

## DOCUMENT RESUME

ED 166 398

CE 019 321

AUTHOR Ryan, Charles W.; And Others  
TITLE Comprehensive Career Education Project, 1976-77.  
Executive Summary. [Final Report].  
INSTITUTION Maine Univ., Orono. Coll. of Education.  
SPONS AGENCY Office of Career Education (DHEW/OE), Washington,  
D.C.  
PUB DATE Sep 77  
GRANT 300-76-0338  
NOTE 206p.; Certain pages throughout the appendixes will  
not reproduce well due to light and darker type. For  
related documents see ED 132 284, ED 138 786, ED 143  
814, and CE 017 623

EDRS PRICE MF-\$0.83 HC-\$11.37 Plus Postage.  
DESCRIPTORS \*Career Education; \*Curriculum Development;  
Demonstration Programs; Elementary Secondary  
Education; Fused Curriculum; \*Inservice Teacher  
Education; Postsecondary Education; Program  
Development; \*Program Effectiveness; \*Program  
Improvement; \*Teacher Education; Teacher Educator  
Education; Teacher Workshops  
IDENTIFIERS Bangor Public Schools ME; Education Amendments 1974;  
Maine

## ABSTRACT

A project was conducted to (1) demonstrate comprehensive career education in grades K-12 of the Bangor, Maine, public school system and (2) demonstrate to teacher educators at Husson College and the University of Maine the concepts, philosophy, and methods of comprehensive career education. (See CE 019 623 for the performance report.) Based on the project's final evaluation, the following general conclusions were drawn: increases in career education knowledge can be attained via planned inservice training programs; materials for inservice training must be appropriate for public school and postsecondary personnel (materials for the latter are not readily available); and local site idiosyncrasies, distant communication problems, and overcommitment by the testing organization may be a hindrance to local staff. Some of the findings concerning the activities in the Bangor public schools include the following: test scores indicated that students who attend career education-infused courses demonstrated greater gains in self-concept, career maturity, and improved attitude toward school; teachers produced acceptable career education-infused curriculum units after training; and inservice training must be planned, sequential, and evaluated if impact on school curriculum is to occur. Some of the findings concerning university-based activities are as follows: seminar content should be based on carefully designed conceptual models if they are to be accepted by postsecondary staff; university/college role in career education is open to varying interpretation; and university/college-based professionals were not enthusiastic about visits to public schools to observe career education in action. (BM)

ED166398

**BEST COPY AVAILABLE**

COMPREHENSIVE CAREER EDUCATION PROJECT  
1976-77

3  
600760338

EXECUTIVE SUMMARY

Prepared by

Charles W. Ryan, Ph.D., Director  
Robert Drummond, Ed.D., Research Associate  
John Sutton, Jr., Ed.D., Research Associate

CE 019 321

College of Education  
University of Maine  
Orono, Maine.

September 1977

U.S. DEPARTMENT OF HEALTH,  
EDUCATION & WELFARE  
NATIONAL INSTITUTE OF  
EDUCATION

THIS DOCUMENT HAS BEEN REPRODUCED EXACTLY AS RECEIVED FROM THE PERSON OR ORGANIZATION ORIGINATING IT. POINTS OF VIEW OR OPINIONS STATED DO NOT NECESSARILY REPRESENT OFFICIAL NATIONAL INSTITUTE OF EDUCATION POSITION OR POLICY.

Comprehensive Career Education  
G00760338

University of Maine  
College of Education  
Orono, Maine

Executive Summary  
1976-77

DISCRIMINATION PROHIBITED

Title VI of the Civil Rights Act of 1964 states: "No person in the United States shall, on the ground of race, color, or national origin, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under the program or activity receiving Federal financial assistance." Title IX of the Education Amendments of 1972, Public Law 92-318, states: "No person in the United States shall, on the basis of sex, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any education program or activity receiving Federal financial assistance." Therefore, career education projects supported every program or activity receiving financial assistance from the U.S. Department of Health, Education, and Welfare, must be operated in compliance with these laws.

The material in this publication was prepared pursuant to a grant or contract from the Office of Education, U.S. Department of Health, Education, and Welfare. However, points of view or opinions expressed do not necessarily represent policies or positions of the Office of Education.

## Executive Summary

### Comprehensive Career Education Project University of Maine

G00760338

#### INTRODUCTION

The comprehensive career education project has involved the Bangor public school system and the University of Maine, a large multi-purpose state university in northern New England, as partners in demonstrating exemplary career education concepts and methods. Teacher training, curriculum development and testing of procedures for involving university/college faculty were several of the major components of this effort. In addition, serving as a demonstration site to other public school systems in northern New England was an active part of this project. Specific project objectives were:

1. To infuse and demonstrate a comprehensive career education model in grades K-12.
2. To implement career education concepts through curriculum development in grades K-12 and post-secondary education.
3. To demonstrate to teacher educators at the University of Maine at Orono and Husson College the concepts, philosophy and methods of comprehensive career education.

Each of the above objectives was addressed through intensive in-service training, a seminar series and preparation of career education instructional materials.

The following summary was prepared to highlight the findings, conclusions and recommendations of project staff.

## INCREMENTAL ACCOMPLISHMENTS

The delivery of career education, both as a concept and practical reality, is a complex educational process. Public school systems and post-secondary institutions vary in their priorities, staff competence and institutional goals. As a result, multiple strategies must be used to integrate career education in these settings. The model developed in this project is unique in that it attempted to bridge the gap between teacher training institutions and the public school setting. The key accomplishments are as follows:

### LEVEL I - BANGOR PUBLIC SCHOOLS

In 1976-77 Bangor staff conducted multiple activities that resulted in:

1. The number of trained Bangor people in career education concepts and activities increasing from 35 to 338.
2. The number of intensively trained teachers and counselors, K-12, in career education philosophy, concepts, and activities increasing from 35 trained in 1975-76 to 68 (an additional 33 people).
3. The entire guidance K-12 staff, (12), the social work staff (2), the school psychologist, and two resource room teachers participating in an eight session career guidance in-service program during 1976-77.
4. Nineteen of the participants trained in the 1975-76 project participating in a week-long training session to become qualified career education demonstrators and building representatives.
5. The six career education building representatives/demonstrators at Bangor High School designing and developing a career education resource room which is available to all Bangor High School students (1,372 students).

6. Each of the 13 schools in the Bangor system having one or more building representatives and a centrally located library of selected career education materials for teacher and student use.
7. The K-12 career education activity guide, "Career Education Activities for You", was written and disseminated to 248 Bangor staff people, 50 participants at the Commissioner's Conference on Career Education in Houston, and 11 educators in Maine communities. In addition, last year's publication, "Career Education: What Is It and Why Would I Want It - A Handbook for Teachers," was reprinted and 100 copies disseminated with "Career Education Activities For You."
8. Twenty career education workshops were conducted in local and regional education agencies.
9. Eighteen bulletin boards and two learning centers were developed at the Bangor Career Education Center and are being utilized among the thirteen schools on a rotating basis.
10. Written Bangor career education materials were disseminated to 83 school systems, while over 45 visitors outside the Bangor system have visited and utilized the Bangor Career Education Center.
11. To encourage greater use and effectiveness, the audio-visual materials collected during the 1975-76 and 1976-77 project years and housed in the Bangor Career Education Center, are on a rotating schedule in the schools at appropriate grade level.
12. A K-6 career education curriculum infusion guide has been written and printed, while the 7-12 version is nearly completed.

#### LEVEL II - UNIVERSITY BASED ACTIVITIES

A variety of staff development and writing activities at the post-secondary level resulted in:

1. A revised administrative/organization - the format of each seminar was changed from six hour blocks to two hour sessions. For busy professionals this was received with a high degree of enthusiasm but in practice this proved to be too short and resulted in a lack of discussion time.

2. Seminar Content - a special notebook was prepared that contained career education material more appropriate to university based faculty/staff. Material used in our first project year was too public school oriented and was not as relevant to the intended audience. Seminar consultants were selected who had actually conducted post-secondary projects in career education and who were attuned to the problems existing in institutions of higher education.
3. Improved attendance - in the first project year attendance was sporadic and averaged about 65% at any one seminar session. In 1976-77 we had an attendance rate of 95% for seminar sessions and in our opinion, the improved content and format were instrumental in this gain.
4. Completed career education units - in the first year no career education instructional units were generated by the post-secondary participants. A total of 25 units were prepared by the participants in 1976-77.
5. Follow-up activities - a concerted effort was made to determine the degree of implementation by each participant in teacher education courses and over 400 students were impacted directly.
6. Improved Level II participant reactions - descriptive data reflect both positive and specific reactions to the seminar series. In 1975-76 our reactions were of a general nature and did not provide enough directions for specific changes. The remarks provided in 1976-77 have a degree of specificity that is both rewarding and capable of translation into action. A short self-report instrument was developed as was a lengthy in-depth personal interview form.
7. A revised career knowledge test - as a result of 1975-76 experiences, it was possible to develop an assessment instrument that more accurately assessed the seminar content. Test items were developed from seminar presentations made to the JMO and Husson faculty and staff.
8. A publication entitled, Career Education in Higher Education - this publication was developed as a product of the seminar series. It contains 75 career education units to be utilized by post-secondary educators in assisting students in their own career development and to train future teachers in career education.
9. Increased faculty involvement - If funded in 1977-78 the College of Engineering Science has agreed to participate as a result of feedback from colleagues.

After reviewing the major objectives, activities, and evaluation data for the 1976-77 year of the project the following conclusions were drawn. The conclusions are divided into three sections. The first section will focus on general conclusions.

#### GENERAL CONCLUSIONS

After reviewing the evaluation data, the following conclusions were drawn:

1. Increases in career education knowledge can be attained via planned in-service training programs. The use of consultants, pre-selected materials, field visitations, career resource centers, community visits and business-industry speakers enhance this process.
2. Materials for in-service training must be selected that are appropriate for public school and post-secondary personnel. Career education materials for public school personnel are readily available, but materials for post-secondary faculty are not.
3. Local site idiosyncrasies, distant communication problems, and overcommitment by the testing organization may be a hinderance to local staff.

#### LEVEL I - BANGOR PUBLIC SCHOOLS

It appears, based on critical review of the evaluation data, that the following conclusions are justified:

1. Bangor Public School students were examined for self concept growth, occupational knowledge and career awareness. Test scores indicate that students who attend career education infused courses demonstrate greater gains in self concept, career maturity (career awareness, decision-making and career planning), improved attitude toward school.
2. Teachers in the Bangor school system produced acceptable career education infused curriculum units after receiving training. The materials were reviewed in accordance with Criteria for the Evaluation of Career Education Materials (developed by Madison Public Schools, Madison, Wisconsin).

3. The use of teachers trained in the 1975-76 project year as building representatives and resource contacts is an effective practice. The data suggests that enthused and committed teachers will have an impact on those colleagues who have had less involvement.
4. In-service training must be planned, sequential and evaluated if impact on the school curriculum is to occur. The findings unequivocally reveal a trend whereby career education training leads to increased infusion activities in the classroom. An increase in use of career education materials and activities by classroom teachers from October 1976 to February 1977 was noted in a positive direction.
5. Data from the student assessment conducted by National Testing Service were not available and will be furnished in October 1977.

#### LEVEL II - UNIVERSITY BASED ACTIVITIES

Findings in this level of the project has particular significance for planning in-service training in post-secondary institutions:

1. Follow-up interviews with Husson College, and UMO faculty indicate that:
  - a. Seminar content should be based on carefully designed conceptual models if they are to receive acceptance by post-secondary staff.
  - b. Seminar consultants should be cognizant of the values and pressures relevant to post-secondary institutions. In essence, consultants were well received by the participants if they had actually implemented the concepts or model they were presenting.
  - c. Seminar materials - carefully selected career education reports, models or implementation techniques that were applicable to higher education received enthusiastic endorsement. Materials more appropriate to public schools were not well received.
  - d. Seminar format - the participants consistently recommended increased time for discussion and the use of instructional exercises to develop units.
  - e. Seminar participation - the participants cited interest (77%) and professional growth (46%) as the most important reasons for electing to participate in the seminar series. Other reasons were cited and the motivating factors to attend this seminar series is more complex than originally perceived. The awarding of a stipend does not appear to be the prime motivating factor, but it was important to some participants.

2. The role of the university or college in career education is open to varying interpretation. A composite conclusion indicates that career education fulfills a dual role: (a) As a vehicle to assist students with personal self development, career exploration and improved decision-making; and (b) as a vehicle to train pre-service teachers to implement career education in the secondary school classroom. Faculty interest in this project was very high, but there were differing interpretations within our group regarding the role of career education on the campus.
3. Knowledge of the career education concept can be increased via structured career education seminars. Attendance and participation was excellent and the group was unanimous in their suggestion that more time be allotted in 1977-78 for discussion.
4. University/college based professionals were not enthusiastic about visits to public schools to observe career education in action.

#### RECOMMENDATIONS

The major objectives of this project were to (1) demonstrate comprehensive career education in grades K-12 and (2) demonstrate to teacher educators at Husson College and UMO the concepts, philosophy and methods of comprehensive career education. As a result of massive in-service training efforts, curriculum development activities and rigorous evaluation procedures the following recommendations are suggested for persons considering similar projects:

#### LEVEL I - BANGOR PUBLIC SCHOOLS

An analysis of the data indicates that the following recommendations are appropriate for educators attempting to introduce career education:

1. Develop career education resource centers that can respond quickly to faculty requests for technical assistance.
2. Secure overt commitments from the administrative leadership personnel to support in-service training programs, curriculum revision and student assessment.

3. Select tests that have content consistent with project objectives and keep student testing requirements to a minimum.
4. Involve the guidance staff in the in-service training program at its initial inception.
5. The use or involvement of independent research and development centers should be approached with caution.
6. Local school systems should begin investing financial resources by the second project year as a sign of commitment.

## LEVEL II - UNIVERSITY BASED ACTIVITIES

The following recommendations pertain to post-secondary institutions:

1. Career education seminars are a viable means of introducing career education to university/college faculty and should be at least three hours per session.
2. Plan the seminar series to include individual or panel presentations by business and industry leaders to expand faculty knowledge of the surrounding community.
3. Plan, develop and use structured group learning exercises that simulate curriculum planning.
4. Use consultants that have credibility, i.e. project leadership, theoretical understanding and experience with career education at the post-secondary level.
5. Select career education materials that are correlated with the seminar content. Provide sample career education units that have been used in higher education to faculty participants.
6. Organize the pre-prepared handout material so that it can be reviewed prior to the seminar session that focuses on that topic.
7. Avoid visits to public school career education sites unless requested by the faculty.
8. Increase or indicate activities that require active participant involvement, e.g. writing a career education unit or visits to business/industry.

In essence, the installation of career education requires multiple strategies that utilize a team approach. All faculty, administrators

and members of the community at-large must have an involvement in the planning of comprehensive career education programs. The efforts reported in this project for 1976-77 indicate that career education receives a favorable reception when it is planned, sequential and related to the perceived needs of the recipients.

Comprehensive Career Education Project  
G00760338

FINAL REPORT  
1976-1977

Comprehensive Career Education  
G00760338

University of Maine  
College of Education  
Orono, Maine

Final Report  
1976-77

DISCRIMINATION PROHIBITED

Title VI of the Civil Rights Act of 1964 states: "No person in the United States shall, on the ground of race, color, or national origin, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under the program or activity receiving Federal financial assistance." Title IX of the Education Amendments of 1972, Public Law 92-318, states: "No person in the United States shall, on the basis of sex, be excluded from participation in, be denied the benefits of, or be subjected to discrimination under any education program or activity receiving Federal financial assistance." Therefore, career education projects supported every program or activity receiving financial assistance from the U.S. Department of Health, Education, and Welfare, must be operated in compliance with these laws.

The material in this publication was prepared pursuant to a grant or contract from the Office of Education, U.S. Department of Health, Education, and Welfare. However, points of view or opinions expressed do not necessarily represent policies or positions of the Office of Education.

# TABLE OF CONTENTS

	PAGE
LIST OF TABLES . . . . .	v
PARTICIPANT SUMMARY . . . . .	vi
PROJECT NARRATIVE . . . . .	1
LEVEL I - BANGOR PUBLIC SCHOOLS	
MAJOR ACTIVITIES . . . . .	3
Subobjective 1.1 (Teacher Training) . . . . .	3
Subobjective 1.2 (Guidance Training) . . . . .	5
Subobjective 1.3 & 1.4 (Infusion K-12) . . . . .	5
Subobjective 1.5 (Evaluation) . . . . .	7
Subobjective 2.1 (Curriculum Development) . . . . .	9
Subobjective 2.2 (Demonstration) . . . . .	9
EVALUATION . . . . .	11
Intensive Staff In-Service . . . . .	11
Evaluation of Career Education Demonstrators . . . . .	13
Evening In-Service Program . . . . .	15
Guidance In-Service Training . . . . .	19
System-Wide In-Service . . . . .	21
Curriculum Infusion Guide K-6 . . . . .	23
Summary of Incremental Improvements 1976-77 . . . . .	23
ANTICIPATED CHANGES AND/OR PROBLEMS . . . . .	25
Problems . . . . .	25
DISSEMINATION ACTIVITIES . . . . .	27
National Activities . . . . .	27
Regional Activities . . . . .	29

# TABLE OF CONTENTS (continued)

	PAGE
SPECIAL ACTIVITIES. . . . .	34
LEVEL II. - UNIVERSITY BASED ACTIVITIES	
MAJOR ACTIVITIES. . . . .	36
Husson College . . . . .	37
University of Maine at Orono . . . . .	38
Level II Objectives. . . . .	39
Subobjective 2.1 (Husson Training) . . . . .	39
Subobjective 2.2 (University of Maine Training) . . . . .	41
Subobjective 2.3 (University Role) . . . . .	43
Subobjective 2.4 (Materials & Literature) . . . . .	45
Subobjective 2.5 (Demonstrations & Visits) . . . . .	47
EVALUATION. . . . .	51
Husson College . . . . .	52
University of Maine (UMO). . . . .	55
Follow-up Interview For University Based Career Education Seminar Series . . . . .	63
Introduction . . . . .	63
A. Demographic & Background Data. . . . .	64
B. Seminar Series . . . . .	66
C. Consultants. . . . .	69
D. Materials. . . . .	70
E. Seminar Format . . . . .	71
F. Field Visit/Demonstration. . . . .	72
G. Participant Motivation . . . . .	73
H. Unit Development . . . . .	78

# TABLE OF CONTENTS (continued)

	PAGE
I. Infusion of Career Education. . . . .	79
Career Education Unit Review. . . . .	81
Summary of Incremental Improvements 1976-77 . . . . .	82
ANTICIPATED CHANGES AND/OR PROBLEMS. . . . .	84
Recommendations for 1977-78 Seminar Series. . . . .	84
Objectives. . . . .	85
Activities. . . . .	85
Evaluation. . . . .	86
DISSEMINATION ACTIVITIES . . . . .	87
National Activities . . . . .	87
State & Local Activities. . . . .	90
SPECIAL ACTIVITIES . . . . .	93
REFERENCES. . . . .	94
APPENDICES. . . . .	95
A. CENTER FOR VOCATIONAL EDUCATION EVALUATION REPORT. . . . .	96
B. CAREER EDUCATION EVENING WORKSHOP SERIES . . . . .	103
C. GUIDANCE WORKSHOP SERIES . . . . .	104
D. NATIONAL TESTING SERVICE FINAL REPORT. . . . .	106
E. CAREER EDUCATION QUESTIONNAIRE . . . . .	107
F. TEACHER SURVEY FOR CAREER EDUCATION IMPLEMENTATION LEVEL . . . . .	108
G. EVENING IN-SERVICE COURSE EVALUATION FORM, . . . . .	109
H. CAREER EDUCATION IN-SERVICE TEST AND SCORING KEY . . . . .	111
I. CAREER GUIDANCE WORKSHOP IMPLEMENTATION SURVEY, 1976-77. . . . .	118
J. IN-SERVICE EVALUATION. . . . .	119

# TABLE OF CONTENTS (continued)

	PAGE
K. PARTICIPANT EVALUATION OF SYSTEM-WIDE CAREER EDUCATION PROGRAM. . . . .	120
L. CRITERIA FOR THE EVALUATION OF CAREER EDUCATION MATERIALS. . . . .	125
M. MATERIALS EVALUATION FORM. . . . .	128
N. DOCUMENTATION OF PROBLEMS WITH NATIONAL TESTING SERVICE. . . . .	129
O. PRINTED ARTICLES AND PRESS RELEASES. . . . .	131
P. HUSSON COLLEGE SEMINAR SERIES. . . . .	136
Q. UMO SEMINAR SERIES. . . . .	138
R. HUSSON SEMINAR CONSULTANT LIST. . . . .	140
UMO SEMINAR CONSULTANT LIST. . . . .	141
S. CAREER EDUCATION UNIT FORMAT. . . . .	142
T. FOLLOW-UP INTERVIEW QUESTIONNAIRE. . . . .	143
U. SPECIAL CAREER EDUCATION READING LIST. . . . .	158
V. UNIVERSITY BASED SEMINAR EVALUATION FORM. . . . .	160
W. CAREER EDUCATION KNOWLEDGE TEST, 4TH EDITION. . . . .	163
X. UNIVERSITY BASED SEMINAR SERIES: EVALUATION FORM (1ST REVISION). . . . .	172
Y. A DESCRIPTION OF THE SOCIAL SCIENCE RESEARCH INSTITUTE OF THE UNIVERSITY OF MAINE. . . . .	177

# LIST OF TABLES

TABLE		PAGE
1	Level I Staff Training Accomplishments - Bangor Public Schools . . . . .	4
2	Comparison of Means on a Career Education Test for Career Education In-Service Workshop Participants . . . . .	12
3	Summary Teacher Survey . . . . .	14
4	Participant Evaluation of Evening In-Service Program . . . . .	17
5	Participant Evaluation of the Evening In-Service Program . . . . .	18
6	Participant Evaluation of Guidance In-Service Training . . . . .	20
7	Husson Faculty/Staff Composition . . . . .	40
8	UMO Faculty/Staff Composition . . . . .	42
9	University Career Education Materials . . . . .	46
10	Consultants and Illustrative Examples of Their Content Presentations . . . . .	48
11	Comparison of the Means on the Career Education Knowledge Test of Husson College Faculty with a Control Group . . . . .	54
12	Seminar Evaluation Responses Husson College Series . . . . .	56
13	Husson College Faculty and Staff Open-ended Seminar Evaluation Responses . . . . .	57
14	Comparison of Means on the Career Education Knowledge Test of University of Maine, Orono Faculty with a Control Group . . . . .	59
15	Seminar Evaluation Responses University of Maine Orono . . . . .	61
16	Demographic and Background Data on University Based Career Education Seminar Series Participants . . . . .	65
17	Ratings of Motivational Factors by UMO Faculty . . . . .	77

## CAREER EDUCATION PROGRAM

## PARTICIPANT SUMMARY

NOTE. Participants include those DIRECTLY served by the project or, in the case of most parents and persons in the business/labor/industry community, who actively assist in project implementation. "Actively assist" includes efforts such as serving as resource persons, serving on Advisory Groups, providing work experience, etc.

