% of their grades in the A or B category, while their counterparts in business, letters and science, and education recorded 10%, 17%, and 16% (A or B grades) respectively. On the other end of the grade scale, differences again favor the project group. Project students received 20% D or F grades, while the business students received 56%, and the education and letters and science students received 33% and 35% respectively.

Generally, the attitudes of pilot students toward higher education, professors, and academic pursuits seemed to be more positive and supportive after substantial involvement in the project than before. Pilot students have volunteered testimony to recruit additional students and have completed attitude inventories, written letters, and oral reports (some are recorded) regarding these attitude changes.

In addition to the curriculum components mentioned above - personal development seminars, learning center, paid paraprofessional work experiences -- curriculum and instructional revision took place in the following courses: English Composition - 3 credits, Physical Science - 4 credits, Biology - 4 credits. New course developments not yet piloted include: 1) a 14-credit interdisciplinary social science (including 2 credits of social science methods) full semester entitled Poverty in American Society; 2) a 12 credit Art-Music semester utilizing a spiral approach to fundamentals, appreciation, and methodology; 3) a 4 credit earth science general education course; and 4) a modified approach to educational psychology.
Some fifty faculty members including twenty-five or more from schools other than the School of Education were involved directly or indirectly in the curriculum development component.

Findings

The second year's activity disclosed the following findings:

1. Significant numbers of students having scholastic difficulty are interested in a program designed to make them successful in college and prepare them as competent teachers of the disadvantaged.

2. Significant numbers of students having scholastic difficulty give indications (rank in high school class, ACT scores, some college grades, etc.) of ability to succeed in college.

3. The recruits for the teacher education program being developed in the project tend to be much like any group of randomly selected freshmen at this university as far as background and ability indicators are concerned.

4. Imaginative university curriculum revisions result from attempts to better meet the needs of these students.

5. Faculty participation from widely diverse disciplines is important in the development of these curriculum revisions.

6. Only certain faculty members in each discipline have both interest and competence in developing curriculum to meet the needs of these students.

7. Attitudes of the pilot group of students toward college, professors, and academic pursuits were more positive than before.

8. Attitudes of the pilot group of students toward teaching and toward the disadvantaged seem to be positively influenced by the activities of this project.

9. Pilot student grade point averages were significantly raised.

10. Pilot students raised grade-point averages more than matched non-project students in education, letters and science, or business administration.
11. Pilot students who were summer session "qualifiers" were more successful than those not in the project. A higher percentage than usual qualified.

12. Pilot students were effective as paraprofessionals after short-term training sessions.

13. Pilot students find project curriculum revisions and additions more relevant to their needs than other curriculum experiences.

14. The project has implications for reducing student unrest on college campuses.

15. The project has implications for meeting the compensatory education needs of black students.

16. The project has implications for encouraging faculty development among trainers of teachers.

Conclusion and Recommendations

The project undertaken during the 1968-1969 year and continued during the 1969-1970 year as an extension period to utilize unexpended balances was designed as a transition from the 1967-1968 exploratory year to an operative phase of several years duration. This phase would ideally have built in evaluation systems and controls such that conclusions and recommendations might have the full support of research evidence. Insufficient Federal or State support precluded the possibility of this phase of the project.

However, the various pilot activities and analyses of project dimensions made during the 1968-1970 period suggest several conclusions and recommendations of importance to this University in particular and higher education in general. They are not listed in a particular order of importance.

1. At the outset it is concluded that University students experiencing academic difficulty can be helped to succeed through utilization of the three major components developed in this project, namely, the personal development seminars, the learning center, and the paid work experience. WSU-O and many similar institutions throughout the nation have been and are each year failing or placing on probation large numbers of students under the guise that these students can not benefit from a university education because of their inability to achieve academically. Many of these students can be helped to achieve and can become independent, positive, supportive, academically successful university students with an excellent prognosis for graduation and a successful career. These
students will be more successful than similarly educationally disadvantaged students not involved in the project activities. Project pilot students were consistently more successful than matched groups of non-project students from various schools of the University. WSU-O and other institutions of higher education should develop programs similar to the one developed in this project to better conserve the human resources who are pursuing an education beyond high school.

2. Probably each student, but certainly any student experiencing academic difficulty, needs a faculty contact -- an advocate and supporter -- with whom he feels sufficiently at ease and with whom he can effectively communicate to ensure the highest possible academic success.

3. Project components such as the personal development seminar need to be employed over significantly long periods of time. Students having one summer experience only with the project were not as successful as students who had one summer plus a semester or two. As the period of contact with project activities increased so did the academic success of pilot students.