FORM APPROVED  
OMB NO. 51-R1187

NUMBER OF PARTICIPANTS (see NOTE above) WHO ARE	RACE/ETHNICITY (all Participants including Handicapped, Gifted and Talented, and Low Income)						OF THE TOTAL (column (6)) NUMBER WHO ARE			OF THE TOTAL (column (6)) NUMBER WHO ARE	
	AMERICAN INDIAN OR ALASKAN NATIVE	ASIAN OR PACIFIC ISLANDER	BLACK/ NEGRO	CAUCASIAN/ WHITE	HISPANIC	TOTAL (sum of columns (1) through (5))	HAND- CAPPED	GIFTED AND TALENTED	LOW INCOME	MALE	FEMALE
	(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)
STUDENTS											
ELEMENTARY (K-6)	19	1	18	2,922	2	3,060	91	122	1,047	1,488	1,572
MIDDLE/JUNIOR HIGH (7-9)	21	4	10	1,302	-	1,337	37	53	460	643	694
SENIOR HIGH (10-12)	10	5	12	1,210	-	1,237	51	49	280	532	705
2-YEAR COLLEGE	-	-	-	-	-	-	-	-	-	-	-
4-YEAR COLLEGE	1	-	3	75	1	79	2	2	3	45	34
ADULTS (non-matriculated)	4	2	1	89	2	98	-	-	42	37	61
SUB-TOTAL	55	12	44	98	5	5,881	181	226	1,832	2,745	3,066
EDUCATIONAL PERSONNEL											
TEACHERS	2	1	1	334	-	338					
COUNSELORS	-	-	-	12	-	12				10	2
ADMINISTRATORS	-	-	-	11	-	11				11	0
MEMBERS OF THE BUSINESS/ LABOR/INDUSTRY COMMUNITY	1	-	2	320	2	325					
PARENTS	3	-	2	584	1	590					
OTHER (specify)	-	-	-	35	-	35					
TOTAL	61	13	49	1,394	8	7,192					

# CAREER EDUCATION PROGRAM

1. Project No.: 55AH60463	2. Grant No.: G00760338	3. Nature of Report: ___Semi-Annual ___X Final
4. Project Title: Comprehensive Career Education Project		5. Period Covered by This Report: From: 7/1/76 To: 6/30/77
6. Category of Project (as specified in 45 CFR 160d.5 and 160d.11): X Incremental ___Settings___Populations___Training___Communications___State Plan		
7. Name of Project Director: Dr. Charles W. Ryan		
8. Name and Address of Grantee/Assistance Contractor Institution: University of Maine Orono, Maine 04473		Telephone: Area Code Number 207 581-2531

To facilitate review of this final performance report for each major section of the Comprehensive Career Education Project all objectives for the two levels were reviewed and appropriate support data provided. Where feasible, sample project materials are appended. The project objectives are stated for ease in reviewing and linking the major accomplishments to each activity. All project activities were subjected to summative review by the staff to ascertain the status and degree of accomplishment for each objective. A concerted effort for brevity without sacrificing a qualitative review of our efforts guided the compilation of this report. The third party evaluation team from the Center for Vocational-Technical Education, the Ohio State University reviewed

a preliminary report in June 1977 and provided comment prior to final preparation (See Appendix A). The report is divided into two major parts for ease in responding to the U.S.O.E. final report format:

Level I - Bangor Public Schools and Level II - University Based Activities.

LEVEL 1

BANGOR PUBLIC SCHOOLS

## Section 9

### MAJOR ACTIVITIES

The following data represent project accomplishments as related to each objective in Level I - Bangor Public Schools. A major objective of Level I was to infuse and demonstrate a comprehensive career education model in grades K-12.

Subobjective 1.1: Increase (from 35 to 338) the number of teachers (K-12) trained in career education concepts and techniques.

a. A workshop was conducted for all Bangor teachers. A total of 338 Bangor teachers, with the exception of the high school teachers, participated in the equivalent of two full workshop days that described and demonstrated the concepts of career education. The high school teachers were able to participate only one day, since in-service time scheduled for the spring was cut one day due to winter storms which caused school to be cancelled. Teachers who participated in the 1975-76 workshops and the project staff planned and implemented the 1976-77 programs. Sessions were planned to coincide with the school calendar. The data in Table 1 reflects staff training figures for the last two years with increases noted as appropriate.

Table 1

Level I Staff Training Accomplishments  
Bangor Public Schools

Category	1975-76		1976-77	
	Number of Participants	% of Total Staff	Number of Participants	% of Total Staff
Secondary School Teachers (7-12)	17	10	175	100
Elementary School Teachers (K-6)	14	9	147	100
Secondary Principals	0	0	9	100
Elementary Principals	6	75	8	100
Guidance Staff	4	29	14	100
Elementary - 4				
Junior High - 3				
Senior High - 7				
Assistant Teachers	0	0	25	100
Teacher Aides	0	0	23	100

Data compiled from attendance figures for all in-service training activities.

b. A total of 31 teachers (K-12) and two administrators also received advanced training in career education. A total of nine sessions, based on the eight career education elements and community involvement techniques were conducted (See Appendix B). In addition, all participants were given two release days for community exploration:

- (1) A day for three community field trips
- (2) A day for shadowing a city government worker

The general format for each session included one hour of theory on each of the career education elements, followed by demonstrations on

infusing the element into the classroom.

Subobjective 1.2: Demonstrate to the Bangor guidance staff career guidance techniques that facilitate career education in grades K-12.

In June 1976, the guidance staff recommended an in-service program that would be needed to implement changes in the Bangor guidance program, K-12. The guidance staff and career education consultant then planned and developed a 16 session in-service program. Eight sessions dealt with a variety of general guidance topics while eight focused on career education. The career education staff planned and implemented the eight career education sessions (See Appendix C - underlined sessions are the career education sessions).

In the area of guidance, in-service training efforts have resulted in a total of 12 guidance counselors, school social workers, resource room teachers (Special Education) and various education aides volunteering for the program. In the first project year (1975-76) only four guidance counselors participated. The incremental gain for 1976-77 represents total staff participation by members of the pupil personnel staff.

Subobjective 1.3: Infuse and demonstrate the implementation of career awareness activities in grades K-6.

Subobjective 1.4: Infuse and demonstrate the implementation of career exploratory and preparation techniques for students in grades 7-12.

The first step in achieving these two subobjectives involved recruiting 10 demonstrators and 15 building representatives from the

35 people trained in career educating during 1975-76. The demonstrators were to be involved in planning and implementing career education in-service programs and workshops. The building representatives were to serve as career education resource aides for their respective schools and act as liaison for information flowing from the central career education resource room and the schools. Because they felt the two roles were so closely related, the participants who applied for these positions wished to serve in both roles. This was approved and 19 demonstrators/building representatives were trained during the week of August 16, 1976 to demonstrate and train others in the philosophy, concepts and methods of career education. Also, they developed 40 career education classroom activities, five activities for each of the eight elements. The results of this workshop were:

- a. A building representative/demonstrator cadre of 19 educators trained to demonstrate to others the concepts, elements and methods of career education.
- b. A model career education demonstration strategy for Bangor teachers, K-12.
- c. A K-12 career education activity guide entitled "Career Education Activities For You".

In addition, each school in the system was provided funds for the purchase of career education materials to be used by its teachers in the infusion process. The Bangor career education staff members previewed and ordered materials for teacher use. Also, the career education staff has collected materials from career education projects throughout the nation in order to maintain and update resources

available in the career education resource room.

As an example of impact from the 1975-76 project, six high school teachers formed a team to plan, develop, and operate a career education resource room which opened in December 1976. The purpose of this room is to offer students the following services:

- a. Individual interest inventories (Holland's Self Directed Search, Super's Work Values Inventory, and JOB-O).
- b. Career information and guest speakers. A total of three speakers or one a week since the opening of the career resource center on December 1, 1976.
- c. Post-secondary school information and guest speakers.
- d. Effective use of leisure time information and guest speakers.
- e. Job shadowing information.

These six teachers are examples of commitment to the career education concept and demonstrate their strong belief in the need for a resource center in the high school.

Subobjective 1.5: Demonstrate follow-through research techniques to assess the career education growth of selected third, fifth, seventh, ninth and tenth grade students over a three-year period.

Since the Comprehensive Career Education Project was selected as part of the nation-wide study involving 15 projects, the grade levels used in the 1976-77 proposal were adjusted to the format established by National Testing Service (Grades 5, 8, 11). Therefore, Subobjective 1.5 has been changed to read as follows:

To assess the Career Education growth of selected fifth, eighth, and eleventh grade students in the Bangor Public Schools.

The previous objective is consistent with evaluation plans approved by the Office of Career Education in the contract awarded to National Testing Service, Durham, North Carolina.

In August 1976, John Goode of National Testing Service presented the evaluation plan at a meeting of Bangor administrators, career education building representatives/demonstrators and last year's teacher participants. At this meeting Bangor personnel were invited to review the National Testing Service plan and had the opportunity to ask questions concerning the procedures. A total of 18 Bangor staff members attended the general information sessions, while nine attended a follow-up session to develop questions for the Bangor "unique" design portion of the evaluation. The pretests were administered to approximately 243 grade five students, 219 grade eight students, and 203 grade eleven students during the week of October 18, 1976. The posttests were administered to the same number of students during the week of May 16, 1977. In addition, students tested completed student information surveys, while 37 teachers, 11 administrators, and 12 counselors were asked by National Testing Service to complete questionnaires regarding their involvement in career education.

As of August 30, 1977 National Testing Service has not provided the Bangor Schools with technical analysis of the pre and posttest data. In addition, evaluation of the unique design portion of Level I has not been received. It is anticipated that an addendum to this final report will be necessary after the above data is received.

A second primary objective of Level I was to infuse career education concepts through curriculum development.

Subobjective 2.1: Develop curriculum, K-12, which infuse career education concepts.

Development of a Career Education Curriculum Infusion Guide required a major effort in the last six months. The guide was designed to aid Bangor teachers in infusing career education concepts into each grade level and subject area. Only the K-6 guide has been printed to date and will be included under separate cover due to its size. Although the secondary portions have been written, the Bangor Career Education Advisory Committee did not approve certain sections of the guide and asked that publication be postponed until greater teacher input can be gained for the Beginning Competency and Career Exploration segments. Since teacher acceptance is crucial to implementation of the guide, the revised section will not be available until Fall 1977.

Subobjective 2.2: Demonstrate activities in career education in a wide variety of grade levels and disciplines, K-12.

A summary of the major activities conducted in 1976-77 is listed:

1. The equivalent of two full days of in-service training for K-9 staff were conducted.
2. One day of in-service training for all 10-12 staff was provided.
3. Intensive workshop program for 33 teachers and one principal was provided.

4. An eight session career education in-service for the total guidance and social work staff was conducted.
5. Development of Bangor high school career education resource room for student and teacher use.
6. Completion of 19 presentations in workshops outside the Bangor system.
7. Dissemination of written materials to 30 people outside the Bangor system.
8. Development of a career education activity book entitled, "Career Education Activities For You".
9. Development of a career education infusion guide, K-12.

## Section 11

## EVALUATION

A major portion of the evaluation for Level I of the project has been conducted by the National Testing Service (Results of their findings are included in the National Testing Service final report, Appendix D). Additional evaluation activities were conducted for the following major activities by the project staff.

Intensive Staff In-Service (August 19-23, 1976)

A five day workshop was designed to train 19 teachers to act as demonstrators and building representatives in the training of other educators in the philosophy, concepts and methods of career education. This workshop emphasized the eight career education elements and procedures for infusion into the current curriculum. Participants were encouraged to design their own techniques. Additional emphasis was placed on developing strategies to demonstrate the career education concept to the entire staff.

The initial procedure for evaluating this workshop was to measure the knowledge gained by the participants. This was accomplished by means of a pre posttest design. A questionnaire was designed by the project staff based on the actual content of the workshop. This instrument consisted of two open-ended questions. These questions were designed from the content of the seminar and they were scored utilizing an objective scoring criteria that was developed by the project staff. Appendix E contains a copy of the questionnaire and the scoring criteria utilized.

There were no attempts to ascertain the validity or reliability of this test and the results must be interpreted within this limitation.

This instrument was given to all participants (N=19) just prior and immediately following the workshop. A two tailed "t" test for paired groups was used to compare the means. The results showed that the posttest scores were significantly higher than the pretest scores,  $t(18) = 12.63$   $P < .0001$  (See Table 2).

Table 2

Comparison of Means on a Career Education Test  
For  
Career Education In-Service Workshop Participants

Group	N	$\bar{X}$	S.D.	t
Pretest	19	12.82	3.1	12.63***
Posttest	19	25.21	3.3	

\*\*\*  $< .0001$

These evaluation results demonstrate that the participants of this workshop had a significant increase in their knowledge about career education. In spite of the limitation of the test and the lack of a control group, we feel that the participants not only increased their knowledge about career education but that it had a positive effect on their attitudes as well. This has been demonstrated throughout the year as these teachers have been very active and enthusiastic in developing the career education program in Bangor and involving the total teacher and support staff.

### Evaluation of Career Education Demonstrators

A second evaluation was undertaken to measure the impact of the demonstrator/building representatives on other staff members. This evaluation centered around a questionnaire that was developed by the project staff and given to all teachers and support personnel during October 1976 and again in February 1977. The questionnaire (See Appendix F) was designed to measure three major areas, contact with career education demonstrators/building representatives, number of career education units employed by teachers, and the percentage of total instructional time related to career education. Although no formal reliability or validity data is available, the Bangor staff felt that the questionnaire adequately and consistently measured what it purported to measure (See Table 3).

In general, the Bangor school personnel were better informed and had a more positive attitude toward career education in February than in September. This trend was evident throughout the questionnaire and was encouraging. On the other hand, it appears that there is a small percentage of teachers who are actively involved with career education as a philosophical exercise and have not translated the concept into classroom learning. We feel encouraged that the trend is in a positive direction with more school personnel becoming actively involved with career education. We also are well aware that strong leadership needs to be exhibited by the career education staff if this concept is going to become a viable educational philosophy throughout the Bangor Public Schools.

Table 3  
Summary Teacher Survey

1. Are you familiar with the Career Education Project in the Bangor Schools.					
		Yes	No		
October 1976		80%	20%		
February 1977		97%	3%		
2. What is your attitude toward the Career Education Project in the Bangor Public Schools.					
Oct. '77 - Highly Favorable	Favorable	Undecided	Unfavorable	Highly Unfavorable	
18.3%	34.3%	40.9%	3.0%	1.7%	
Feb. '77 - Highly Favorable	Favorable	Undecided	Unfavorable	Highly Unfavorable	
23.5%	50.5%	13.0%	6.1%	5.7%	
3. Do you know the career education specialist in your building?					
		Yes	No		
October 1976		66%	34%		
February 1977		88%	12%		
4. How often do you meet, formally or informally, individually or in groups with a career education representative and/or demonstrator. Note: Your answer should be based on a monthly average.					
	less than 5	5-8	9-12	13 or more	
October 1976	91.3%	4.8%	0.9%	2.6%	
February 1977	84.3%	7.4%	3.9%	3.5%	
5. How often do you use career education materials or activities? Note: Your answer should be based on a weekly average.					
	less than 5	6-10	11-15	16 or more	
October 1976	84.3%	8.3%	0.4%	3.9%	
February 1977	73.0%	17.0%	2.6%	4.8%	
6. How much of your instructional time is based on the career education concept?					
	less than 10%	11-25%	26-50%	greater than 50%	
October 1976	70.4%	17.0%	4.3%	4.3%	
February 1977	54.3%	30.9%	5.2%	5.7%	

### Evening In-Service Program

A total of 31 teachers and two administrators received intensive training on the eight career education elements and community involvement techniques. There were a total of nine 2½ hour in-service workshops conducted as part of this program between October 1976 and February 1977.

Two evaluation procedures were utilized. The first, was an evaluation of each session by the participants. The questionnaire (See Appendix G) utilized for this purpose was modeled after the Evaluation Form developed by the Level II staff of this project. Some minor changes were made to accommodate the specific differences in target population and workshop format.

Participant comments are contained in Table 4 and Table 5. These comments reflect the quality of this program and the high degree of acceptance on the part of the participants. This seems to be an encouraging sign in the development of career education as a major force in the Bangor Public School System.

A second type of evaluation was conducted at the completion of the in-service program. A career education knowledge test was constructed by the project staff. Appendix H contains a copy of this instrument and a scoring key. This instrument was adapted from the Career Education Knowledge Test developed by the staff in Level II of this project. It consists of 50 items and was given during February 1977. It was designed to assess the knowledge gained by the workshop participants about career education and its implementation into a school system.

Test items were taken from the Career Education Knowledge Test or specifically developed by the staff to cover those areas peculiar to the Level I in-service program. Although no formal validity or reliability studies were completed, a review was conducted by the project staff to ascertain that it did in fact measure what it was intended to measure. The review utilized the following criteria:

1. Does the item reflect the content of the workshops or the required reading materials?
2. Is each item free of sex-stereotyping and ambiguity?
3. Does each distractor fit realistically within the content of the item?

Following the review, there were ten items changed to be consistent with the above criteria. An item analysis was not conducted after the test was administered.

This test was administered to all workshop participants (N=31). Utilizing a posttest-only design the test was also administered to a control group consisting of 44 teachers and administrators in another public school system. The control group was participating in an in-service program that was unrelated to career education. The control group was similar to the experimental group in terms of age, sex and years of teaching experience. A two tailed "t" test for independent groups was used to compare the means. The results showed that the experimental group scored significantly higher than the control group,  $t(73) = 8.28, p < .001$ . The mean score for the Bangor experimental group was 36.00 as compared to the control group mean of 26.56.

Table 4

Participant Evaluation of Evening In-Service Program

Assessment	Responses	Speaker Assessment	Responses	Session Strengths	Session Weaknesses
interesting	18	very effective	14	very good speakers	some sessions assumed I know more than I do
interesting	15	effective	15	many ideas shared	some sessions rushed
boring	0	somewhat effective	4	practical discussions	I did not agree with some speakers
ing	0	weak	0	small groups in second half	moves too fast
				I felt involved	
				comfortable to ask questions	
				many experiences shared	
				helpful material	

over 33 participants at the in-service workshops.

Table 5

## Participant Evaluation of the Evening In-Service Program

Item	Response Category (percentages)				
	Strongly Agree	Agree	Undecided	Disagree	Strongly Disagree
1) The objectives of this course were clear to me.	22.6	51.6	12.9	12.9	0.00
2) Specific goals and planning made it easy to work efficiently.	12.9	64.5	16.1	6.5	0.00
3) I did not learn anything new.	00.0	00.0	00.0	48.4	51.6
4) The material presented was valuable to me.	25.8	67.7	6.5	00.0	0.00
5) I was stimulated to think about the topics presented.	22.6	67.7	3.2	6.5	0.00
6) We worked well together as a group.	22.6	54.8	12.9	3.2	6.5
7) I did not have an opportunity to express my ideas.	0.00	9.7	0.00	54.8	35.5
8) My time was well spent.	9.7	87.1	3.2	0.00	0.00
9) The in-service series met my expectations.	12.9	67.7	9.7	9.7	0.00
10) The content presented was applicable to the implementation of career education at the K-12 level.	19.4	74.2	3.2	0.00	0.00

These evaluation results demonstrate that for those personnel who participated in the in-service workshop series, it resulted in a significant increase in their knowledge about career education. As was documented in the previous section, there is a trend toward increased use of career education concepts and materials in the school system. Part of this increase is due to the impact that workshop participants have had on their colleagues. In addition, the workshop series has had a positive impact upon the many hundreds of students that these teachers and administrators come in contact with on a daily basis.

#### Guidance In-Service Training

A total of 12 guidance counselors, four allied health personnel and four other support personnel participated in an eight session workshop designed to demonstrate career guidance techniques.

Two evaluation procedures were utilized. The first was an evaluation of each session by the participants. The same evaluation form utilized for the evening in-service program was used for the guidance workshop. A copy of this form is contained in Appendix G. Participants reactions and comments are summarized in Table 6.

These comments seem to reflect a high degree of acceptance of the program on the part of the participants. The participants appeared to have been stimulated by the program but there was no way of measuring its impact on counselor behavior. Thus, a second evaluative technique was planned. During the late spring, project staff interviewed each of the participants. The purpose of this interview was to document any

Table 6

## Participant Evaluation of Guidance In-Service Training

Content Assessment	Responses	Speaker Assessment	Responses	Session Strengths	Session Weaknesses
highly interesting	9	very effective	8	ideas from speakers	need more time
somewhat interesting	7	effective	10	handouts	need more discussion time
slightly boring	4	somewhat effective	0	it makes me think	Monday is a bad day to meet
very boring	0	weak	2	concrete information	not enough small group discussion
				group discussions	
				communication	
				practicality	

There were 20 participants at the guidance workshops.

changes in attitude or behavior on the part of workshop participants toward career education. A copy of the interview format is contained in Appendix I. The results of the interview indicate the following:

1. Of the 12 guidance counselor participants, all but one felt they had experienced a positive change in attitude toward career education. Eight out of 12 participants have not, as yet, implemented career education techniques.
2. The areas of the workshop which the counselors like best and wanted more in-depth exposure to were:
  - a. Community involvement
  - b. Group procedures
  - c. Role of elementary counselors in career education
  - d. Theory of career education followed by teacher demonstrations
  - e. Model delivery system for career guidance (ordered in term of priorities determined by participants)
3. Due to its tremendous broadness in scope, the area which counselors felt would be better to omit another time was humanistic education.

These interview results are limited because it was done by project staff and they may have been misinterpreted. It does appear that the guidance staff as a group are thinking positively about career education, but this change in attitude has not been translated into action. This guidance staff is traditionally oriented and it appears that additional work in terms of in-service training will be needed before this group shows any movement toward incorporating career education in their guidance program.

#### System-Wide In-Service

All teachers and administrators, with the exception of the high school staff who participated one day, in the Bangor Public School system participated in the equivalent of two full days of in-service

training. These workshops were conducted at each of three levels, elementary, junior high, and senior high. Their purpose was to describe and demonstrate the concepts, philosophy and methods of career education.

Each of these in-service workshops was evaluated by the participants. A copy of this evaluation form is contained in Appendix J. Results indicate that at the elementary level, the participants were most positive about the career education activities and ideas. At the junior high level, participants were most positive about the demonstration team concept and were least positive about the lack of time available in developing their own career education activities. At the senior high level, participants indicated a high level of interest in career education but were concerned about its tie-in with their various subject areas. A detailed listing of the evaluative comments for the elementary and junior high group are contained in Appendix K. The in-service workshops at the senior high level were not evaluated in the same detailed manner. Instead, general comments were elicited from each of the small group meetings.

Project staff were encouraged by the overwhelming favorable response to the in-service programs and to participant involvement. The message from the workshop participants was that career education seems to be worthwhile and that we want more of it. This is particularly important for future planning.

### Curriculum Infusion Guide K-6

Prior to completion, the guide was reviewed by the career education advisory committee utilizing Criteria for the Evaluation of Career Education Materials developed by the Madison Public Schools, Madison, Wisconsin (See Appendix L). The purpose of this review was to validate the usefulness and objectivity of the materials in relation to career education elements. The Materials Evaluation Form for the Curriculum Infusion Guide K-6 is contained in Appendix M.

### Summary of Incremental Improvements 1976-77

1. From the 35 trained Bangor staff members in the 1975-76 project, the number of trained Bangor people in career education concepts and activities has increased to 338.
2. The number of intensively trained teachers and counselors, K-12, in career education philosophy, concepts, and activities has increased from the 35 trained in 1975-76 to 68 (an additional 33 people).
3. In addition to four school counselors trained in career education last year, the entire guidance K-12 staff (12), the social work staff (2), the school psychologist, and two resource room teachers have participated in an eight session career guidance in-service program during 1976-77.
4. Nineteen of the participants trained in the 1975-76 project participated in a week-long training session to become qualified career education demonstrators and building representatives.
5. The six career education building representatives/demonstrators at Bangor High School designed, developed, and implemented a career education resource room which is available to all Bangor High School students (1,372 students).
6. Each of the 13 schools in the Bangor system has one or more building representatives and a centrally located library of selected career education materials for teacher and student use.

7. The K-12 career education activity guide, "Career Education Activities For You", was written and disseminated to 248 Bangor staff people, 50 participants at the Commissioner's Conference on Career Education in Houston, and 11 educators in Maine communities. In addition, last year's publication, "Career Education: What Is It And Why Would I Want It - A Handbook for Teachers," was reprinted and 100 copies disseminated with "Career Education Activities For You."
8. Twenty career education workshops/presentations outside the Bangor schools have been completed.
9. Eighteen bulletin boards and two learning centers have been developed at the Bangor Career Education Center and are being utilized among the thirteen schools on a rotating basis.
10. Written Bangor career education materials have been hand delivered or sent to over 83 school systems, while over 45 visitors outside the Bangor system have visited and utilized the Bangor Career Education Center.
11. To encourage greater use and effectiveness, the audio-visual materials collected during this and last year's project and originally housed in the Bangor Career Education Center, are now permanently housed or on a rotation schedule in the schools of appropriate grade level.
12. A K-6 career education curriculum infusion guide has been written and printed, while the 7-12 version is nearly completed.

## Section 12

## ANTICIPATED CHANGES AND/OR PROBLEMS

Problems

The problems which occurred during the first six months have involved the research design developed by National Testing Service (See Appendix N). The Bangor career education staff received a letter from E. W. Strang, Assistant Project Director for National Testing Service, dated January 11, 1977, and participated in an extensive telephone discussion January 17, 1977, which explained causes for past problems and planned strategies for alleviating any further difficulties. A summary of the problem areas are as follows:

1. Inadequate proctor training
2. Test materials not delivered on time
3. Test materials insufficient in number
4. Proctors not paid promptly
5. Coordinator not paid as much as had been verbally agreed upon
6. Informational materials not mailed to proper person
7. No word received that materials had been sent airfreight
8. Telephone communication never with the same person; never able to reach our liaison person by telephone

The project officer, Prentice Echols, was apprised of this issue and our concerns on December 22, 1976.

Since that time, no problems have occurred. Project staff are awaiting the results of the pre and posttesting which has been promised to be delivered in the late summer.

As mentioned previously, the planned K-12 Career Education Curriculum Infusion Guide was printed for K-6 only. This was due to dissatisfaction among some Bangor Career Education Curriculum Advisory Committee members concerning content in the Beginning Competencies and Career Exploration and Preparation segments in the 7-12 guide. The 7-12 portion will be printed in the Fall when committee members reach final agreement on content.

## Section 13

## DISSEMINATION ACTIVITIES

A variety of dissemination activities were planned and conducted by Level 1 staff. For example:

## NATIONAL ACTIVITIES

## A. Written requests for materials

- 1) Bernie Griffith  
Co-Director  
Career Education Project  
Peshastin-Dryden  
California

The Bangor Career Education  
Project Implementation Plan  
Fall 1975 - Spring 1977

- 2) David Lott, Coordinator  
Tri-County Career  
Development Program  
Chauncey, Ohio 45119

General write-up implementation  
plan  
"Career Education Activities For  
You" K-12

"Career Education: What Is It and  
Why Would I Want It?"

- 3) Carol Lyman
- 4) Nancy Wesphol
- 5) Donna Hartman  
Teachers  
Grand Forks, N.D.

"Career Education Activities  
For You" K-12

- 6) Joe Freeman  
Director of Vocational  
Education  
Mid-State Educational  
Cooperatives  
Little Falls, MN

"Career Education Activities  
For You" K-12

- 7) Carole McCown  
Technical Assistance and  
Training Specialist  
Research for Better  
Schools, Inc.  
Philadelphia, PA

"Career Education Activities  
For You" K-12

- 8) Gail A. Tronnes  
Career Specialist  
Minneapolis Public Schools  
4912 Vincent Avenue, South  
Minneapolis, MN

"Career Education Activities  
For You" K-12

- 9) James P. Stern  
P.O. Box 306  
Bellville, OH 44813  
"Career Education Activities For You" K-12
  
- 10) Ms. Patricia Pettress  
Detroit Public Schools  
Career Education Project -  
Room 844  
5057 Woodward  
Detroit, MI 48202  
"Career Education Activities For You" K-12
  
- 11) D. M. Clark  
Board of Education  
607 Walnut Avenue  
Niagara Falls, NY 14302  
"Career Education Activities For You" K-12
  
- 12) James W. Augustin  
Evaluation Specialist  
321 Education Building  
University of Wisconsin  
Madison, WI 53706  
"Career Education Activities For You" K-12
  
- 13) Dick Crombie  
Career Education Director  
Oshkosh Area School District  
215 S. Eagle Street  
Oshkosh, WI 54901  
"Career Education Activities For You" K-12
  
- 14) Nancy Lasikamp  
Upper Arlington Schools  
1950 N. Mallwa  
Columbus, Ohio 43221  
"Career Education Activities For You" K-12
  
- 15) Dr. Florence Mintz  
N. J. Department of  
Higher Education  
225 West State Street  
Trenton, NJ 08625  
"Career Education Activities For You" K-12
  
- 16) Gene Pambianchi  
Career Education Coordinator  
Phillipsburg High School  
Phillipsburg, N.J. 08865  
"Career Education Activities For You" K-12  
"Career Education: What Is It and Why Would I Want It?"
  
- 17) Mary J. Sheeran  
Director of Secondary  
Curriculum  
Richmond Unified School  
District  
1108 Bissell Avenue  
P.O. Box 4014  
Richmond, CA 94804  
"Career Education Activities For You" K-12  
"Career Education: What Is It and Why Would I Want It?"

18) Les Agnello  
Counselor, CDC  
Career Development Center  
1250 Twenty-Third Street  
Richmond, CA 94804

"Career Education Activities  
For You" K-12  
"Career Education: What Is It  
and Why Would I Want It?"

#### B. Conference Presentations

1. Commissioner's Conference on Career Education, Houston, Texas, November 8, 1976. "Career Education K-12 in Rural Settings"
2. Presentation at director's meeting, January 11, 1977, Akron, Ohio. "The Bangor Career Education Project, K-12"

#### C. Visitors

1. Canadian graduate students, August 2, 1976
2. John Goode, National Testing Service, August 18, 1976
3. Darrell Myreck, National Testing Service, October 4, 1976
4. Prentice Echols, Project Advisor, February 16 and 17, 1977
5. E. W. Strang, National Testing Service, April 4, 1977.

### REGIONAL ACTIVITIES

#### A. Written requests for materials

1) Steve Haggan, Guidance  
Director  
Hampden, ME

"Career Education Activities  
For You" K-12

2) Keith Bridgham, Principal

"Career Education Activities  
For You" 7-12

3) Nancy Haggan, Counselor  
Brewer Junior High School  
Brewer, ME

4) Winifred C. Black  
Waldo County  
Committee for Social Action  
Freedom, ME

"Career Education Activities  
For You" K-12

5) Al Savignano, Principal  
Edward Little High School  
Auburn, ME

"Career Education Activities  
For You" K-12

- |  |   |
|--|---|
| 6) Fred Freise, Assistant<br>Director<br>Career Education Project,<br>K-12<br>South Portland, ME | "Career Education Activities<br>For You" K-12 |
| 7) Mary Brewer<br>Jordan Acres School<br>Brunswick, ME   | "Career Education Activities<br>For You" K-6  |
| 8) Mrs. Priscilla Conner<br>Mt. Blue High School<br>Farmington, ME 04938                         | "Career Education Activities<br>For You" 7-12 |
| 9) Mrs. Barbara Cunningham<br>Mexico High School<br>Mexico, ME 04257                             | "Career Education Activities<br>For You" 7-12 |
| 10) Miss Terry Sotiriou<br>30 Carroll Street<br>So. Portland, ME 04106                           | "Career Education Activities<br>For You" K-12 |
| 11) David Driscoll<br>Guidance Department<br>Calais High School<br>Calais, ME                    | "Career Education Activities<br>For You" K-12 |
| 12) William E. Mehls<br>Vickery School<br>Pittsfield, ME 04967                                   | "Career Education Activities<br>For You" K-12 |

#### B. Presentations

1. State career education mini-conferences in conjunction with grant for development of state plan
  - a. Bangor, October 11
  - b. Presque Isle, November 1
  - c. Belfast, November 15
  - d. Machias, November 29
  - e. Portland, December 6
  - f. Augusta, February 8
  - g. Farmington, February 10
2. University of Maine, Orono, Graduate Class, October 18.  
"Career Education, K-12"
3. Conference on Humanistic Education, University of Maine, Orono, October 20. "Career Education, K-12"
4. Husson College Higher Education Career Education Seminar, November 18. "Career Education in the Secondary School"

5. Junior high school in-service workshop, Old Town, November 22. "Career Education in the Junior High"
6. Junior high school in-service workshop, Old Town, December 12. "Career Education in the Junior High"
7. Senior high school in-service workshop, Bucksport, December 13, 1976. "Career Education in the Senior High"
8. Regional Director's Meeting, Akron, Ohio, January 10-12, 1977. "The Bangor-Project"
9. University of Maine at Orono seminar, January 28, 1977. "Site Visitations in the Bangor Public Schools"
10. Dow Lane School, Bangor, Maine, parent-teacher group, February 2, 1977. "Career Education, K-12"
11. Fruit Street School, Bangor, Maine, teachers, March 17, 1977. "Affective Education in the Elementary Grades"
12. Orono Public Schools, Orono, Maine, entire K-12 faculty, March 23, 1977. "Implementing Career Education, K-12"
13. Brewer Public Schools, Brewer, Maine, total secondary and partial elementary staff, March 25, 1977. "Implementing Career Education, K-12"
14. Rotary Club, Bangor, April 26, 1977. "Career Education"
15. Career Education in Rural Settings regional workshop, Boston, Massachusetts, May 4, 1977.
16. Soroptomist Club, May 29, 1977. "Career Education"
17. Senate Subcommittee Hearing Concerning S1328, Senator William D. Hathaway, South Portland, Maine, June 6, 1977. "The Need for Career Education in Maine"

#### C. Visitors

1. Seven students, University of Maine, Orono, week of August 2
2. Canadian student, University of Maine, Orono, week of August 2
3. Barbara Adams, Guidance, Fairfield Junior High School, week of August 9
4. Brenda Roth, University of Maine, Orono, week of August 16
5. Dave Johnson, State Department of Education (recertification division), week of August 23

6. Claire Porter, School Board Member, week of August 23
7. Susan Gross, Community Person, week of August 23
8. Stephen Nowakowski, Bangor Mental Health Institute - Teacher, week of September 6
9. Brenda Roth, University of Maine, Orono, week of September 13
10. Mary Lou Maisel, Project CHOICE, Waterville, Maine, week of September 20
11. Stephen Haggan, Guidance, Hampden School Department, week of September 27
12. Marion Bagley, State Department of Education, week of October 4
13. Terry Creteau, Talent Search, Orono, week of October 11
14. Susan McLellan, Youth Advocacy, Old Town, week of October 11
15. Darrell Carter, RSVP Program, Bangor, week of October 18
16. Mary Lou Maisel, Project CHOICE, Waterville, Maine, week of October 18
17. Marion Bagley, State Department of Education, week of October 25
18. Patricia Healy, Guidance, Belfast High School, week of October 25
19. Patricia Crocker, Guidance, Machias High School, week of October 25
20. Angela Holden, University of Maine, Orono, week of October 25
21. Cathy Burbank, Bangor Mental Health Institute - teacher, week of November 8
22. Mary Lou Maisel, Project CHOICE, Waterville, week of November 15
23. Irene Mehnert, Youth Advocacy, Old Town, week of November 22
24. Connie Perry, University of Maine, Orono, week of December 6
25. Susan Gross, Community Person, week of December 6
26. Claire Porter, School Board Member, week of December 13
27. Jim Sturgell and Dana Hughes, assistant principal and guidance counselor, Ashland Public Schools, Ashland, Maine, week of January 19, 1977
28. Sally Brunette, interested parent and university student, Millinockett, Maine, March 22, 1977

29. Roz Spear, teacher, Bradley Elementary School, Bradley, Maine, May 17, 1977
30. Bob Garnett, Career Education Coordinator, Warsaw School District, Pittsfield, Maine, May 18, 1977

#### D. Media Coverage

1. Article concerning building representatives/demonstrators in "Bangor Daily News", August 30, 1976
2. Television coverage concerning building representatives/demonstrators workshop, August 25, 1976

Channel 5, Bangor  
Channel 2, Bangor  
Channel 7, Bangor

3. Article concerning system-wide elementary career education in-service program in "Bangor Daily News", October 23, 1976
4. Television coverage concerning guidance career education workshop, January 17, 1977

Channel 2, Bangor  
Channel 5, Bangor

5. Television coverage concerning elementary in-service program in career education, January 27, 1977

Channel 2, Bangor  
Channel 5, Bangor

6. Television coverage concerning evening teacher in-service program in career education, February 15, 1977

Channel 7, Bangor

7. Television coverage concerning special career education project done by first graders, Abraham Lincoln School, March 17, 1977

Channel 2, Bangor  
Channel 5, Bangor

(See Appendix O for printed articles and press releases).

## Section 14

## SPECIAL ACTIVITIES

The need for efforts to reduce race and sex stereotyping was demonstrated at every grade level through the in-service workshops. Separate sessions have been established to demonstrate the problem of sex stereotyping followed by discussion and/or concrete suggestions on how to reduce this in the classroom. The first junior high in-service day and the senior in-service program had a one hour segment devoted to this topic. One session in each of the elementary programs deals directly with sex stereotyping. Three-fourths of one of the evening sessions in the evening intensive teacher training programs involved a panel of workers in non-stereotyped roles (female doctor, male nurse, female truck driver) who talked with teachers and gave them hints on how not to falsely stereotype children. All materials considered for purchase were studied carefully to be sure stereotyping was absent before purchasing.

Although not specifically outlined in project objectives, strong emphasis was placed on offering career education to the handicapped. One Bangor elementary school deals with only the handicapped student - educationally mentally retarded, emotionally handicapped, learning disabled and/or physically handicapped. Three teachers from this school's staff of 15 participated in the first year Comprehensive Career Education Project in-service program. Two of these served as building representatives/demonstrators this year. Teachers from this school were very active in the career education in-service program this year and used a large number of career education materials. The secondary special education program for

educationally mentally retarded, emotionally handicapped, and learning disabled is housed in the same building with the career education resource room. Students in this program spent a great deal of time job shadowing, viewing career education materials, practicing employability skills, and practicing self-concept exercises. Teachers in the program utilized the resources in the career education resource room as well as input from local community workers. The teacher for the deaf used the career education resource room extensively and consulted with the career education coordinator about developing career education activities for her students. In summary, although professional staff have not been hired for the express purpose of developing career education programs for handicapped, in Bangor, experts in the special education field worked closely with career education staff and demonstrators to develop career education activities tailored to meet the specific needs of their students.

Level II

UNIVERSITY BASED ACTIVITIES

## Section 9

## MAJOR ACTIVITIES

Infusing career education in institutions of post-secondary education is a challenging task for several reasons. First, faculty priorities are oriented to those endeavors that lead to promotion and tenure. Scarce time after teaching a 12 hour load must of necessity be focused on research efforts that culminate in some type of publication. Second, financial resources for expansion and growth are severely limited, as a result faculty are being requested to teach increasingly heavier schedules. Also, for most post-secondary institutions, the period since 1972 has seen limited financial reward for exemplary teaching or research. Third, attempts to balance the budget have resulted in staff reductions, cuts in support service and increasing tuition costs for students. All of these factors have combined to limit innovation or new educational reforms in the post-secondary institution. The situation prevailing at Husson College and the University of Maine, Orono reflected all the cited factors, but in several respects tended to favor the introduction of career education.

Career Education as a concept received very favorable endorsements at both Husson College and UMO. In our opinion the following factors were conducive to introducing career education:

1. The need for improving faculty and staff career development services for students, both advising and career planning.
2. The need for innovation in existing curriculum, particularly teacher education. Combining field experience with classroom theory seemed to be a timely venture.

3. The job market was providing few choices to those pursuing the baccalaureate degree. The need for improved decision-making along with identifying several career options was attractive to those faculty/staff attempting to induce students to major in a certain discipline.
4. The need to address the purpose of post-secondary education, e.g. the perennial issue of vocationalism vs. the concept of a liberal education.

Career education stimulated our participants to examine the purpose of education and the goals of their unique discipline. In our opinion, the evidence gathered in the second year of this project supports the basic premise of all our efforts. Career education can be infused in post-secondary institutions via selected strategies. Sensitivity to the uniqueness of the faculty and staff who work in these settings will be critical to success.

The 1976-77 year of the Comprehensive Career Education Project has placed increased emphasis on the training and involvement of post-secondary instructional staff. In addition to teacher educators, several administrative personnel at Husson College and the University of Maine volunteered to participate in the seminar series. A brief description of the two campuses is presented to portray the context in which the Level I activities occurred.

#### Husson College

Since 1898, Husson College has developed and maintained a reputation for preparing teachers in Business Education, insurance executives, accountants, bankers, and management personnel. Since its inception, Husson has been committed to the development of business skills for students who are seeking immediate employment.

The faculty numbers about 43 with primary concentration in the areas of Business Administration, Accounting, Business Teacher Education and Secretarial Science. Husson is essentially a single function institution with a major emphasis on teaching. Research and public service efforts are not as strong in terms of overall staff commitment, but a slight change in this area has occurred since President Franklin Peters took office in 1971.

#### University of Maine at Orono

The University of Maine at Orono (UMO) was the original land grant institution for the state and received its charter in 1865 under the provisions of the Morrill Act (1862). Since its opening in 1868 with 12 students and two faculty members, the Orono campus has grown to a multi-purpose institution with more than 9,000 students and more than 500 professional staff members. UMO is committed to providing public service, research and teaching to members of the public and students enrolled in one of the five colleges. Interested students can choose from a variety of programs, both two and four year. Administrative units of UMO include the Colleges of Arts and Sciences, Life Sciences and Agriculture, Business Administration, Education, Engineering and Science, and Graduate School. A two year community college is administratively attached and located in Bangor, Maine.