4. Project components need to be employed for different lengths for different students. Some students felt that small group counseling sessions were helpful for a summer session, others for a semester, others for part of one or two semesters. Similar student reactions were expressed with regard to paid professional work experiences and learning center activities. Students generally supported the idea of the unifying and central personal development seminar component for as long a period as the project had run. (This was 2 years and 2 summers for a few students.)

5. As student participation in the project components continues, students' roles tend to change from passive recipients of the help provided to active participants frequently assuming leadership roles and innovating for the improvement of the particular component. Some students with the project for a year and summer became heavy contributors to the project. Almost all students after one semester or summer session become personally committed to its goals and felt responsible for bringing its merits to the attention of other students.

6. Project components should be available to any student admitted to college as funds permit. Although some pilot project students were lost despite all efforts the number was limited. Students with very poor records made significant gains in academic success.

7. Project components should be available to students regardless of career goals. Pilot students from the Schools of Letters and Science and Business Administration responded equally
well to project components when compared with education students.

8. Varying degrees of "schoolsmanship" are essential to achieving academic success in the typical large public university. Project staff members and other faculty have observed significant increases in academic sophistication (schoolsmanship) among project students as they proceeded through the various components.

9. University students need a greater role in planning and evaluating their curricular experiences. Involvement of project students appears to speed maturity and build enthusiasm.

10. Faculty working with project components should expect early disappointment. Students tend to look for a panacea and are difficult to reach at first. It takes time, diligence and sometimes ingenuity to reach these students and develop motivation.

11. Rewards are extremely important at first. The external rewards such as encouragement, assistance in programming and effecting "drops" and "adds", and paid work experiences tend to sustain students until they are more intrinsically motivated.

12. Faculty members are not as prone to examine and redesign general education courses to better meet the needs of students experiencing academic difficulty as they are to examine and redesign courses for students pursuing a major or minor in their field. Rewards in terms of consultant monies, released time and administrative commendation are important in effecting curriculum development of this sort. Curriculum development in general education and in professional areas should be continued with the same intensity made possible by this project grant. Local stimulation substitutes should be sought on campus or through Board of Regents action. The provision of special budget funds for curriculum development is seen as a desirable means of achieving such stimulates.

13. Most faculty members seem to have difficulty in suggesting or developing specific review, reinforcement and remediation materials in connection with their courses and for use in learning centers. Again, local stimulation substitutes should be found for those project activities which encouraged the development of learning center materials directly related to courses in the curriculum.

14. The small cassette-type tape recorder is an excellent aid to the student in improving the effectiveness of his notetaking and as a device for individual review. Most project students found the tape recorder a valuable asset. Several purchased their own as a result of using those available through the project. Such recorders should be available to students on campus in increasing numbers.
15. Although the project was not continued for a long enough period to test its impact upon producing excellent teachers for the disadvantaged it is interesting to note that almost all of the pilot students in education became concerned about disadvantaged children and youth and many indicated a strong commitment to teach disadvantaged children.

Summary

In summary, the process of assimilating project components, begun during the third (extension of grant) year, should continue so that the effect of these components on larger numbers of teacher education and non-teacher education students can be evaluated. Other schools of this University and other institutions of higher education should be encouraged to pursue experimentation with the various components of this project. Finally, it is strongly recommended that related or replicative research activities in the areas with which this project has been concerned be supported locally, at the state level and through Federally sponsored programs.
A number of factors led to a request that the 1968-1969 funding -- both from the USOE and the Board of Regents of State Universities -- be extended for the academic year 1969-1970. One was the late (April, 1969) recipience of the 1968-1969 Federal Grant. This made it difficult to expend state and federal funds as planned and caused a balance of approximately $6,000 Federal funds and $21,000 State funds as of September, 1969. Another factor was the lack of assurance that the state would carry through the planned four and five-year sequences commencing with the 1969 summer session. An austerity budget seemed to be in the offering for the 1969-1971 biennium. This particular object (with a budget figure of approximately $200,000 and $300,000 for each of the years of the biennium) was placed in a special state package of programs relating to the disadvantaged. The entire package was dropped from the budget due to limited funds and efforts to have it restored were unsuccessful. A third factor was the growing conviction of the project director that by assimilating project components into the main stream of the teacher education program the impact of two years of research efforts would not be lost.

Being in every way consistent with the purposes and objectives of the first and second years of the project, it was decided to continue pilot activity during the extension year and emphasize the assimilation process.