The broad range of missions and functions creates a different atmosphere for the introduction of career education at UMO. The diversity between Husson and UMO necessitates a different perspective

in organizing career education materials and seminar format. However, our recruitment procedures were essentially the same for both campuses.

### Level II Objectives

A major objective for Level II was to demonstrate to teacher educators at Husson College and the University of Maine the philosophy, methods and objectives of comprehensive career education. A review of each subobjective for Level II indicates the following accomplishments:

Subobjective 2.1: Train 18 teacher educators at the Husson College campus in the philosophy, objectives and content of career education.

A seminar series was designed by project staff and consisted of four career education content sessions and out-of-class assignments (See Appendix P). The Husson series consisted of four two hour presentations by consultants, all of whom had an extensive background in the career education field. The topics included:

1. Foundations of Career Education: An Overview
2. Career Education Modules for Four Year Institutions
3. Demonstrations of Career Education Programs
4. Infusing Career Education in Undergraduate Programs

The purpose of this seminar series was to provide an overview of the philosophy, concepts and practices of career education with particular emphasis on post-secondary models. The consultants and reading materials for this seminar series were specifically selected to help examine career education from both a philosophical and applied base.

Recruitment of participants was coordinated through Professor Delores Renaud at Husson College and resulted in a total of 19 participants:

Table 7  
Husson Faculty/Staff Composition

Academic Ranks Represented*		Academic Areas Represented	
Full	4	Accounting	1
Associate	4	Secretarial Science	8
Assistant	5	Teacher Education	3
Instructor	6	Business Administration	2
Total	19	Administration	5
		Total	19

\*At Husson many faculty hold dual appointments in teaching and administration.

A letter describing the project and seminar series was sent to each person with a registration card to be filled out if he/she agreed to participate. Each participant was informed that payment of the stipend was contingent upon attendance and completion of a career education infused course unit by February 7, 1977. The Husson College seminar series concluded December 9, 1976 and additional consultant services to the participants were provided on a request basis. Consultant services consisted of providing career education unit development ideas and sample materials that illustrate career education teaching methods.

The process of unit development proved to be more demanding than originally anticipated. After reviewing the original draft and making various editorial comments the materials were returned to the author. All faculty were requested to review the suggested

revisions and furnish missing bibliographical citations, clarify incomplete concepts, or add additional explanatory material as needed. The completed units were published in a separate monograph entitled Career Education in Higher Education: An Infusion Model.

A total of 13 of 19 Husson faculty/staff received payment for delivery of a career education instructional unit. A total of 11 units were received as several faculty decided to work as a team.

The six who did not complete the task were polled to ascertain what factors impeded their efforts. The survey indicated that one was ill, four were busy or had other commitments and one enrolled for interest purposes only. Further comments are detailed in section 11, Evaluation:

Subobjective 2.2: Train 14 teacher educators at the University of Maine at Orono in infusion strategies for teacher education.

The seminar series for the UMO staff included seven two hour sessions and a participant arranged field visit to a career education class in the Bangor Public Schools (See Appendix Q). In order to fully utilize the consultants to the seminars, they were contracted to make presentations to both Husson and UMO staff. The Husson seminars were scheduled on Friday morning to reduce travel and fees. The consultants utilized to date are listed in Appendix R.

Essentially, the same recruiting procedures were used to select these participants from the College of Education and School of Human Development. A total of 25 UMO faculty and staff responded to the

announcement letter and project abstract. A total of 16 of these individuals participated in the seminars. The following selection criteria were established to ensure diversity among participants.

The criteria were:

- A. Representation from different academic subject areas
- B. Participation in 1975-76 series (two were selected)
- C. Representation of different academic ranks - Professor, Associate Professor, Assistant and Instructor
- D. High student contact at the undergraduate level

The following table indicates that we achieved good academic rank and field representation:

Table 8

UMO Faculty/Staff Composition

Academic Ranks Represented		Academic Areas Represented	
Full Professor	2	Administration	1
Associate Professor	5	Special Education	2
Assistant Professor	4	Education Administration	1
Instructor	4	Counselor Education	1
Administration	1	Language Arts	1
Total	16	Science Education	1
		Educational Foundations	5
		Upward Bound Program	1
		Child Development	2
		Adult Education	1
		Total	16

In addition to seminar participation each participant was required to deliver a completed career education infused instructional unit. A suggested unit format model (See Appendix S) was provided each faculty or staff member to insure some consistency in structure.

In general, the overall quality of the units prepared by UMO faculty and staff were of higher quality than those prepared by the Husson College participants. Several reasons probably account for this variance. First, the UMO group are under constant pressure to conduct research and publish the findings. Second, the primary mission for Husson faculty is to teach and a 15 hour academic load is not uncommon. There is less pressure to conduct research, write articles, and prepare technical reports, etc. than the UMO faculty experience. A total of 16 units were received from the UMO participants and subsequently published with the Husson units.

Subobjective 2.3: Define the role of the University/College in career education.

To accomplish this particular subobjective a variety of activities were conducted to determine a "definition" of how faculty/staff perceive this role in two different teacher training institutions. The activities were:

1. Analysis of post-seminar evaluation responses. Preliminary data from Husson had indicated that these post-secondary faculty members want very structured examples of "How-To-Do-It" career education units, more structured class exercises and less philosophical discussion.
2. Interviews with Husson and UMO faculty and staff provided descriptive data regarding their conceptualization of the career education concept.
3. Analysis of the consultant presentations indicated that the various roles and functions performed by university staff will need to be considered in implementing career education.

4. Examination of a variety of reading materials by the seminar participants to clarify the philosophy, concepts and methods of career education.

This implies that Husson faculty/staff perceive the role of career education as either being imposed upon them or models being provided for them to adopt. Their comments don't support the idea of development from within. The perceptions of UMO faculty/staff indicate divergent views regarding the role of career education in higher education.

For example, two main trends in the UMO seminar evaluation data indicate that these participants are split on how they perceive the role of post-secondary institutions in career education. The roles identified are:

Role #1: To provide career education for duly enrolled undergraduates via self awareness, career awareness, educational awareness and decision-making activities in the classroom or via the career placement office.

Role #2: To train prospective school teachers to implement career education in the public or private secondary schools.

Further analysis of the Husson and UMO post-seminar comments and the career education units provides additional data as to how this group of university professionals "defines" career education.

The post-seminar structured evaluation interview was conducted during the period April 15, 1977 to May 15, 1977. It was decided to revise our independent evaluation plans in January 1977 to add another dimension to the total evaluation process. It would provide the participants opportunity to assess their personal growth and utilization of the career education concepts. To increase the validity of this procedures trained experts from the Social Science Institute,

UMO were contracted to conduct the interviews and analyze the data. We are cognizant that no matter how well trained the interviewers, interviewer characteristics may systematically affect the responses obtained. Selection of SSI reduced the possibility of interviewer bias and introduced a neutral variable; the SSI staff was not involved in the career education project until this contract was signed. We feel that this procedure permitted us to examine with greater depth a complex and sensitive issue. Why did a majority of the 35 participants complete all tasks and only four fail to meet their unit obligation? It was felt that trained interviewers would be able to elicit data on this issue. Further comments on this data will be provided in Section 11, Evaluation. See Appendix T for the follow-up interview questionnaire.

Subobjective 2.4: Introduce career education literature, research models and state exemplary projects to teacher educators.

In order to accomplish this objective the following activities were conducted by project staff. For the university participants a special notebook was prepared that provided the following reading materials (See Table 9).

Table 9

## University Career Education Materials

Topic	Number of Articles
1. Foundations and Overview of Career Education	12
2. Self Development Techniques and Resources for Teacher Education Majors	4
3. Curriculum Development: Infusing Career Education	5
4. Models for Higher Education	7
5. Career Planning: Skill Development	6

For each of the above topics, selected materials were provided after reviewing the existing literature and personal contact with directors of 1975-76 post-secondary projects in 1975-76. (See Appendix U). For example, the materials developed by Alex Perrodin, Career Education Staff Development for Teacher Educators, at the University of Georgia were an invaluable resource. A copy of the UMO seminar notebook was provided to Prentice Echols, Project Officer, in December 1976.

To introduce the Comprehensive Career Education Project, Level I Bangor Public School segment, a discussion and overview was provided to the Husson College faculty/staff. The Bangor Career Education team presented an overview of teacher activities and the development of career education within their system.

In addition to these activities, selected consultants to the seminar series provided conceptual models of career education in various

regions of the United States (See Table 10).

The extremely tight workshop format restricted discussion. Our operational model for the seminars was:

Two Hour Block

1st hour - Overview of Topic

2nd hour - Application and Discussion

Each consultant was given from one to four specific objectives for their assigned topic and asked to address the group in a style comfortable to them. The time parameters did not leave ample time for discussion or digression.

Subobjective 2.5: To arrange visits to observe demonstrations of career education methods in the Bangor Public Schools.

This objective was accomplished during February, March and April, 1977 by having each UMO participant arrange his/her observation session through the career education office in the Bangor Public Schools. University professionals have extremely tight schedules and we let each participant arrange an observation at his/her convenience. Husson faculty/staff were provided a demonstration on November 18, 1976. A panel of Bangor teachers representative of grades K-12 from the 1975-76 project discussed infusion techniques for selected grades. The panel consisted of three teachers (Grade 3, Grade 9 and Grade 10). Sample teaching strategies were presented and materials to support the unit demonstrated.

Table 10

Consultants and Illustrative Examples of Their  
Content Presentations

Consultant	Career Education Concepts
Dr. Charles W. Ryan University of Maine	<ul style="list-style-type: none"> <li>- Introduction to general career education concepts</li> <li>- Eight elements of career education</li> <li>- Overview of reasons behind career education</li> </ul>
Dr. Robert Ristau Eastern Michigan University	<ul style="list-style-type: none"> <li>- Infusion strategies</li> <li>- Self awareness techniques</li> <li>- Career awareness techniques</li> <li>- Research ideas</li> <li>- Course Development Model</li> <li>- College of business role</li> <li>- Life skills competencies</li> <li>- Career education definitions exercises</li> </ul>
Dr. Barbara Fulton University of Missouri	<ul style="list-style-type: none"> <li>- Focus on K-6; elementary level career education</li> <li>- Implementation of career education with basic academics</li> <li>- Practical labs and demonstrations</li> <li>- Self awareness emphasis</li> <li>- Importance of interviewing</li> <li>- Definitions of career related terms</li> </ul>
Dr. Bruce McQuigg Indiana University	<ul style="list-style-type: none"> <li>- Rewards for curriculum development vs. publication and research</li> <li>- Students as least critical supporters of career education</li> <li>- Reality of student/peer evaluations</li> <li>- Infusion ideas</li> <li>- Valuable use of leisure time</li> <li>- Focus on problems hindering career education</li> <li>- Career ladders</li> </ul>
Dr. Donald Cassella University of Alabama and Birmingham Southern College	<ul style="list-style-type: none"> <li>- Implementation of career education within basic academics</li> <li>- Practical labs and demonstrations</li> <li>- Self awareness emphasis</li> <li>- Importance of career placement definitions of career related terms</li> </ul>

Dr. Joseph Quaranta  
Ohio State University

- Theoretical foundations for career development
- Students as least critical supporters of career education
- Reality of student/peer evaluation
- Infusion ideas
- Focus on problems hindering career education
- Ohio state model for teachers

#### 1976-77 Career Education Seminar Series for University Educators.

The UMO faculty/staff reaction was most positive to their visit to public school sites. For many, it was an excellent chance to put theory in practice. As the associate dean of the College of Life, Science, and Agriculture stated, "it was most gratifying to see a junior high teacher implement the career education concept." A faculty member commented, "I had forgotten the tremendous problems of motivation and discipline that really exists in public schools." The following list indicates the self placement that each UMO faculty/staff member arranged:

<u>Name</u>	<u>Career Education Visitation</u>
Paulette Beatty	- Gerry Ballanger, Counselor, Bangor High School
Joanne Burgess	- Cathy D'Errico, Grade 1, Mary Snow School
Anne Campbell	- Cathy D'Errico, Grade 1, Mary Snow School
Dorothy Dalton	- Delores Wood, Home Economics, Bangor High School
Donna Evans	- Theolyn Staples, Grade 3, Mary Snow School
Stan Freeman	- Betty Cary, Grade 6, Mary Snow School
Jim Hart	- Pat Sirois, Social Studies and Career Education Resource Room Teacher, Bangor High School
Dennis King	- Winnifred Crocker, Counselor, Bangor High School
Walt McIntire	- Philip Gonyar, Assistant Superintendent for Instruction, Bangor Public Schools

David Nichols

Winston Pullen

Dorin Schumacher

Frank Vitro

Lee Worcester

Jon Young

- Anne Corson, Counselor, Union Street Junior High School
- Anne Corson, Counselor, Union Street Junior High School
- Virginia Booth (English) and Anne Brann (Math) and Career Education Resource Room Teachers, Bangor High School
- Elinor Canders, Grade 5, Dow Lane School
- Josephine McAlary, Math and Career Education Resource Room Teacher, Bangor High School
- Patricia Sirois, Social Studies and Career Education Resource Room Teacher, Bangor High School

In our opinion, the intent of subobjective 2.5 was met with enthusiastic support by the participants in this seminar series

## Section 11

## EVALUATION

Evaluation plans for this segment of the project were devised to account for the differences in seminar procedure for Husson and UMO participants. After meeting with the Center for Vocational Education (CVE) staff on October 4, 1976 the following research design and procedures was agreed upon:

1. Level II would utilize a posttest-only control group design. The control group would be selected from volunteers at Husson and UMO.
2. The Career Knowledge Test (1975-76) would be revised to include items representative of the content and instructional objective of the seminars.
3. A Self-Report Evaluation form would be developed by project staff to secure participant reaction to the seminar series.

In addition to the above procedures the project staff decided to add several additional evaluative steps.

4. Post-seminar semi-structured interviews would be held with all participants to assess their personal growth and utilization of the career education concepts.
5. Revise and update the Career Knowledge Test developed in 1975-76 project year and expand the pool of items.
6. Critical appraisal of all career education units will be conducted. Opinions from faculty and project staff will be utilized in reviewing and revising all units.

This section has been subdivided into five sub-sections: Husson College, UMO, follow-up interview for University Based Career Education Seminar Series, career education unit development and incremental improvements. The Husson College and UMO subsections are concerned with the gain in participant knowledge and the initial seminar

evaluation. The post-seminar interview subsection looks in-depth at the seminar series by analyzing nine separate areas. The fifth subsection, incremental improvements, documents the changes that were made between 1975-76 and 1976-77.

#### Husson College

Following completion of the Husson seminar series a posttest-only control group design was utilized for evaluation purposes. The seminar participants (N=17), two members have never completed the test, made up the experimental group. The control group (N=14) was selected from other faculty on the Husson College staff who volunteered. It was not possible to randomly select the subjects for the experimental or control group because the total number of faculty to draw from is limited, there are only 43. To use simple random sampling was not feasible as the population drawn from was a distinct subpopulation, i.e. college professors. It was necessary to use subjective sampling due to our limited subject pool and the homogeneity of the population being studied. The members of the control group were equivalent to the members of the experimental group in terms of age, sex, education and faculty rank. A 56 item Career Education Knowledge Test was given to both groups.

The Career Education Knowledge Test was an instrument designed by the project staff specifically to measure the knowledge gained by seminar participants. It consisted of 29 multiple choice questions and 27 confidence weighted true-false questions. The instrument was

revised in November 1976 to reflect changes in the seminar topics and procedures during 1976-77. Certain items that had appropriate discrimination and difficulty were selected from the previous instrument. These items also represented instructional objectives covered by each seminar content. Content for test items was also derived from tape recordings of seminar presentations. Additional items were developed from the reading materials presented to the participants.

All test items were evaluated by three members of the project staff utilizing the following criteria:

1. Does the item reflect the content of the career education seminars or the required reading materials?
2. Is each item free of sex-stereotyping and ambiguity?
3. Does each distractor fit realistically within the content of the item?

Approximately five items were eliminated and ten were re-written on the basis of these criteria. A more formal item analysis was conducted following its initial use by the Husson faculty. The results of this analysis were utilized to revise the test for the UMO seminar series and will be reported under that section.

This test was given to both the experimental and control groups. A two tailed "t" test for independent groups was used to compare the means. The results showed that the experimental group scored significantly higher than the control group,  $t(29) = 3.38, P < .002$  (See Table 11).

Table 11

Comparison of the Means on the Career Education  
Knowledge Test of Husson College Faculty  
with a Control Group

GROUP	N	X	S.D.	"t"
Husson	17	35.56	7.95	3.38***
Control	14	24.14	10.22	

\*\*\*p < .002

These evaluation results demonstrate that for those faculty members who participated in the career education seminars, it resulted in a significant increase in their knowledge.

A second measure for evaluating the career education seminar series consisted of a self-report instrument that was filled out by each participant. It was designed to measure the reaction of the participants to all facets of the seminar series.

The instruments, itself, entitled University Based Seminar Series: Evaluation Form, was developed by the project staff in November 1976 (See Appendix V). It consisted of three parts. Part I was a series of statements about the seminars and participants were asked to rate each of these on a five point Likert scale as to whether they strongly agreed or strongly disagreed. Part II was a semantic differential that was designed to measure the participant's feelings about the seminar. Part III was a series of open-ended questions that dealt with strengths, weaknesses and recommendations.

The Evaluation Form was adapted by the project staff from a questionnaire developed by Even (1976) to fit the particular needs of this seminar series. The instrument was completed by all Husson participants during December 1976, immediately following the completion of the seminar series.

In general, the results showed that 13 of the 19 were favorable toward the series, four were somewhat undecided and two felt that the series was not worthwhile. The major comments on the seminar are presented in Tables 12 and 13.

These evaluation results demonstrated that the series, overall, was well received. The participants seemed to be most pleased with the program organization and consultant format, most displeased with the lack of discussion time, and recommended that in future seminars that there be more examples of post-secondary teaching units and more discussion time.

#### University of Maine (UMO)

The evaluation design for the UMO seminar series was similar to that utilized at Husson College. At the conclusion of UMO seminars, February 18, 1977, all participants completed the Career Knowledge Test, Form 3 and the University Based Seminar Series Evaluation Form.

A posttest-only control group design was utilized with the Career Education Knowledge Test. The seminar participants (N=16) made up the experimental group and the control group (N=12) was selected from the faculties at the College of Education and the School of Human Development

Table 12

## Seminar Evaluation Responses

## Husson College Series

Evaluation Item	Responses		
	Agree	Neutral	Disagree
1. The objective of this seminar series was clear to me	89%	0%	11%
2. Specific goals and planning made it easy to work efficiently	47%	32%	21%
3. I did learn something new	68%	11%	21%
4. The material presented was valuable to me	68%	0%	32%
5. I was stimulated to think about the topics presented	68%	11%	21%
6. We worked well together as a group	68%	21%	11%
7. I had an opportunity to express my ideas	95%	0%	5%
8. Seminar series met my expectations	47%	21%	32%
9. My time was well spent	63%	16%	21%
10. The content presented was applicable to the implementation of Career Education at the post-secondary level	58%	21%	21%

N=14 Husson faculty/staff

Table 13  
Husson College Faculty and Staff  
Open-Ended Seminar Evaluation Responses

Major Strengths	Response	Major Weaknesses	Response	Suggested Addition	Response
Consultants	9	Lack of Discussion Time	7	More Examples of Post-Secondary Teaching Units	6
Planned Program/Overview	5	Lack of Structured Outcomes	3	More Discussion Time	5
Materials/Interesting	3	Not Enough Examples for Higher Ed.	3	More Bus. Ed. Consultants	3
Use of Bangor C.Ed. Demonstrating Team	1	(Session 4) Consultant	3	Exercises for Faculty	3
Faculty/Admin. Interaction	1	Lack of Planned Pre-Class Exercises	2	More Extended Series	2
None	1	Group/Narrow Representation	1	Change Grouping	1
		Too Much Focus on Instructional Tech.	1	More Local Examples	1
		Seminar Focused on K-12	1	Discussion of Faculty Projects	1
		Liberal Arts Not Included	1	Student Presentations	1

\*Responses will not total 19 due to multiple comments by each participant.

at the University of Maine at Orono. All members of both faculties were asked to voluntarily complete this test as part of the control group and 12 complied. The experimental and control group were relatively equivalent in terms of age, sex, education and academic rank.

The Career Education Knowledge Test, Form 3 was a revised version of the test that was utilized with the Husson faculty members. Following its initial use with the Husson series, this instrument underwent an item analysis where discrimination and item difficulty indices were computed. As a result, a number of items were discarded or revised. In addition, four new multiple choice questions were added as were seven new confidence weighted true-false questions. This made a total of 33 items for each of the two types of questions contained in the test. The additional items were constructed to reflect actual seminar content or topics covered in the assigned reading material. These items were evaluated by the project staff utilizing the same criteria that were used in the previous revision.

Both UMO groups took the third revision of the Career Education Knowledge Test. A two tailed "t" test for independent groups was used to compare means. The results showed that the experimental group scored significantly higher than the control group,  $t(26) = 3.67$ ,  $P < .001$  (See Table 14).

Table 14

Comparison of Means on the Career Education Knowledge  
Test of University of Maine, Orono Faculty  
with a Control Group

GROUP	N	$\bar{X}$	S.D.	t
UMO	16	44.88	4.91	3.67***
Control	12	35.17	8.98	
***p .001				

A fourth revision of this test was completed immediately following the UMO seminar series. The test completed by both the experimental and control groups were analyzed and discrimination and difficulty indices were computed.

After a thorough review, three multiple choice questions and three confidence weighted true-false questions were eliminated. In addition, 19 other questions were modified. The revised version of this test, with 60 items and a scoring key is contained in Appendix W.

These evaluation results demonstrate that for those faculty members who participated in the career education seminars, it resulted in a significant increase in their knowledge. This seminar may have similar impact on other faculty groups. Furthermore, it is our hypothesis that this seminar series may have had an impact on students (graduate and undergraduate) as well as other faculty members. This latter point will receive further analysis in the post-interview subsection.

The University Based Seminar Series: Evaluation Form (1st revision) was utilized to measure the reactions of the participants to all facets

the seminar series. This form underwent considerable revision from the initial version that was used with the Husson College series after being critiqued by the CVE third party evaluator. The initial instrument was too narrow in focus and contained redundant questions. A sample questionnaire was obtained from this evaluator and was utilized in making these revisions. Part I remained the same, but in Part II the type of question was changed to include subjective responses and the number of questions was doubled. All participants completed this evaluation form on February 18, 1977. A copy of this instrument is contained in Appendix X.

In general, the results showed that all of the participants were favorable toward the seminar series. More specific categories are presented in Table 15.

Seminar Evaluation Responses  
University of Maine Series

Categories	Strengths	Weaknesses	Recommendations
Choice of Seminar Topics	<p>Background material in the first session (2) *</p> <p>Comprehensive overview of career education (3)</p>		<p>One session for career life planning of participants (2)</p> <p>More specific techniques, strategies and suggestions (2)</p> <p>More practical exercises (2)</p>
Choice of Presentors	<p>Quaranta most effective (4)</p> <p>Quaranta, Casella and Cafferella were the most relevant (2)</p> <p>Speakers offered new ideas and techniques (2)</p>		<p>Use more theoreticians (e.g. Quaranta) and doers - fewer promoters (2)</p>
Seminar Schedule			<p>Three hour session with one hour for discussion (9)</p>
Seminar Staff	<p>Very helpful, pleasant, and business-like (6)</p>		

\* Numbers in parentheses represent the number of respondents making that response.

Categories	Strengths	Weaknesses	Recommendations
Overall Effectiveness of Presentations	Well planned and effective (3)	Redundancy in speaker's presentation (2)	
Overall Usefulness of Information Presented	Very helpful and useful (2)		
Opportunities for Informal Interaction and Exchange			Insufficient - need small group experience (5)  More interaction time is needed (8)
Seminar as a Whole	Excellent organization, relevance and content (7)  Excellent, opened up a new way of looking at what I am doing (4)	Not enough emphasis on the seminar being a working group (2)	
Usefulness of the Notebook	Notebook was very helpful (5)		Presentations might have dealt more specifically with its content (2)
Site Visit	Good practical and rewarding contact (4)		
Seminar Requirements	Opportunity to prepare a career education unit (4)		

## Follow-up Interview for University Based Career Education Seminar Series

### Introduction

Prior to the completion of the seminar series it was decided that the evaluation procedures utilized did not answer many of the questions that the staff had about the series and its impact. Consequently, a decision was made to find a more thorough way of evaluating the series. It was decided that an in-depth personal interview with each of the participants would provide us with the best opportunity to secure information regarding project impact.

As a result of these decisions, the Social Science Research Center at the University of Maine (see Appendix Y) was contacted to conduct personal interviews with each participant. Procedures were made and an interview/questionnaire prepared. In its final form, the questionnaire has nine separate sections (see Appendix T):

- a) Demographic and background information
- b) Seminar series
- c) Consultants
- d) Materials
- e) Format
- f) Field visit/demonstration
- g) Participant motivation
- h) Unit development
- i) Infusion of career education

It was felt that by examining these areas in-depth that we could establish quite clearly the major strengths and weaknesses of the

series as well as elicit positive directions for future series.

The interviews themselves took place in April and May 1977. This was four months after the conclusion of the Husson series and two months after the UMO series ended. The time span allowed us to determine what had transpired over time regarding the implementation of the concepts that had been presented. Also, the infusion of career education via the units that were developed could be ascertained from the participants.

The interviews themselves were done by two professional interviewers and ranged from 20 to 60 minutes, with the average interview taking 35 minutes. The interview format contained both objective and open-ended questions. These items have all been analyzed and will be presented by the following procedure. Each of the nine sections will be reported separately, with the exception of Section A - Demographic and Background Data, the other eight sections will be separated into two result summaries and reported for both Husson and UMO. Each section will be followed by comments from the project staff.

#### A. Demographic and Background Data

The following table contains all of the demographic and background data on the Husson College and UMO seminar participants.

Table 16

Demographic and Background Data on  
University-Based Career Education Seminar Series  
Participants

CATEGORY	HUSSON	UMO
Sex		
Male	5	10
Female	13	6
	<u>18</u>	<u>16</u>
Age		
20-29	1	1
30-39	7	9
40-49	6	2
50-59	2	3
over 60	2	1
	<u>18</u>	<u>16</u>
Terminal Degree		
B.A. - B.S.	6	1
M.A. - M.S.	9	1
Ph.D. - Ed.D.	3	14
	<u>18</u>	<u>16</u>
Academic Rank		
Instructor	6	4
Assistant	2	4
Associate	4	5
Professor	2	2
Administrator	4	1
	<u>18</u>	<u>16</u>
Average Years Teaching Experience	13.1	14.0
Percent of Time Spent in Teaching	67%	73%
Percent of Time Spent in Administration	33%	27%
Percent of Participants with Previous Experience in Career Education	63%	61%

At Husson, many faculty have had assignments in teaching and administration.

## B. Seminar Series

Husson College. In responding to this section of the follow-up interview questionnaire, the Husson faculty rated those sessions dealing with "Implementation of Career Education into Teacher Education" and demonstrations (Bangor School Staff) as most important; the topic that dealt with "Self-Development Techniques and Resources for Teacher Education Majors" was suggested as one that could be deleted in future seminars. One-half of the respondents rated the seminar series as well suited to post-secondary educators. The respondents were asked how it could be improved and suggested the following changes:

1. Focus on higher education models.
2. Provide more structured learning experiences.
3. Survey the faculty prior to the seminar to determine specific needs.

In addition, the information presented in the series was well received by the participants. A total of 61% felt the information was essential and helped them understand the career education concept.

Over 77% of the Husson College faculty would recommend the series to others and 83% felt the series should be continued. In general, the respondents felt the series was well balanced, sequenced correctly, and used good resource consultants. Also, several felt that faculty in higher education should understand and be prepared to infuse career education into their programs. Using a five point scale: 1 = poor, 2 = fair, 3 = average, 4 = good and 5 = excellent, a total of 84%

rated the seminar series fair to excellent (50% good to excellent).

Their attitude toward the career education concept was more positive than negative. In our opinion, future seminars should include business and labor representatives according to 77% of our participants and students should be invited to all sessions as interactors.

UMO: The seminar participants felt that those presentations that were based on a well developed conceptual model were the most useful to them. On the other hand those presentations that were just a series of techniques or filled with career education propaganda were least useful. Participants were almost unanimous (92%) in their feeling that the seminar series was well suited for them and met their needs. Again, the majority (83%) felt that the series gave them essential information and that this information would be essential in helping them to start infusing career education into their courses. Specific areas that were commended were:

- A) Initial introduction
- B) Handout materials
- C) Practicality of application
- D) Overview of career education
- E) Career planning skills
- F) Total plan for career education
- G) Programs from other campuses
- H) Conceptual model
- I) Course materials from other universities

J) Foundations of career education

K) Overview of career education

Most participants (74%) found the series to be helpful and felt that it provided them with an awareness of significant issues not heretofore known to them. Their new awareness was of issues, such as the broad application of career education, the importance of career education in K-12 programs, and the basic reasons for career education.

The participants were unanimous in their agreement to recommend this program to others and in their feeling that it should be continued in the future. The majority of participants (63%) felt that the sessions were well integrated and that they had a positive change in attitude toward career education. All participants rated the seminar as either excellent or good. Lastly, most participants (87%) felt that business and industry leaders should participate in the seminar and that students should be invited as interactors.

Staff Comments... Our confidence in the reliability of these opinions regarding the seminar series is strengthened by the high percentage of participants in the interviews. Only one of the 35 participants was not interviewed. Also, the respondents for both Husson and UMO rated the seminar series as good to excellent and would recommend its continuation. It is fair to state that the overall Husson ratings for the seminar series were lower than those received from UMO staff. In our opinion, there are several key reasons for this:

1. Several Husson faculty enrolled in the seminar series because their "superior" requested them do so.
2. Several Husson faculty resented the task of preparing an instructional unit in order to receive their stipend.
3. Husson College is primarily a business school and two-thirds of the staff felt that they have been in career education for years. Open-ended responses to the interview implied this in a variety of their comments.

The overall positive comments of the participants concerning the seminar meeting their needs and being useful leads us to conclude that the structure and content of the series is sound. We also believe that this is a viable means of introducing university faculty to the concept of career education and the infusion process. On the other hand, there are several changes that could be made in the future to strengthen the seminars. These include but are not limited to:

- (1) introduce business leaders and students as participants in the seminar series;
- (2) develop and use structured group exercises;
- (3) include more laboratory time for curriculum material development; and
- (4) increase the amount of discussion time for each seminar session for more effective use of the consultant. We believe these changes will broaden the scope of the seminars and make it more meaningful for the participants.

### C. Consultants

Husson College. The interview questions for eliciting participant reaction to the seminar consultants were items C 1 to C 6. Using the consultants for longer periods of time (72%), increasing the discussion time (78%) and providing information on local problems (66%) were

important variables to the Husson staff. It is interesting to note that the group was split on item C 5 which asked whether consultants or local people should be used more extensively.

UMO. The majority of participants (63%) liked the consultant format. They felt that this provided many valuable insights and varied perspectives. Participants (69%) were also strongly in favor of having consultants here for a longer period of time and that this increase in time should include more interaction and discussion.

Staff Comments. The comments of both the Husson and UMO faculty were consistent in this section except for the question on whether there should be more use of consultant or local people. Overall the consultants seem to be a great asset to the seminar series and were invaluable to its effectiveness.

#### D. Materials

Husson College. The interview questions were formatted to elicit faculty/staff opinion regarding the quality, relevance and impact of the specially prepared notebook materials. Over two-thirds of our participants (86%) read the materials and 45% felt they would significantly improve their instruction. Also, 57% felt that the materials were well coordinated to the seminar content and the consultant handouts (55%) were important in supporting the goals of this in-service training program.

UMO. Most participants (88%) read over 80% of the material. Six read all of the material whereas two did not read any of the material. A majority of the participants (75%) felt that those materials would significantly improve their instruction and that they would utilize at least part of the materials in future classes. There was an even split among participants as to whether the materials were well coordinated with the seminar content and whether they constituted an important part of the seminar. On the other hand, two-thirds of the participants have utilized the notebook materials since the end of the seminar series. All participants agreed that the handouts used by the consultants were effective and would be helpful for future reference.

Staff Comments. If the seminar series is continued in 1977-78, the data for this section suggests several major changes.

- (1) Greater care needs to be taken in selecting notebook materials so that they are more closely coordinated with seminar content.
- (2) Additional samples of career education units for higher education should be provided.
- (3) Consultants should be encouraged to utilize more handout material and to make that material available to participants prior to the seminar session.

#### E. Seminar Format

Husson College. Some indication of future changes in the training model is implied in the participant comments. For example, 72% felt that the number of sessions was "about right," but that length of each session must be increased to permit greater discussion, role

playing, practical exercises and review of instructional units. Also, 66% recommended follow-up sessions to assess the impact on participants.

UMO. A vast majority of the participants (81%) felt that the number of sessions was about right. On the other hand, a similiar majority felt that the individual sessions, which were two hours in length, were too short. The consensus of opinion was that they should be at least an hour longer and that this extra time be utilized for discussion with consultants and among the participants themselves, for role playing, and other practical exercises. Participants were unanimous in their desire to have an opportunity to discuss the development of their career education units and they felt that a follow-up or expanded series would be useful to them in the future.

Staff Comments. Future seminars of this format and type for uniwersity/college faculty will need to (1) increase the in-class time, (2) utilize some portion of this time for discussion and practical exercises and (3) include planned follow-up sessions. In our opinions, the sessions should be no longer than four hours and must include skill building exercises in curriculum unit construction.

#### F. Field Visit/Demonstration

Husson College. Less than 50% of the participants found the demonstration of secondary career education practices appropriate to their needs as post-secondary educators. However, 77% of the participants indicated that they found these demonstrations a worthwhile

element of the seminar series.

UMO. The majority of the participants (63%) felt that the field visit was a worthwhile element of the seminar series, but they were evenly split on the question of whether it was appropriate to their needs as a post-secondary educator.

Staff Comments. The Husson faculty were consistent, they wanted more practical demonstrations of how to infuse career education in higher education. Future seminars must provide infusion demonstrations for curriculum development and career planning offices.

It appeared that the UMO participants either liked or disliked their visit. There was no neutral response. The explanation for this does not seem to lie with the administrative arrangement as they were unanimous in agreeing that it went smoothly. It seems to us that some university professors either do not feel comfortable in the public schools or they feel that they do not need to have this type of input into their courses.

#### G. Participant Motivation

Husson College. The selection and recruitment of participants for the seminar series was essentially based on letters to potential members and personal contact by Professor Delores Renaud with all Husson faculty. A listing of verbatim comments reflects the major reasons for faculty involvement:

I have an interest in career and community education

Needed so many people, they needed bodies or it wouldn't be offered

Since I am a department head, I felt I should set a good example - I am co-chairman of the academic committee and I thought it would encourage other faculty members outside my department to go - I thought I would learn something

Because of the title of the series involving "Career"

I had heard a lot about career education and I thought it was about time that I get a good overview of it

Boss asked us to

I was curious

I was asked

I felt it would improve my quality of instruction

Because of interest in career education and it relates directly to daily work

Primarily because being in business education I feel career education is an important part of business education

I wanted to become more knowledgeable about career education as it applies to undergrads entering careers other than teaching

Wanted to start thinking more about career awareness

Asked to participate - \$100 and 18 were needed to attend

Interest

"I was told to be there" probably would have gone anyway because I was interested

I thought I would learn more about infusion of career education in the liberal arts area

To learn something new

However, a total of 55% of the participants felt the pre-seminar information did not accurately describe the series. Their comments

were as follows regarding inaccuracy:

In terms of requiring a final project which should be field tested in your class

The only thing that was accurate was the amount of \$ (money).

What was involved in terms of specifics - time and effort

The series did not apply to careers from point of college people

It was fuzzy in terms of the expected outcomes - e.g. behavioral objectives

It was kind of a "word of mouth" type thing, there was more paperwork and time involved than what we had been informed.

Were not told we had to write unit

Weren't told about units, didn't know it would drag so long

Did not know about unit preparation - things got quite involved, didn't know stipend depended upon submittal of project

Were not aware of paper which had to be done, and unit

The factors which were important in helping each participant make a decision to participate were varied. Participants were asked to select the factors which were most and least important to their participation. When we analyzed their responses the following factors were most important: (1) interest 77%; (2) professional growth 46%. The least important factors were: (1) stipend 50%; (2) unit publication 55% and (3) administrative pressure 82%. A total of 94% of the Husson faculty/staff said they would have participated without a stipend.

UMO. The following is a list of answers to the question "why did you decide to become involved in the seminar series?":

I needed more information on career development

Because I thought it would be a chance for more personal and professional growth - I personally think this is what the faculty needs more of

To gain more awareness and knowledge about what career education is

I work with merchandising students - want to get ideas on what other people did in the area of career education

Interest - professional concern

Had been involved in career education before; wanted to upgrade professionalism

I knew very little about career education

Had limited exposure to career education with Dr. Ryan, was interested in topic; University professors should become interested in career interests of students

Continuing interest in career education - opportunity to interact with other faculty members on campus - the stipend (very important)

An opportunity to learn what the ingredients of what career education was and I learned - I ran into a lot of old friends from the experience - I feel career education is a good thing

Because of the topics and my need to find some way to get reoriented to my faculty role

Increase of skills

Topics looked interesting; stipend; eager to do something creative with college of education

The participants were almost unanimous in their agreement, 15 out of 16, that the pre-seminar information accurately described the series.

The following motivational factors in Table 17 were rated on a five point Likert Scale.

Table 17  
Ratings of Motivational Factors By UMO Faculty

Item	Rating Scale	Very Important		Unimportant		
		1	2	3	4	5
Interest in the Topic		64%	36%	0%	0%	0%
Professional Growth		64%	18%	18%	0%	0%
Stipend		32%	6%	25%	18%	18%
Publication of Participant's Career Ed. Units		6%	32%	18%	18%	25%
Administrative Pressure		0%	0%	0%	0%	100%
Need for Information		50%	12%	32%	6%	0%

N=16 Respondents. Percentages may not equal 100 due to rounding of numbers.

Almost all participants (87%) felt that the stipend amount was about right and that the same percentage would have participated in the seminar series if there had been no stipend provided.

Staff Comments. The disparity in opinion between the two groups is best explained by the differences in institutional philosophy and practices that exist between Husson College and UMO. The fifteen hour teaching load at Husson College with no release time for research and development activity does not generally lead to

enthusiastic support for more work. Both groups received the same recruitment literature which did spell out attendance requirements, unit development procedures and stipend conditions. Perhaps the Husson group did not perceive the seriousness of our intentions to produce quality materials and withhold stipends from those who did not meet their obligations. A total of four Husson faculty did not complete their units, one was ill and one attended for interest purposes only. On the other hand, UMO faculty must involve themselves in research and development activities as a condition of employment. In some cases, they receive release time to pursue creative endeavors of a scholarly nature.

The motivation to attend this seminar appears to be very complex. All of the factors cited appeared to have an effect on the motivation of the participants. Responses regarding the stipend was of particular interest to the staff as we had anticipated that this would be one of the prime motivating factors. From the data it does not appear to be a prime motivating factor but it still appears to be a key element. We also feel that without the stipend some participants may have been reluctant to attend all of the sessions or to finish the career education unit.

#### H. Unit Development

Husson College. The preparation of career education instructional materials was not perceived as a difficult task by 55% of the participants and was rated as a useful exercise by 61%. More

significantly, 93% of the respondents felt that four seminar sessions did not prepare them to write the unit. The review comments for each unit were rated as "constructive" by 61% of the group.

UNO. The majority of participants (75%) found that it was not difficult to prepare a career education unit and that they found this writing exercise to be very useful. They were split as to how well the sessions prepared them to write the unit. The vast majority (88%) felt that the staff comments on their units were constructive.

Staff Comments. The comments seem to indicate that one-third of the participants would like structured sessions that prepare one to write instructional materials. Very little time was devoted to unit preparation as it was expected the college level faculty would know how to prepare instructional materials. Our expectation was generally correct, but the Husson participants as a group generally had a more difficult time in preparing the unit.

#### I. Infusion of Career Education

Husson College. Nine of the 11 participants who completed their career education unit have utilized it in at least one of their courses. The other four intend to utilize their unit in the fall. Of those who have used their unit, seven found that it was very successful and that there were very few problems. As of this time none of the participants have written additional units but eight indicated that they plan to in the future. All but one of the

participants has discussed the seminar with colleagues and felt that they would be using the knowledge and skills learned in the seminar on an occasional to frequent basis. Sixteen of the 18 participants felt that career education should be expanded in higher education.

UMO. A total of seven participants have already utilized their career education unit in their courses. The remaining 11 participants anticipated using their unit in the Fall 1977 semester.

The seven who have utilized their units in Spring 1977, felt that it was successful and that few problems were encountered. All of the participants have discussed this seminar with their colleagues and most feel that they will use what they have learned occasionally to frequently. Lastly, 15 out of 16 participants are of the opinion career education should have an expanded role in higher education.

Staff Comments. The career education unit seems to have been a key element in the series. It forced the participants into an active position where they had to get involved. As many of them found out, the writing and introduction of their unit into one of their courses was far less painful than they imagined. Once they had tried it out, they all met with success and this has reinforced their favorable attitude toward the infusion of career education. The principle of involvement seems to be a very important element and must receive continued emphasis.

### Career Education Unit Review

Instructional units were developed by faculty/staff from both Husson and UMO. Instructions for format and general content were provided in each general introductory seminar. A follow-up discussion was conducted in the third Husson session and the fifth UMO session. Each unit was reviewed by project staff for:

- a. Adherence to APA Publication Manual of style.
- b. Technical considerations - format, composition, visual material quality.
- c. Scope - infused career education concept, internal consistency, ease of integration into existing curriculum.
- d. Validity of material - motivation for intended audience, adequate reading level, and content appropriate for intended audience.
- e. Unit methodology - ease of use, includes suggested material, instructional time constraints, includes evaluation procedures and use with individuals or groups.
- f. Authenticity - material is realistic, material was field-tested, material uses current information or concepts.
- g. Viewpoint - material avoids stereotypes deals with interpersonal relations, present a range of values and is non-biased toward women or minorities.
- h. Special consideration - appropriate for college/university courses, reasonable cost and potential for high student impact.

After initial review, each unit was returned to the author for second revision. Subsequently, the project staff reviewed them a third time and made corrections. A final step was to secure services of a professional proofreader from the University of Maine Press to review the proposed publication. The units were published in Career Education in Higher Education: A Model for Infusion (1977).