Assimilation Process

Three project staff members with experience in conducting Personal Development Seminars and working with various facets of the project were given half-time appointments in the offices of the Coordinators of Advisement for Elementary and Secondary Education. In this capacity they would: 1) become familiar with, and skilled in, the regular advisement and admission procedures of the School; 2) introduce project components to faculty members working in the division of the School. Since two of these three faculty members (one in elementary education and one in secondary education) were continued as half-time project staff the pilot work of past years could be continued and expanded.

These faculty members became members of the elementary or secondary education departments, were represented on a school-wide committee studying the entire student personnel services area, and met with various school and university-wide groups including the other departments of the School of Education and the University Committee on Academic Success.

It was decided that one of the most effective vehicles for assimilating the Personal Development Seminar into the main stream would be the freshman course, Orientation to Public Education. This
course is required and is usually taken during either the first or second semester of the freshman year. It carries 2 credits and is listed with a laboratory hour (2+1) which is scheduled for 12 of the 18 weeks. After discussions with the coordinator of this course, the instructors and department chairmen in elementary and secondary education, meetings were planned with each department to discuss various possibilities of attaching the seminar to this course and involving sufficient faculty to man the seminars.

During the first semester several faculty members not formerly connected with the project volunteered to conduct a Personal Development Seminar. Each of these persons was given a student co-leader who had been one of the former pilot students and who had been helped by the seminar. These student co-leaders provided enthusiasm as well as contributions from past experiences. Project funds provided supervision and guidance in the learning center and enabled this component of the project to continue to operate and expand.

Though more limited than in prior years, the paid para-professional work experience was made available to many of the students in the project and means were explored by which student assistant monies from the University budget could be tapped to continue this component in the future. Their work experiences were related to the assimilation process in most cases.

Curriculum development was not continued through project activities but attempts were made to encourage departments involved in prior years to continue the development of innovative courses and instructional techniques. This was done through central administrative encouragement and through suggestions to department chairmen. The elementary education department, in reexamining its curriculum for the preparation of teachers, gave careful attention to the model set up in the project. The momentum built over the former two-year period was felt to be an important factor in assimilating this component of the project.

Results

The results of assimilation efforts during 1969-1970 will not be fully reportable for perhaps several years. There are, however, several specific results which suggest that the decision to extend the grant for one year was a wise one.

1. The offices of the Coordinators of Advisement now have faculty members familiar with, and committed to, the various components of the project.

2. A number of faculty associated with project components have now had direct experience with project components.

3. A program of informing all School of Education faculty concerning the Personal Development Seminars was conducted.
and, in general, enthusiastically received. Plans for in-service training sessions of interested staff were carried out and a large percentage indicated a willingness to conduct seminars on an experimental -- and overload -- basis during 1970-1971. Plans are detailed in Appendix N.

4. Pilot activities were conducted for 169 students during Semester I and 197 students during Semester II of the extension year. Because of limited staff time complete analyses of results for pilot groups were not possible. Generally it can be reported that academic success and attitude changes were consistent with the 1968-1969 findings.

5. Several facets of the general education curriculum were modified as a result, in part at least, of project curriculum efforts in past years and are thought to be more relevant by students and more appropriate than their course predecessors by the faculty. Courses included are: Physical Science (4 credits) Appendix G, Earth Science (4 credits) Appendix F, Biological Science (4 credits) Appendix E, English Composition - Appendix J, Speech Fundamentals, General Psychology - Appendixes H and I, Music - Appendix C, and Art - Appendix D. Experimental sections have been, or are being run, in Biological Science, English Composition, and General Psychology.

6. The project continues to lend support to other emerging student and faculty concerns for curricular relevance, academic success and improvement of instruction. In particular, Project students who felt especially strongly that the services offered through the Project were vital to the success of many university students developed the concept of a student-run co-operative designed to provide academic support services to any interested students. During the second semester of the extension period, Project staff provided assistance to the students in formulating the concept and becoming a recognized entity in the University. A copy of the proposed constitution is included in Appendix Q.

7. A consortium proposal with Wisconsin State University-Oshkosh as "the helping institution" and three private liberal arts colleges in Eastern Wisconsin as "developing institutions" was submitted to the U.S.O.E. in an attempt to reduce freshman attrition on these campuses through the utilization of Project components developed on the Wisconsin State University-Oshkosh campus. Specifically the Personal Development Seminars of the School of Education will be used as models for similar development on the other three campuses. This consortium has been funded at the $80,000 level.