## Summary of Incremental Improvements 1976-77

As a result of previous experiences in the 1975-76 Comprehensive Career Education Project a variety of changes were made that led to incremental improvement in Level II activities. For example:

1. Administrative/Organization - the format of each seminar was changed from six hour blocks to two hour sessions. For busy professionals this was received with a high degree of enthusiasm but in practice this proved to be too short and resulted in a lack of discussion time. A three hour block seems to be an optimum time period.
2. Seminar Content - a special notebook was prepared that contained material more appropriate to university based faculty/staff. Material used in our first project year was too public school oriented and was not as relevant to the intended audience. Seminar consultants were selected who had actually conducted post-secondary projects in career education and who were more attuned to the problems existing in institutions of higher education.
3. Attendance - in the first project year our attendance was sporadic and averaged about 65% at any one seminar session. In 1976-77 we had an attendance rate of 95% for seminar sessions. In our opinion, improved content and format were instrumental in this gain.
4. Career Education Units - in the first year no career education instructional units were generated by the post-secondary participants. A total of 25 units were prepared by the participants in 1976-77.
5. Follow-up Activities - a concerted effort was made to determine degree of implementation by each participant in teacher education courses and over 400 students were impacted directly.
6. Level II Participant Reactions - descriptive data reflect both positive and specific reactions to the seminar series. In 1975-76 our reactions were of a general nature and did not provide enough directions for specific changes. These remarks provide a degree of specificity that is both rewarding and capable of translation into action. A short self-report instrument was developed as was a lengthy in-depth personal interview form.
7. Career Knowledge Test - as a result of 1975-76 experiences, it was possible to develop an assessment instrument that more accurately assessed the seminar content. Test items were developed from each seminar presentation made to the UMO and Husson faculty and staff.

8. Career Education in Higher Education - this publication was developed as a product of the seminar series. It contains 25 career education units to be utilized by post-secondary educators in assisting students in their own career development and to train future teachers in career education.
9. If funded in 1977-78 the College of Engineering Science has agreed to participate as a result of feedback from colleagues.

In summary, we believe that improved attendance, attainment of participant enrollment goals, well planned seminar content and selection of consultants with a primary focus at the post-secondary level led to a more effective seminar series.

## Section 12

## ANTICIPATED CHANGES AND/OR PROBLEMS

In the opinion of project staff, Level II of the project is relatively trouble free. We have experienced excellent cooperation with administrative personnel on both campuses and the support of seminar participants. After carefully reviewing our progress to date, the following problems were identified and resolved. Each problem and suggested steps to resolve it are outlined as follows:

<u>Problem</u>	<u>Resolution Procedure</u>
1. Failure of one Husson faculty to complete Career Education Knowledge Test.	1. Follow-up consultation to ascertain reasons for failure to complete posttest.
2. Failure to complete observation of a career education class by x number of UMO faculty.	2. Consult with UMO faculty to determine problems impeding visit to local school career education classes.
3. Anticipated problem - Failure of Level II participants to deliver career education units by February 7, 1977.	3. Consultant assistance to faculty/staff who don't complete units and withholding of stipend.
4. Anticipated change - Reducing third party contract with CVE for third party evaluation from \$2,556 to \$2,000.	4. Utilizing this money (\$556) to secure the services of the Social Science Research Institute, UMO for the purpose of conducting independent interviews with all seminar participants.

Recommendations for 1977-78 Seminar Series

At this time, further changes in Level II objectives and activities are anticipated for 1977-78. If funded for the third year, it is

anticipated that a variety of changes will be made in the project objectives, activities and evaluation procedures. The proposal submitted in February 1977 fully documents these changes. For illustration they are summarized here:

### Objectives

The following new objectives have been developed for 1977-78.

1. To identify and select from the 1976-77 seminar participants 10 university/college faculty who will write 42 career education units.
2. To publish and disseminate a package of post-secondary career education materials for national distribution.
3. To involve selected representatives from the world of business, labor and industry in the career education seminar series.

The above objectives were developed to reflect the growth of this project in achieving the original objectives for 1975-76 and 1976-77.

### Activities

The three new objectives will require a variety of new activities be initiated in the third year. Several of the major anticipated activities are:

1. Establishment of a university/college writing team for preparation of career education instructional materials. The writing team will function from September 1977 to May 1978, and will be closely monitored by the career education project staff.
2. Developing a plan for packaging and distributing the career education concepts and practices developed in the three years of this project.
3. Establishing a system for involving the community advisory team in the career education seminar series and as reviewers of the instructional units.

### Evaluation

A revision in evaluation activities will be required to assess the impact of new objectives and activities. It is anticipated that the following evaluation activities will be conducted:

1. All career education materials will be reviewed for compliance with acceptable standards for preparing instructional materials. The critical appraisal technique and A Systematic Approach to Evaluating Career Education Materials at the Local Level will be used.
2. The posttest-only control group design will be utilized to assess the effectiveness of the seminars in the philosophy, concepts and practices of career education. The posttest-only control group design will be modified to control for the addition of a new faculty group.
3. The package of in-service training materials will be reviewed by independent consultants and a faculty review team.
4. Selected representatives from the world of business, labor and industry will participate in the seminar series and complete a structured interview to assess their opinion of the seminar series.

## Section 13

## DISSEMINATION ACTIVITIES

The dissemination activities are divided into two major categories, national and local.

National Activities

## A. Technical reports to Office of Career Education

- (1) Mid-Year Report
- (2) Special technical report for Category 1 Project Directors distributed January 4, 1977. Report also distributed at Eastern Region Project Directors meeting, Akron, Ohio, January 10-12, 1977, 30 copies.

## B. Requests for materials

- (1) From assorted states:

<u>Name</u>	<u>Material Supplied</u>
Ralph Kopansky Career Ed. Project New Mexico	1 Mini Report on 1975-76 1 Needs Assessment Set
Kim Powers Career Exploration Coord. Indiana	1 Mini Report on 1975-76
Fred Davis Fairmont Heights H.S. Washington, D.C.	1 Mini Report on 1975-76
J. B. Wier Career Ed. Project Director Carrollton, Alabama	1 Mini Report on 1975-76 1 Project Abstract
Z. T. Torres Career Ed. Project Director Hato Rey, Puerto Rico	1 Mini Report on 1975-76 1 Project Abstract

John Glur  
Career/Occupations  
Glendale, Arizona

1 Mini Report 1975-76

Patricia Kozlowski  
Career Education Resource  
Center  
Meriden, Conn.

1 Mini Report 1975-76

Lenwood Holliman  
Pickens County Board  
of Education  
Canoliton, Alabama

Career Assessment Survey

Fred D. Atiyeh  
Career Education Coord.  
Detroit Public Schools  
Detroit, Michigan 48202

1 Mini Report 1975-76

Estill Allen  
Department of Social Studies  
Pasadena High School  
Pasadena, Texas

1 Mini Report 1975-76

Judith Rosenberg  
Dade County Public Schools  
Miami, Florida

1 Mini Report 1975-76

Marie Sinclair  
Project Director  
Tuscaloosa City Schools  
Tuscaloosa, Alabama

Career Assessment Survey

Carmen Garcia  
Career Education Specialist  
Department of Public Instruction  
Bayamon, Puerto Rico

1 Mini Report 1975-76

Janella L. Kinby  
Career Ed. Coord.  
Oklahoma City, Oklahoma

1 Mini Report 1975-76

#### C. Visitors

(1) Three consultants, 1 from Indiana, 1 from Ohio, 1 from Alabama, 1 from Michigan and 1 from Missouri (See Appendix F and G).

(2) CVE Consultant-Evaluation Team, Kay Adams and Barbara Bednarz, October 1976.

#### D. Conference Presentations

- (1) Protestant School Board of Montreal, November 11-12, 1976; Montreal, Canada. "Trends and Practices for Implementing Career Guidance Programs, K-11."
- (2) American Vocational Association, Guidance Division, Houston, Texas, December 6, 1976. "Developing a Sequential Career Guidance Program."
- (3) New England Industrial Arts Teachers Association, 39th Annual Conference, October 14-16, 1976, Portland, Maine. "Career Education in Grades K-12."
- (4) Professional Development Days, School District 20, St. John, N.B., October 27, 1976. "Career Education in Grades K-12."
- (5) Northeastern University Career Education Conference, Boston, Massachusetts, August 4, 1976. "In-Service Training in Career Education - The Bangor Model."
- (6) Eastern Regional Project Directors Meeting, Akron, Ohio, January 10-12, 1976.
- (7) U.S. Office of Education, Bureau of Occupational and Adult Education Conference, Boston, Massachusetts, January 10, 11 & 12, 1977. "Vocational Preparation of Gifted and Talented Students."
- (8) Husson College, Bangor, Maine, January 13, 1977. "Career Education in the Distributive Education Program."
- (9) New Brunswick Teachers Association Conference, May 12-13, 1977, Sackville, N.B. "Career Education - The School Counselors Role."
- (10) Cashmere Career Education Project, May 1-5, 1975, Boston, Mass. "Career Guidance for Rural Youth: Needs and Strategies."
- (11) South Shore Collaborative for Career Education, May 27, 1977, Cohasset, Mass. "Career Education - The Delivery System and Making it Happen."
- (12) Maine Council on Economic Education, June 20, 1977, Orono, Maine. "Career Education: Promises and Prospects."

## State and Local Activities

### A. Local Activities

- (1) Announcements in UMO Weekly Calendar.
- (2) Special report in Bangor Daily News, December 15, 1976 with photograph.
- (3) WABI radio report on Comprehensive Career Education Project, December 13, 1976 (5 minutes).
- (4) College of Education bulletin board photographs of seminar participants.
- (5) Copies of project abstract to all College of Education and School of Human Development faculty.
- (6) Special technical report to Bangor School Board.
- (7) Monograph on Career Education in Higher Education: An Infusion Model, June 1977.
- (8) Consultant services to College of Life Sciences and Agriculture in preparing a career orientation seminar for entering first year students.
- (9) Consultant services to College of Education in preparing course materials for the education orientation seminar.
- (10) Special seminar for area school counselors on "Counselor Involvement in Career Education," Dr. Joseph Quaranta speaker, January 28, 1977.
- (11) Special seminar for area school counselors on "Career Development and Placement," Dr. Donald Casella speaker, February 11, 1977.

### B. State Activities

- (1) Presentation at Commissioner's Conference on Career Education, May 23, 1977. "Career Education in Higher Education" was the topic.
- (2) Service on Maine Career Education Advisory Council for development of state career education plan. Proposed plan adopted by State Board of Education, May 12, 1977.

- (3) Display of career education materials developed by project staff at Commissioner's Conference on Career Education, May 23, 1977.

A packet of representative products was prepared for display and distribution at the Project Directors meeting in Akron, Ohio, January 10, 1977. In addition, a filmstrip entitled "Career Education in Maine" was completed in February 1977 and it included representative project activities (funded separately from Part C, VEA, Bureau of Vocational Education, Augusta, Maine).

## Section 14

## SPECIAL ACTIVITIES

As a "spin off" of the Career Education Seminar Series the consultants were asked to deliver and "extra" seminar to graduate students and faculty in the afternoon. This was planned to occur after their formal presentations to Husson and UMO participants. To date three of the four consultants participated in this extra activity to a total audience of 59. No special attempts to evaluate this activity were planned.

## REFERENCES

Even, Brenda B. Integrating Career Education into Teacher Preparation. Washington, D.C.: U.S. Department of Health, Education and Welfare, Office of Education 1976.

McLean, J. E. and Loree, M. R. Comprehensive Career Education in a University: Evaluation. University, Alabama: Institute for Higher Education Research and Services 1976.

## APPENDICES

THIRD PARTY EVALUATION OF THE FINAL REPORT OF THE  
COMPREHENSIVE CAREER EDUCATION PROJECT

Kay A. Adams  
The Center for Vocational Education

1977

Overall Quality of the Final Report

The final report has been evaluated against three categories of criteria--technical adequacy, usefulness, and readability.

Technical Adequacy

1. The limitations of the evaluation procedures are explained fairly candidly.
2. The results are generally qualified and reported modestly in the context in which they were collected.
3. Confidentiality of personal information is maintained.
4. The conclusions and recommendations are legitimately drawn from the findings.

Usefulness

5. The evaluative information collected is useful for judging the effectiveness of the seminar and for improving future seminars.
6. The recommendations for improving future seminars are scattered throughout the report. It is recommended that all the recommendations mentioned in the staff comment sections be itemized and summarized in Section 12--Anticipated Changes and/or Problems.

### Readability

7. The report is generally readable.
8. The length of the report is long--too long for most interested readers. I would recommend developing an Executive Summary which highlights the findings, conclusions and recommendations. This summary should be from two to ten pages long. This summary should summarize across data collection techniques by areas--content, instructional format, consultants, materials, quality of units, use of units, etc. for each group in terms of strengths, weaknesses, and recommendations.
9. The visual displays of data are generally excellent, especially those tables which summarize strengths, weaknesses, and recommendations. (These tables should be included in the executive summary.)
10. The report has a professional appearance.
11. The organization of the report is its biggest problem. I found the organization cumbersome and difficult to follow. Although I realize a report format is being followed, there is considerable latitude for organization within sections. I recommend the following changes:
  - a. Rather than organizing the results around the data collection techniques (e.g., self report, knowledge test, etc.), organize it around key elements that were evaluated-- seminar content, instructional format, schedule, consultants, utilization, etc. Because the techniques overlap in the type of data collected--this format will show where the various data converge to reveal the same finding.
  - b. Although there are advantages of reporting the Husson and UMO results in separate sub-sections, I find the disadvantage of repetition more persuasive. I recommend reporting the results for both groups in the same section. For example, "nine of the eleven Husson participants and seven of the sixteen UMO participants have already utilized their career education units in their courses."

## Evaluation Techniques

### Strengths

The four types of evaluation techniques used: (1) a Career Knowledge Test, (2) a Self Report Evaluation, (3) Follow-up Interviews, and (4) the Review of the Career Education Units against quality standards compliment one another. In concert, they appear to provide reasonably comprehensive, varied, relevant and objective information about the Level II workshop series.

### Weaknesses

My primary concerns about the evaluation techniques are:

1. As third party evaluator, I was not provided a copy of the revised Career Knowledge Test. The value of a significant different between treatment and control group scores on this test depends on the relevance, importance, and objectivity of the items used on the test. Without knowledge of these items, or more indications of the validity and reliability of the test, it is difficult to know how much credence to give the results.
2. The report should indicate that the self-report evaluation form used with the Husson college participants was revised based on recommendation and a sample instrument provided by the third party evaluator.
3. Some of the criteria used to review career education units are unclear. See specific comments on this page of the report.
4. All evaluation data were collected, analyzed, and interpreted by project staff who would be expected to have some vested interest in the success of the project. To make the evaluation more credible, it is suggested that in the future a third party evaluator perform the role of "auditor." The auditor should review the final form of all instruments, double check the tallying and analyses of the data at random, and review data interpretations before they are finalized. For the 1976-77 seminar series, the third party evaluator reviewed some but not all of the instruments and did not always see their final form. The third party evaluator had no access to data or data analyses performed. The third party evaluator was asked to review the data interpretation as evidenced by this document.

## Data Interpretation

### Strengths

The large amount of evaluative data collected was effectively synthesized into strengths, weaknesses, and recommendations for improving the seminar series. Data tables were for the most part clear and readable. The tables were not misleading. The staff comments sections were a valuable addition to the report and provided a clearly identifiable point for the staff to interject their personal perspective and reflections without appearing to bias the data.

### Weaknesses/Recommendations

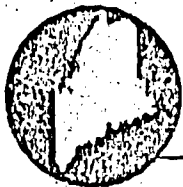
I recommend the following changes or additions to the data interpretation.

1. Table 7, page 42. Indicate which faculty hold dual appointments.
2. Page 55. Provide a caveat about why it was not possible or desirable to randomly select and assign participants to treatment and control groups.
3. Page 56. Because it was not possible (or probably desirable) to randomly select and assign participants to the treatment or control group, the results should not be generalized to similar seminar services.
4. Table 11, page 58. Change headings to Agree/Disagree.
5. Page 64. Indicate what scale was the basis for 84 percent of the participants rating the seminar series fair to excellent.
6. Follow-up Interview Data. Provide a table or series of tables which summarize the results from the interviews. It is difficult to understand the percentages presented in narrative style throughout this section without some background information about the type of questions participants are being asked. Some appear to be yes/no questions. Others appear to be scaled. But this is not clear. Additionally, the "big picture" of the interview results would be enhanced by a summary table.

7. Page 71. Provide more recommended changes for the future based on the Seminar Series findings. These data are rich with implications for change.
8. Page 72. The staff comments reflect a built in bias toward the Husson college faculty. This comment should be toned down.
9. Page 80. It is unclear whether the data in the table on this page are percents or frequencies.
10. Page 82. It is unclear what percent of the participants have utilized their career education unit.

#### Summary

Overall, I am impressed with the rigor of the evaluation procedures used. Although there are weaknesses and voids in the data collected, the effort is very commendable when compared to other career education evaluations. More specific comments and editorial changes are provided throughout the text of the report.



Center For Career Education  
College of Education

104 Shibles Hall  
Orono, Maine 04473  
207/581-2434

September 7, 1977

Mr. Prentice Echols  
Project Officer  
Office of Career Education  
U.S. Office of Education  
ROB-3, Room 3108-A  
Washington, D.C. 20202

Dear Prentice:

As Project Officer for the 1976-77 Comprehensive Career Education Project, we thought that it would be appropriate to address our remarks to you. The purpose of this letter is to respond in writing to the Third Party Evaluation Report provided by Dr. Kay A. Adams, The Center for Vocational Education, Columbus, Ohio. As you know, a total of \$2,056 was budgeted for Third Party Evaluation services by the Center. A total of two site visits were made by the contractor and a review of our preliminary final report was done at their headquarters. We have carefully reviewed the final report submitted and would like to react with specific content.

In general, we feel that many of the technical suggestions on pages 2, 3, 4 and 5 were very helpful, and we made the suggested changes in our final report. In our opinion, there are several suggestions that we think are unreasonable and inconsistent with our overall project goals. The following comments are specific reactions to suggestions to comments made in the Third Party report:

1. In response to comment 11a on page 2, we are faced with a two-edged sword. If we organize the data as suggested by Dr. Adams we solve some problems but create others. For example, if we take Dr. Adams suggestions it will be difficult to detail the data collection techniques utilized by two different sites, i.e. the Bangor Public Schools and the University of Maine. Thus, there did not appear to be any significant advantage to the recommended reorganization scheme suggested by CVTE.
2. If we organize the data as suggested in comment 11b on page 2, we again run into problems. In our opinion, the repetition is justified in the sense that it makes it easier to compare or to read the data for separate levels of our project. Final reports tend to be cumbersome in certain sections in order to provide complete data analysis. We think that extended analysis by level should be a high priority. We are providing an executive summary that will detail the significant results and which could be read very quickly by interested parties.

Mr. Prentice Echols

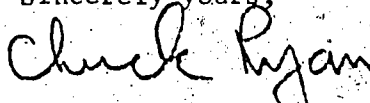
-2-

September 7, 1977

3. The comment on page 3 item number 1 is not an accurate assessment of the situation as we understand it. At both the September 1976 and January 1977 meetings the Third Party Evaluation Team had an opportunity and did provide input regarding the content of the Career Knowledge Test. Please note, the fourth revision of the Career Knowledge Test was administered in our posttesting, but it is still considered to be an experimental version. We have made subsequent interpretations of this data with this limitation in mind.

In essence, we are pleased with the assistance rendered by the Third Party Evaluation Team and have used many of the comments in their report as guides in preparing our final report. We did feel it necessary to attach this cover letter to avoid any misunderstandings at a future date.

Sincerely yours,



Charles W. Ryan, Ph.D.  
Professor of Education

CWR/rn

## Appendix B

1976-77 Career Education Evening Inservice Program

Location: Conference Room, Harlow Street School

General Format

- 6:30 - 7:15 Definition of Element  
Guest Speaker
- 7:15 - 7:25 Break
- 7:25 - 8:30 Activities and/or Demonstrations
- 8:30 - 9:00 Preparation of three classroom activities

Session Topics

- Workshop 1 - October 12 - Overview - Nona Thompson  
Self Awareness - Dr. Walter McIntyre  
College of Human Development, UMO  
Dr. John Sutton  
College of Education, UMO
- Workshop 2 - October 26 - Career Awareness - Nona Thompson
- Workshop 3 - November 2 - Community Involvement - Dr. Charles Ryan  
Panel from Community - College of Education, UMO
- Workshop 4 - November 16 - Appreciations & Attitudes - Dr. James Miller  
(Week for field trips) College of Education  
UMO
- Workshop 5 - December 7 - Appreciations & Attitudes - Nona Thompson  
Employability Skills - Richard Reccholtz  
Maine Employment Security  
Commission
- Workshop 6 - January 4 - Decision-Making - Nona Thompson, Marie Gass  
Career Education Office
- Workshop 7 - January 18 - Economic Awareness - Dr. James Miller  
College of Education, UMO
- Workshop 8 - February 1 - Beginning Competencies - Nona Thompson  
Educational Awareness
- Workshop 9 - February 15 - Evaluation, Wrap Up

## Appendix C

1976-77 Guidance, Resource Room Teachers,and Social Worker Inservice Workshop

Co-Directors: Richard Klain, Nona Thompson  
 Location: Conference Room, Harlow St. School  
 Time: 2:30 p.m. - 4:30 p.m.

<u>Date</u>	<u>Topic</u>	<u>Speaker</u>
*October 6 (to be held in Rm. 112, Harlow St.)	Testing	Dr. Frank Vitro College of Education, UMO
October 20	Testing	Dr. Frank Vitro
October 25	Behavior Management	Bernard Raishe doctoral candidate College of Education, UMO
November 1	Theory of Career Education	Nona Thompson Bangor School Department
November 15	Humanistic Education	Dr. Ann Campbell College of Education, UMO
November 22	Group Processes and Career Counseling	Dr. John Sutton College of Education, UMO
November 29	Model Delivery System for Career Guidance	Dr. Charles Ryan College of Education, UMO Nona Thompson
December 6	Group Processes and Career Guidance	Dr. William Mehnert College of Education, UMO
December 13	Community Involvement	Nona Thompson Dr. Charles Ryan Panel from the Community

December 20

Placement

Ken Gray  
Mt. Ararat School, TopshamRichard Reccholtz  
Maine Employment Security  
Commission

January 10

Demonstration of a Career  
Guidance ProgramAndre Hemond, Director  
So. Portland Guidance Dept.,  
accompanied by resource room  
teacher and counselor

January 17

Gifted Children

Dr. Isabel Bishop  
College of Education, UMO

January 24

Resource Room

Polly Eaton, et al  
Resource room teacher, Bangor

January 31

Interpreting School Law

Wendell G. Eaton,  
Superintendent of Schools  
Bangor

February 7

State Guidelines for Counselors

Ray Humphires, Guidance Dir.  
Greeley Sr. High School  
Cumberland, ME

February 14

Summarization and Evaluation

## Appendix D

## NTS Final Report

Dr. William Strang of National Testing Service was contacted on August 22, 1977 regarding the status of the N.T.S. data analysis and forthcoming report. We were informed that the earliest possible date for an analysis of the Bangor data would be October 15, 1977. After we receive this report and can analyze the findings an Addendum for the 1976-77 Final Report will be provided.

## Appendix E-

Career Education Questionnaire

1. Describe the sequential plan of career education (Comprehensive Career Education Model). (6 points)

Scoring Criteria

1 point for naming the phase (Awareness) and the grade level (K-6) (3)

1 point for explaining each phase (3)

2. Name and explain the eight (8) elements and outcomes of career education. (24 points)

Scoring Criteria

1 point for naming each element (8)

1 point for naming each outcome (8)

1 point for description of each (8)

---

Developed by Comprehensive Career Education Project staff,  
August 1976.

## Appendix F

Teacher Survey for Career Education  
Implementation Level

The purpose of this survey is to obtain feedback from the teaching staff in the Bangor Public School system as to the level of implementation of the Career Education program. Use the IBM answer sheet with this survey.

Indicate in name box your proper title:

- GC - Guidance Counselor
- T - Teacher
- A - Aide
- L - Librarian
- AT - Assistant Teacher

Also, indicate school, sex and in date of birth box put total years experience teaching.

1. Are you familiar with the Career Education Project in the Bangor Public Schools?  
A. Yes B. No
2. What is your attitude toward the Career Education Project?  
A. Highly Favorable B. Favorable C. Undecided D. Unfavorable  
E. Highly Unfavorable
3. Do you know the career education specialist in your building?  
A. Yes B. No
4. How often do you meet, formally or informally, individually or in groups, with a career education representative and/or demonstrator? NOTE: Your answer should be based on a monthly average.  
A. less than 5 B. 5-8 C. 9-12 D. greater than 13
5. How often do you use career education materials or activities? NOTE: Your answer should be based on a weekly average.  
A. less than 5 B. 6-10 C. 11-15 D. greater than 15
6. How much of your instructional time is based on the career education concept?  
A. less than 10% B. 11-25% C. 26-50% D. greater than 50%

## Appendix G

Comprehensive Career Education Project  
1976-77

## Evening Inservice Course

Evaluation FormPart I

Read each statement carefully and decide how you feel about it. You will agree with some statements and disagree with others. There are five possible answers to each statement. The "undecided" answer should be used only when you have no opinion. You are to mark your answers on the answer sheet accompanying this evaluation form. Blacken the space on the answer sheet corresponding to the distractor that best represents your feelings. For example, if you choose the distractor "agree" you would blacken between the lines in the column headed "2".

- | 1                 | 2     | 3         | 4        | 5                    |
|-------------------|-------|-----------|----------|----------------------|
| Strongly<br>Agree | Agree | Undecided | Disagree | Strongly<br>Disagree |
| 1.                |       |           |          |                      |
| 2.                |       |           |          |                      |
| 3.                |       |           |          |                      |
| 4.                |       |           |          |                      |
| 5.                |       |           |          |                      |
| 6.                |       |           |          |                      |
| 7.                |       |           |          |                      |
| 8.                |       |           |          |                      |
| 9.                |       |           |          |                      |
| 10.               |       |           |          |                      |

## Part II

Think about the seminar series and respond to the following semantic differential. Use the same answer sheet and blacken the space that corresponds to the distractor that best represents your feelings.

	1	2	3	4	5	6	
	Very	Somewhat	Neither	Both	Somewhat	Very	
1. Purposeful	_____	_____	_____	_____	_____	_____	Aimless
2. Practical	_____	_____	_____	_____	_____	_____	Impractical
3. Interesting	_____	_____	_____	_____	_____	_____	Boring
4. Realistic	_____	_____	_____	_____	_____	_____	Unrealistic
5. Important	_____	_____	_____	_____	_____	_____	Unimportant
6. Meaningless	_____	_____	_____	_____	_____	_____	Meaningful
7. Comfortable	_____	_____	_____	_____	_____	_____	Uncomfortable

### Format of Inservice Program

A. Strengths:

B. Weaknesses:

C. The following changes would help in future courses:

Materials

A. Strengths:

B. Weaknesses:

C. The following changes would help in future courses:

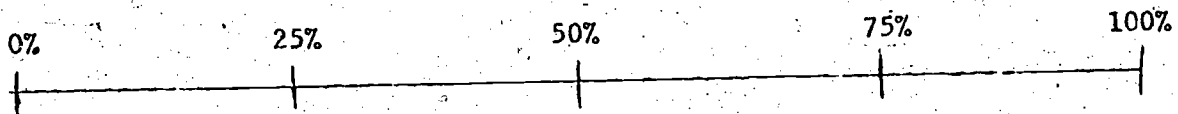
Presentors

A. Strengths:

B. Weaknesses:

C. The following changes would help in future courses:

Of the handout material I read:



## Appendix H

CAREER EDUCATION IN-SERVICE TEST<sup>1</sup>

1. Which of the following is not one of the elements of career education as defined by USOE?
  - a) educational awareness
  - ☒ b) interpersonal skills
  - c) career awareness
2. Which statement is not true?
  - a) At the elementary and junior high level, students should not be channeled into an occupational decision.
  - ☒ b) At the elementary level, the major emphasis of career development activities is that of exploration.
  - c) Career education is an educational approach designed to involve all youngsters.
3. All the following things are good to have done when a resource person comes in to speak to the class except:
  - a) have the students do a study of the occupation beforehand.
  - b) have a speaker in who's occupation is related to the present unit of study.
  - ☒ c) have the students ask questions such as the individual's salary.
4. Nearly all community speakers seem to feel which of the following:
  - a) Things are looking up; young people are more eager about work than they were a few years ago during the hippie era.
  - ☒ b) Young people today think the world owes them a living.
  - c) There is an increase now of better prepared people applying for jobs.
5. The author of Working is:
  - a) Stan Tonkel
  - ☒ b) Studs Terkel
  - c) Bud Ferkin
6. Career education is a concept based on elements:
  - ☒ a) to be infused when appropriate into the existing educational program.
  - b) to be used in a well-planned program on, at least, a weekly basis.
  - c) to be infused into the existing program as a special part of each lesson.
7. The exploration level of career education comes at the:
  - a) K-6 grade level
  - ☒ b) 7-9 grade level
  - c) 10-12 grade level

---

<sup>1</sup>Correct answers are circled.

8. There are how many elements and outcomes for career education?
- a) three
  - b) fifteen
  - ☒ c) eight
9. If a student wanted to know more about him/herself and his/her interests in conjunction with career decision-making, all but which of the following would help?
- a) Self-Directed Search
  - b) Kuder Interest Inventory
  - ☒ c) WAIS
10. Which of the following is not true about reaching consensus?
- ☒ a) Group members should avoid arguing in an attempt to win their point.
  - b) Each group member is responsible for listening and having input.
  - c) Voting should be used to end any conflict.
11. The major purpose of teaching the element of decision-making is:
- ☒ a) to help kids make good decisions
  - b) to help students become good decision makers.
  - c) to help students become responsible citizens.
12. The number of career clusters designated by the Office of Education is:
- a) nine
  - ☒ b) fifteen
  - c) twenty
13. Occupation is:
- a) one's life work history.
  - b) conscious effort aimed at reaching benefits for self and others.
  - ☒ c) paid work.
14. A hand shaker is:
- ☒ a) a worker who shakes dirt off peanut vines.
  - b) a worker who shakes cured tobacco to separate leaves.
  - c) a worker who performs one of the steps in the assembly of a clock.
15. A good example of material to use with career awareness is:
- ☒ a) Popeye Comics
  - b) Wally, Bertha, and You puppets
  - c) Marlo Thomas' records

16. Which of the following is not a part of economic awareness:
- a) scarcity
  - b) opportunity cost
  - ☒ c) human advantage
  - d) comparative advantage
17. An example of an economic awareness game is:
- a) the platform exercise
  - ☒ b) Star Power
  - c) Phoenician Fun
18. Which activity best typifies a self awareness exercise?
- a) the platform exercise
  - b) Occupational Prestige Ranking
  - ☒ c) success sticker exercise
19. Within the element of self awareness:
- ☒ a) individuals begin to develop a knowledge of their own aspirations, interests, abilities, and values.
  - b) emphasis is given to knowledge and understanding of the structure and dimensions of the education, work, family, citizen, and leisure worlds.
  - c) the goal is toward facilitating the development of individuals who value decision-making and can formulate reasonable life-career plans.
20. A good record to be used with sex stereotyping is:
- ☒ a) Free to Be...
  - b) Lady
  - c) Elephants and Giraffes
21. Appreciations and attitudes encompasses all but the following:
- a) use of leisure time
  - b) values and work attitudes
  - c) sex stereotyping
  - ☒ d) employment seeking skills
22. Which is not part of educational awareness?
- ☒ a) Knowledge of higher education facilities and their programs.
  - b) Knowledge of reasons for learning given things.
  - c) Knowledge of careers in the field of education.

23. Which is not an employability skill?

- a) completing forms
- ☒ b) using office machines
- c) being dependable

24. Beginning competencies as defined by USOE are:

- ☒ a) any basic skill.
- b) any basic motor skill.
- c) any sequence of performance skills.

25. Job shadowing is:

- a) getting a profile of a job by outlining the facts about it.
- b) visiting a business and talking one-to-one with the workers for a better silhouette of the job structure.
- ☒ c) trailing a worker at his/her job all day.

26. D.O.T. means:

- a) Dewey's Occupational Thesaurus
- ☒ b) Dictionary of Occupational Titles
- c) Dictionary of Occupational Terms

27. Career Education is:

- a) a new concept designed to prepare students for work in a technological society.
- b) a program of vocational instruction for all levels of education.
- ☒ c) a concept consisting of all activities and experiences through which individuals are prepared for life and work.
- d) all of the above.

28. Career education is aimed specifically at:

- a) the 40% of students who go on to higher education.
- b) the 60% of students who do not enter higher education.
- c) adults who are currently employed.
- ☒ d) all of the above

29. During the years of a child's education from pre-school through sixth grade, the main emphasis concerning career development is placed on:

- a) career exploration
- ☒ b) career awareness
- c) career preparation
- d) all of the above

30. One of the tenets of career education is that the program be comprehensive for:
- a) K-12
  - b) 1-6
  - ☒ c) K-Adult
  - d) K-6
31. Which of the following would not be an essential element of career education at the elementary school level (K-6)?
- a) developing a positive self-concept.
  - b) developing a sense of community involvement.
  - c) developing work attitudes and worker discipline.
  - ☒ d) developing employment seeking skills.
32. The basic career education element which helps students perceive processes in production, distribution, and consumption is:
- a) self awareness
  - ☒ b) economic awareness
  - c) educational awareness
  - d) career awareness
33. Activities for the elementary school student based on the findings of pedagogists such as Piaget, and leading to a greater understanding by that student of his own uniqueness fall under the career education element of:
- a) attitudes and appreciations
  - b) beginning competencies
  - ☒ c) self awareness
  - d) decision making
34. At the tenth through twelfth grade levels, emphasis is on:
- a) career exploration
  - b) career awareness
  - ☒ c) career preparation
  - d) all of the above
35. Sex role stereotyping in career education is most important in:
- a) creating career decisions.
  - b) providing career options.
  - c) reducing career discrimination.
  - ☒ d) all of the above.
36. "Appreciations and attitudes" is one of the career education elements.
- ☒ a) this statement is true
  - b) this statement is false

37. In the long run, implementation of career education programs will be more costly in terms of tax dollars than present systems.
- ☐ a) this statement is true
  - ☒ b) this statement is false
38. Career education is not limited to formal school programs.
- ☒ a) true
  - ☐ b) false
39. The most effective method of presenting career education to students is:
- a) for classroom teachers to prepare a specific course or program to be offered as an introduction to high school or college.
  - ☒ b) for existing personnel to infuse career-oriented methods and materials into their present instruction.
  - c) for counselors to instruct individuals who are having problems adjusting to a new job situation.
  - d) for teachers to simply tell students to find out for themselves.
40. Economic awareness is:
- a) an element of career education which has received much attention throughout high school, but is lacking at the elementary level.
  - ☒ b) an element of career education which most high school graduates have achieved at a 5th grade level of competence.
  - c) an element of career education which becomes applicable when the student reaches the college or university level.
  - d) not an element of career education.
41. Self social fulfillment or an active and satisfying work role is the outcomes sought from the career education element called:
- ☒ a) appreciations and attitudes
  - b) decision making
  - c) economic awareness
  - d) educational awareness
42. One role of the teacher in helping the student develop career decision skills is to help bridge the gap between:
- a) school and job.
  - b) school and home.
  - c) job skills and job.
  - ☒ d) all of the above.

43. Which of the following societal changes have provided impetus for career education in the last ten years:

- a) family living patterns have changed.
- b) education has extended beyond completion of high school.
- c) young people have reduced contact with adults or community agencies.
- ☒ d) all of the above.

44. Career education, as a concept, is primarily concerned with the period of formal education from kindergarten through grade twelve.

- a) true
- ☒ b) false

45. Career education tends to favor whites and work against the racial minorities where the work ethic is not as strong.

- a) true
- ☒ b) false

46. Infusion and collaboration are key words in the career education concept.

- ☒ a) true
- b) false

47. One of the major advantages of career education is that it can be taught as a separate subject so as not to interfere with the basic academic program.

- a) true
- ☒ b) false

48. Which of the following is true of career education?

- ☒ a) its activities are effective motivators for students.
- b) its goal is for individuals to decide upon one vocation and work toward it.
- c) its major emphasis is on rewarding cognitive ability.
- d) all of the above

49. The relationship of career education to vocational education is that:

- a) they are two names for the same process.
- ☒ b) career education includes vocational education.
- c) vocational education is incompatible with career education.
- d) vocational education includes career education.

50. Career education would have junior high students planning for specific occupations.

- a) true
- ☒ b) false

Developed by Level I staff, Comprehensive Career Education Project, Bangor Public Schools, Bangor, Maine 04401.

## Appendix I

## Career Guidance Workshop

Implementation Survey, 1976-77

1. Did the workshop cause any changes in your philosophy or activities?
2. If funded another year, are there certain areas where you would like more indepth exposure?
3. After three months time span for reflection, if doing this for another group of counselors, what activities should be continued?
4. After three months time span for reflection, if doing this for another group of counselors, what activities should be omitted?

## Appendix J

School \_\_\_\_\_

Date \_\_\_\_\_

In-Service Evaluation

1. Was this in-service session worthwhile? Why or why not?

2. How might it be improved?

3. What did you like about the session?

4. What would you like left out?

5. Other comments,

## Appendix K

Participant Evaluation of System Wide  
Career Education Program

1. Was this in-service session worthwhile?

Yes 46 No 3 Undecided 13

2. How might it be improved? (number in ( ) indicates how many made the same comment)

- Shorter afternoon sessions
- More chances to see all the afternoon sessions (4)
- More time for personal projects (4)
- Eliminate last half of the day (4)
- Allow us to work with others in our own area to develop own activities (11)
- Have teachers job shadow in the afternoon
- More direction in subject area meetings (3)
- Leave out department meetings (7)
- More time for morning sessions
- More competent leaders
- More ideas, less games (5)
- More strategies for implementation (4)
- Smaller groups (3)
- No workshop, just give us a ditto or handbook (2)
- Tell us about jobs available in Maine
- Less repetition (2)
- More participation by "attendees"
- Have more realistic ideas, not so idealistic (2)
- More role playing
- Have donuts
- Have follow-up
- Less of exercises we have done many times before
- More of what to do with children who are culturally and/or educationally deprived
- Little snappier approach
- Guidance session during first afternoon session
- More information on name tags
- Warmer building
- Involve some community resource people
- Students involved (their views on careers)
- Not so many handouts (2)
- Have more choices
- Don't go over self explanatory handouts

3. What did you like about the session?

- Session on beginning competencies
- Sex stereotyping session (suggest a discussion period after though) (8)
- Values clarification session (auction) (3)

- Afternoon session with students and Deale Salisbury
- Simulation games (2)
- South Portland people (3)
- Enthusiastic presentors (8)
- Terry Sotiriou and her ideas
- Activity book (3)
- Gertrude Parker - the staff (5)
- Using practitioners as presentors
- Being shown activities, not just hearing of them (6)
- The informality
- The little interaction with co-professionals (9)
- The many different sessions (2)
- The way you grouped us (2)
- The higher education panel
- Getting to participate (11)
- The good activities, many ideas (14)
- Relevancy, tempo, variety (3)
- Down to earth
- Getting a good understanding of career education (4)
- Morning sessions not too long and broke on time (4)
- Stuck to schedule
- Well run, well planned, well organized (12)
- Gave me something to think about (5)

4. What would you like left out?

- Noon hour
- Not have so many programs
- Don't have workshop (2)
- Some of the games (2)
- Fillers and anything to waste time
- Outdated materials (1966 job prestige by public opinion)

5. Other comments:

- Portions were worthwhile
- More South Portland (2)
- Teachers like directing not being directed
- Looks good on paper but will the kids accept it
- What happens when the federal funds are dropped
- Looks like a new program not an infusion
- Left me unenthused; got one good idea
- A day with the students would have been more valuable (2)
- Too much, too fast
- Will we overexpose kids to the same nifty activities
- Put more emphasis on responsible behavior and pride of achievement
- Put less focus on careers

- Not enough time, challenging, informative, stimulating, fast paced, very relaxing, terrific, not a bad day, I enjoyed it tremendously, need more like this, great job, I'm impressed, commendable, a great day and very worthwhile (4)
- Thank you (2)
- I used to think in-service days were worthless - I think today's work was highly useful.

## Bangor Elementary Career Education In-Service Program Evaluation

Four questions were asked of the participants at each workshop. Sample evaluations by grade levels are attached. Results or statements not in quotations represent composite responses, while those statements in quotations represent statements made by individuals. All individual evaluations are on file in the Bangor Career Education Center and available for review.

Of the 404 responses, the results are the following:

1. Was this in-service session worthwhile? Why or why not?

91.2% (368) - yes  
4.9% (20) - somewhat  
3.9% (16) - no

2. How might it be improved?

Great as is.

"Who knows? They were nice, friendly sessions."

"More discussion time."

Spending less time on some of the activities.

More activities could be given.

More time.

Get things that apply to grade level.

Some material/activities were presented too often.

A list of resources available at Career Education Center would help.

Too long - shorten sessions.

3. What did you like about the session?

The personalities, hard work, and enthusiasm of the presentors.

Organization

Relaxed atmosphere

New concrete ideas to be tried in the classroom

Enjoyed opportunity to browse through Career Education Center and become familiar with materials.

Exchange of ideas

Fresh ideas for old basics

Involvement of teachers in the activities.

Having things geared to the appropriate grade level.

"No time wasted on small talk not related to our work, yet relaxing and enjoyable."

"Emphasis on quality rather than quantity."

"Pertinent to my needs."

"It allows me to think about what kind of a teacher I am."

"There were many things presented today that put my thinking into motion."

"It was fun; there is no reason why education can't be fun - like this!"

"I felt the time was well spent for me to get ideas of what other people do to teach in a constructive manner."

4. What would you like left out?

Nothing

Some of the activities.

Some of the self awareness activities made me uncomfortable.

5. Other comments:

Good job - well done!

One of the best in-service programs this year.

"Too bad the school board could not have seen this well organized session and attendance given to it by attenders and attendees!"

"I really enjoyed today but do not enjoy the idea of four meetings on this subject."

The involvement was fabulous.

Good use of time.

"I enjoyed it when teachers have to do activities instead of listening to lectures. I believe learning is incorporated better when students (listeners, teachers, whatever) become involved in activities."

"I do not like being treated like one of the students."

"In some of the exercises, I was made to feel as a child does, and this helped me realize how I make a child feel through various attitudes in my teaching."

"In-service time is being misused. No reflection on leaders; they did a good job. District wide, all together activities do not reflect a personalized approach to education."

"In-service should not be planned during presidential inauguration activities."

"Not much more could be packed so smoothly into one session."

"Presentors are excited about career education and it rubs off on the teachers."

"I am opposed to in-service."

"I wish there would be a Career Education Center in each building."

"I don't envy the position of these teachers doing the workshops. They are to be applauded!"

"I appreciate the amount of time that went into planning this. I hate to waste time and enjoy practical suggestions that can lead to direct follow through in my classroom."

**MADISON PUBLIC SCHOOLS**

DOUGLASS S. RITCHIE, Superintendent

545 WEST DAYTON STREET  
MADISON, WISCONSIN 53703

July 15, 1976

TO: USOE Career Education Project Directors

FROM: Ellen Meister, Research & Development Coordinator

SUBJECT: Evaluation of Career Education Instructional Materials

Educators are faced with multiple choices of published instructional materials. All are offered in support of the career development process of children and youth. The materials run the gamut from print to non-print, and from audio visual to combination kit-type materials. Some of the materials are newly created and address the key dimensions of (1) self-concept, (2) career development, (3) career planning and preparation, and (4) the world of work. Other materials are merely being "re-marketed" under the career education label while they continue to perpetuate such concerns as career role stereotyping, mismatching of learner readiness to work-related concepts, and focusing on occupational roles as opposed to helping students develop career identity as part of self identity. Given the above situation, educators need to be cognizant of comprehensive criteria for evaluating and selecting career education materials being considered for purchase and use.

The purpose of the attached documents are to support a critical evaluation of all materials in the career education area. Madison Public Schools has been using these evaluation instruments for two years and we have found them to be very helpful. We are pleased to share copies with you.

## CRITERIA FOR THE EVALUATION OF CAREER EDUCATION MATERIALS

### 1.0 Technical Considerations

- 1.1 Is the material presented in a suitable package (i.e., durable, easy to store and easy access)?
- 1.2 If the materials are in a kit or program format, can individual parts or sections be used separately and/or replaced separately?
- 1.3 Does the material have quality composition, photography and sound production?
- 1.4 Is the type of media appropriate for the intended audience?
- 1.5 Is the material physically easy to use?

### 2.0 Scope

- 2.1 Does the material generally address itself to:

career awareness

self-awareness

decision-making

attitudes and appreciation

educational awareness

value structure

economic structure

skill awareness

employability skills

- 2.2 Is the material internally consistent and does the material have a clear focus?
- 2.3 Does the material go beyond job/occupation and reflect the psychological and sociological involvement of the worker?
- 2.4 Can the material be integrated into the existing curriculum and does it have inter- and/or multi-disciplinary implications?

### 3.0 Validity of Materials in Terms of Need

- 3.1 Would the content be motivational to the intended audience?
- 3.2 Is the reading level/vocabulary commensurate with the intended audience?  
Is the reading level/vocabulary supportive of desired student outcomes?
- 3.3 Is the concept load appropriate for the intended audience?
- 3.4 Do students need to have specific basic entry skills to use the material effectively?
- 3.5 If the reading level is appropriate but the content lacking in some ways, can the latter be supplemented adequately so that the material is acceptable?
- 3.6 Are conversational messages communicated in appropriate "forms of usage?"

### 4.0 Methodology

- 4.1 Can the material be used effectively without adaptation or modification?
- 4.2 Can the material be used effectively without special expertise?
- 4.3 Can the material be used without a detailed introduction or explanation?
- 4.4 Does the material require considerable additional follow-up?
- 4.5 Does the material include suggestions for effective strategies and/or related instructional activities? (teacher's guide)
- 4.6 Does the material require any testing or surveying of students?
- 4.7 Can the material be utilized within normal time constraints?

4.8 Is the material designed to be used individually? Is it suitable for small groups? entire class? (indicate)

4.9 Can the material be used without teacher direction?

#### 5.0 Authenticity

5.1 Are the authors authorities in their fields?

5.2 Has the material been field-tested?

5.3 Does the material present a realistic picture (positive and negative aspects of career and true attitudes and values of workers)?

5.4 Does the material reflect a realistic picture of life and society (not just white middle class)?

5.5 Is the information presented current? (What is the original copyright date?)

#### 6.0 Viewpoint

6.1 Does the material avoid stereotypes (women, minorities and handicapped in varied positions and policy-making levels)?

6.2 Is the material truly multi-cultural (showing several cultural groups)?

6.3 Does the material deal with interpersonal relations at the student level? At the occupational level?

6.4 Does the material accurately reflect a range of values as opposed to emphasizing only white, middle-class values?

6.5 Is the material biased? State the bias.

6.6 Are all people treated with dignity regardless of age, economic position, etc.

#### 7.0 Special Considerations

7.1 Is there an existing alternative for presenting the same concepts?

7.2 Have all special strengths or weaknesses of the material been covered?

7.3 If the material has identifiable weaknesses, can they be tolerated?

7.4 Can supplementary aids be prepared to strengthen any weaknesses? (specify)

7.5 Is the cost justified on the basis of:

--number of students reached?

--no other comparable and less expensive material available?

--the need to buy equipment necessary for using the material?

<b>TITLE</b>	<b>AUTHOR</b>		<b>COPYRIGHT DATE</b>
<b>PUBLISHER/DISTRIBUTOR</b>	<b>COST</b>	<b>GRADE LEVEL</b>	<b>READING LEVEL</b>

**TYPE OF MEDIA:** (circle media type)

Book; Sound Filmstrip; 16mm Film; Kit; Cassette; Record; Tape (reel); Transparency; Slides; Other \_\_\_\_\_

**COMPONENTS:** (e.g. filmstrips; 2 cassettes; 1 Teacher Guide; 30 Student Manuals)

**Curriculum Areas (circle)**

Language Arts; Social Studies; Math; Science; Art; Music; Other \_\_\_\_\_

Criteria/Key Words	Strong-Weak (5 4 3 2 1)	Explanation/Comments: Strengths, Weaknesses, Supplementary Uses
<b>SCOPE:</b> Rationale; Content Balance; Concepts; Logic; Consistency; Concept load		
<b>AUTHENTICITY:</b> Accurate; Impartial; Field tested; Up-to-date		
<b>VIEWPOINT:</b> Human/Interpersonal Relations; Women; Bias; Handicapped; Stereotypes		
<b>SPECIAL FEATURES:</b> Cost; Notes; Guides; Accompanying Material; Can be supplemented		
<b>TECHNICAL ASPECTS:</b> Organization; Sound; Clarity; Focus; Color; Composition; Design; Packaging		
<b>APPROPRIATENESS:</b> Audience; Reading/Basic Skills; Individual or Group; Tone		

**SOURCE:** \_\_\_\_\_

**CONTENT SUMMARY:** \_\_\_\_\_

**RECOMMEND:** YES: \_\_\_\_\_; AT GRADE: \_\_\_\_\_; NO: \_\_\_\_\_; DEFER: \_\_\_\_\_ **REASON:** \_\_\_\_\_

**EVALUATOR** \_\_\_\_\_

**SCHOOL** \_\_\_\_\_

**POSITION** \_\_\_\_\_

**GRADE LEVEL** \_\_\_\_\_

**DATE** \_\_\_\_\_

Appendix N  
Documentation of Our Problems with National Testing Service  
First Six Months

1. NTS said there would be a two-day training of proctors. The proctors were trained for one afternoon for two hours. This left the proctors feeling inadequately prepared. We, therefore, held another meeting with them in which we worked with questions they had. They were not paid for that session.
2. NTS said all information for this project would come to Nona Thompson. They then sent the draft of the common evaluation design to Dr. Charles Ryan causing us to receive it the day after we were to approve it.
3. We have dealt with several (4) people already at NTS. This tends to create a lack of continuity.
4. NTS said that all test materials would come by UPS or by U.S. Registered Mail. UPS was on strike. When the Post Office assured us that the test packages had not come through them, we called NTS. The packages had been flown up on Delta Airlines and were already at the terminal; therefore, valuable test preparation time was lost. (No one had contacted us either from the airline or from NTS.)
5. When we found that the package we had received had been for another smaller test site, we called NTS. (Oct. 14) They assured us that more tests and response booklets would be flown up. Later in another phone conversation they told us that the tests had been sent by mail that noon. As of today (11/22/76) we have not received them.
6. Because there were not enough response booklets we had to print more. Because there were not enough tests we had to add an extra day to the testing in order to share booklets. Because we received all test materials late, we had to postpone testing one day and hire the coordinator an extra day to prepare response booklets and to reschedule test sessions.

Prepared by Nona Thompson, Career Education Coordinator, Bangor  
Public Schools, December 1976.

7. Because NTS had so little time to work on the project before the testing, the tests were not screened for the appropriate grade reading level. We, therefore, found that many children were unable to complete the test in the Junior and Senior High Levels. We found that fifth grade students could not answer much of the test section that used double negatives. A copy of a teacher's response to the testing and a student's response is enclosed.

8. We sent tests and test proctors payment roster to NTS on 11/3/76. On 11/21/76 our office called NTS asking why our proctors had not received payment. On 11/22/76 NTS called back to say that they had just found the roster still attached to the box. The envelope in which it had been placed had never been opened.

9. Our test proctors received payment for their work (Oct. 19 - 25, 1976) on December 21, 1976. Our test coordinator was not paid as much as she had been told in verbal agreement. We recontacted NTS concerning this. The rest of her payment arrived January 14, 1977.

10. We have received a set of survey forms to fill out. Although we felt the information these forms could provide would be valuable to NTS, the forms were so cumbersome and unreadable that our staff found them hard to work with. They sent a second set for us to review which seemed easier to understand and fill out.

## 19 teachers plan workshop about careers

Nineteen Bangor teachers this week are planning classroom methods in career education as part of a workshop sponsored by the city's career education project.

According to project director Nona Thompson workshop participants are developing curriculum materials, discussing ways to introduce concepts into the classroom and planning a two-day workshop in career education techniques for all Bangor teachers.

The program, in its second year, seeks to acquaint students with career opportunities and healthy attitudes toward work. Bangor is serving as a model site for northern Maine.

# Career-education ideas shared at

By Wayne Reilly  
NEWS Education Writer

What exactly goes on in Bangor's controversial Thursday afternoon in-service teacher training programs endorsed in grades K - Sixth for a second time Monday night by the school board despite parental criticism?

This reporter visited the Thursday session held at the Mary Snow School for teachers from that school and Vine Street School. Those are two of the new schools in the program which started in 1971 at Dow Lane School. Parents of children in the two new schools have levelled criticism this fall.

The two, and a half hour session concerned the city's federally-funded career education program which is entering its second year. During most of the time teachers who were involved in training sessions last year gave their colleagues ideas on how they can

start a career education program in their classrooms.

"This is a sharing of ideas," said career education director Nona Thompson who introduced the session which lasted from 12:30 to 3:00 p.m. This year she is coordinating four workshops for teachers at each school.

Her program is considered part of the central office's planning effort which will take up 50 per cent of the afternoon sessions at all the schools.

When they entered, everyone got a printed schedule giving the location of three workshops, and displays of career education curriculum material. Thompson outlined the program's goals for the year and informed teachers of services available from her office.

At 12:45 p.m. the teachers broke into the workshops according to the grades they teach. Each workshop dealt with two "elements" of a successful career education program.

Beth Boynton, a Vine Street teacher, and Betty Cary, a Mary Snow teacher, introduced fifth and sixth grade teachers to ideas they can use for instruction of two elements — "decision making" and "appreciation and attitudes." Those two elements mean that students will need to be able to make intelligent decisions based on clearly formulated values when it comes time for them to choose a job.

During the first hour the 11 teachers simulate a classroom activity. They break into two groups and rank-order a list of professions according to the prestige they feel the jobs have with the public. The process forces use of an orderly group decision-making process and values clarification at the same time.

The teachers end up ranking themselves 12 out of 15 professions. While their procedures are outwardly smooth, it's pointed out

Oct. 28, 1976

## teachers' in-service training session

that student groups can end up in argument and aggression, unless they understand the group consensus process.

During the procedure, Betty Cary throws a handful of Halloween candy in their midst. Later that's announced to be another possible class activity.

There wasn't enough candy to go around. How did the teachers split it up fairly? She says it can be used as another activity to get students thinking about how decisions are made.

Later Boynton and Cary introduce ideas for other classroom activities. Most of them are geared to improving the self-image of the children.

"What we're really striving for is a chance for students to feel good about themselves. If they feel good about themselves, they'll do everything better," says Cary.

For instance, one class of sixth graders has put together a "Yellow Pages." Each student has a page devoted to what he does best. The pages are advertisements. Each student advertises his skills. Some can demonstrate crafts; another will help his classmates look up words in the dictionary.

Next door, Cathy D'Errico, a Mary Snow teacher, and Steve Godsoe, a high school teacher, are introducing activities for grades K-2, centered around the themes of "employability skills" and "self-awareness."

Activities under the former theme attempt to help students understand the characteristics they will need to hold down a job. For instance, teachers are told they could assign students some work and then leave the room for a few minutes, leaving a tape recorder running. When the teacher returns the tape is replayed and a discussion is held on why

students were able to work alone or wasted their time.

Teachers get forms so they can suggest people in a variety of jobs who could come to the school for lectures or be visited on field trips.

How do teachers regard the new sessions? Each one was given an evaluation form to be submitted anonymously at the end of the afternoon.

Betty Cary says she was uncertain about the program's worth when it started in the fall. Now, she said, she feels the sessions can be worthwhile if programs are kept at a high quality. She feels public scrutiny will help ensure that occurs.

Meanwhile, parents are still asking hard questions about program scheduling and the value to students. Supt. Wendell Eaton has been charged by the school board with developing a detailed way to evaluate in-service training before the next meeting.

PRESS RELEASE

Guidance Counselor, Resource Room Teacher,  
Social Worker Inservice Program

Conference Room, Harlow St. School 2:30-4:30  
January 17, 1977

Bangor guidance counselors, resource room teachers, and social workers are participating in a 16 session in-service program. In June, counselors saw the need to re-evaluate their program of services and explore new techniques and methods for implementing guidance services. Therefore, a committee developed a list of topics they felt would help guidance personnel to explore the new areas. In addition, the Comprehensive Career Education Program wrote guidance into its project this year as a component of the Bangor Public School staff who would participate in inservice training in career education. The attached inservice agenda is the result of the combined coordination of the counselor planning committee's work and that of the Comprehensive Career Education Project. Half the workshops are sponsored through the Bangor School Department, while the remaining half are sponsored by the Comprehensive Career Education Project.

The purposes of the workshop are:

- to become aware of new methods and ideas being used in the guidance area.
- to become aware of the role of the counselor in career education.
- to learn career counseling and guidance procedures.
- to increase group counseling skills and techniques.
- to become aware of placement strategies.
- to generally improve guidance services.

Each session is evaluated by all participants so that participants have an opportunity to react to the ideas given and make suggestions on how to fulfill their needs and interests in future sessions.

PRESS RELEASE

Elementary Inservice Program Thursday  
Afternoons in Career Education

Fourteenth St. School, January 27, 1977  
12:30 - 3:00 p.m.

As part of the system-wide planned Thursday afternoon inservice program for elementary teachers, each Bangor teacher is participating in four career education workshops. These programs have been planned and presented by Bangor teachers who participated in the pilot career education training program last year. Teachers meet according to grade level and become aware of the concepts involved in each of the eight elements of career education, participate in career education activities in groups, and receive specific ideas for classroom activities which can be utilized in their own classes. In order for the demonstration teams to meet the groups' specific needs and interests, each participating teacher completes an evaluation at the end of every workshop stating his/her reaction to that particular session and suggestions for future ones.

To familiarize news staff with the basic concepts of career education, a Bangor teacher career education handbook is enclosed.

PRESS RELEASE

Evening Teacher Inservice  
Program in Career Education

Conference Room, Harlow St. School  
6:30 - 9:00, February 15, 1977

The last of nine inservice workshops for 33 teachers who wish to become intensively trained in the career education concept is taking place February 15. The sessions have included theory of each of the eight elements followed by specific activities and ideas which can be used in the classroom. In addition to the evening sessions, each teacher spent a day visiting three local places of business and/or post secondary schools, and then spent a second day at a later date job shadowing a city worker.

As in all career education workshop programs, each workshop is evaluated by all participants so that they are able to have input in the planning of future sessions.

Husson College

Comprehensive Career Education Project  
1976-77

University Based Seminars

Seminar Procedures

Introduction

The Comprehensive Career Education Project is a federally funded project and therefore there are certain requirements that must be met with respect to the use of funds. Federal regulations require that when funds or stipends are given that some type of service or product be presented in return.

In determining the following requirements for the seminar participants, we have attempted to comply with the federal regulations and at the same time provide the participants with some reasonable return for their time and effort. The requirements are:

Requirements

1. Participants are expected to be at each scheduled session. A reimbursement of \$25 will be made for each session attended. If there is an occasion where a seminar must be missed, there will be no reimbursement made for that session, regardless of the reason that might have kept the participant from attending the session.
2. Participants are expected to develop a course unit (a portion or section of a course syllabus) that infuses a career education element. Examples of model units will be made available during the course as part of the handout material. It is anticipated that the new unit that is developed will be part of a course to

be offered in the spring 1977 semester. These units should not be more than four or five pages and are due on January 25, 1977.

For those individuals who are full time administrators with no teaching load, the requirements will be to submit a model of how career education elements may be infused into your administrative area.

Our intention is to combine all of these units and publish them nationally as curriculum models for the infusion of career education in higher education. All contributors will be listed as co-authors and receive appropriate credit for this publication.

#### Administrative Procedures

1. Participants will be asked to complete a career education inventory at the last session. The results will be used to help the staff determine the level of knowledge attained by the conference participants and to assist in the overall evaluation of the seminar program.
2. A follow-up interview will be conducted with each participant during April or May, 1977. The purpose of the interview will be to ascertain the level of implementation of career education ideas and procedures as a measure of the effectiveness of the seminar program.
3. Stipend checks will be available on or about February 1, 1977.

Best wishes for a successful experience and please call on any member of the Career Education staff for assistance as needed.

Staff: Chuck Ryan  
Bob Drummond  
Jack Sutton

Phone: 581-2431

## Appendix Q

University of Maine  
Orono, Maine

Comprehensive Career Education Project  
1976-77

## University Based Seminars

## Seminar Procedures

Introduction

The Comprehensive Career Education Project is a federally funded project and therefore there are certain requirements that must be met with respect to the use of funds. Federal regulations require that when funds or stipends are given that some type of service or product be presented in return.

In determining the following requirements for the seminar participants, we have attempted to comply with the federal regulations and at the same time provide the participants with some reasonable return for their time and effort. The requirements are:

Requirements

1. Participants are expected to be at each scheduled session. A reimbursement of \$29 will be made for each session attended;

If there is an occasion where a seminar must be missed, there will be no reimbursement made for that session, regardless of the reason that might have kept the participant from attending the session.

2. Participants are expected to develop a course unit (a portion or section of a course syllabus) that infuses a career education element. Examples of model units will be made available during the course as part of the handout material. It is anticipated that the new unit that is developed will be part of a course to be

offered in the spring 1977 semester. These units should not be more than four or five pages and are due on January 28, 1977.

Our intention is to combine all of these units and publish them nationally as curriculum models for the infusion of career education in higher education. All contributors will be listed as co-authors and receive appropriate credit for this publication.

#### Administrative Procedures

1. Participants will be asked to complete a career education inventory at the last session. The results will be used to help the staff determine the level of knowledge attained by the conference participants and to assist in the overall evaluation of the seminar program.
2. A follow-up interview will be conducted with each participant during April or May, 1977. The purpose of the interview will be to ascertain the level of implementation of career education ideas and procedures as a measure of the effectiveness of the seminar program.
3. Stipend checks will be available on or about March 1, 1977.

Best wishes for a successful experience and please call on any member of the Career Education staff for assistance as needed.

Staff: Chuck Ryan  
Bob Drummond  
Jack Sutton

Phone: 581-2431

Appendix R

Husson College

Comprehensive Career Education Project  
1976-77

University Based Seminar Schedule

PLACE: F 142 Peabody Hall

TIME: 3:30-5:30 p.m.

<u>DATE</u>	<u>SPEAKER</u>	<u>TOPIC</u>
Oct. 21	Dr. Ryan	"Foundations of Career Education: An Overview."
Nov. 4	Dr. Ristau	"Career Education Models for Four Year Institutions."
Nov. 18	Nona Thompson	"Demonstrations of Career Education Programs."
Dec. 9	Dr. McQuigg	"Infusing Career Education in Undergraduate Education."

NOTE: Please plan to attend the first seminar (Oct. 21) early  
for registration 3:00-3:30 p.m.

Dr. Robert Ristau  
Professor of Education  
College of Business Administration  
Eastern Michigan University,  
Ypsilanti, Michigan

Mrs. Nona Thompson  
Career Education Coordinator  
Bangor Public Schools  
Bangor, Maine

Dr. Charles W. Ryan  
Professor of Education  
College of Education  
University of Maine  
Orono, Maine

Dr. Bruce McQuigg  
Associate Professor of Education  
School of Education  
Indiana University  
Bloomington, Indiana

## University of Maine at Orono

Comprehensive Career Education Project  
1976-77

## University Based Seminar Schedule

PLACE: Walker Room, Memorial UnionTIME: 9:00-11:00 a.m.

<u>DATE</u>	<u>SPEAKER</u>	<u>TOPIC</u>
Oct. 22	Dr. Ryan	"Foundation of Career Education: A Status Review." NOTE: Please plan to attend the first seminar (Oct. 22) early for registration and coffee. 8:30-9:00 a.m.
Nov. 5	Dr. Ristau	"Implementation of Career Education into Teacher Education."
Nov. 19	Dr. Peterson	"Curriculum Development: Infusing Career Education Elements."
Dec. 10	Dr. McQuigg	"Self-Development Techniques and Resources for Teacher Education Majors."
Jan. 28	Dr. Quaranta	"Career Planning: Skill Development Procedures."
Feb. 11	Dr. Casella	"Utilization of Campus Career Education Resources."
Feb. 18	Mr. Sewall	"Utilization of Community Career Education Resources."

In lieu of the eighth seminar, a visit to an on-going classroom career education project will be arranged with the Bangor school system during the training period.

SPEAKERS

Dr. Charles W. Ryan  
Professor of Education  
College of Education  
University of Maine, Orono

Dr. Robert Ristau  
Professor of Education  
College of Business Administration  
University of Eastern Michigan

Dr. Marla Peterson  
Research Associate  
Center for Vocational and  
Technical Education  
Ohio State University

Dr. Bruce McQuigg  
Professor of Education  
College of Education  
University of Indiana

Dr. Don Casella  
Director of Contract Learning Center  
Birmingham Southern College

Dr. Joseph Quaranta  
Professor of Education  
College of Education  
Ohio State University

Mr. Adrian J. Sewall  
Director, Career Planning &  
Placement  
University of Maine, Orono

## Comprehensive Career Education Project

## University Based Seminar Training

Suggested Unit Format

It is suggested that the following format be used as you prepare an instructional unit for publication in the Teaching Strategy Handbook. Our experience over the past three years has indicated that the following unit outline communicates to both the learner and instructor what is intended. Also, production of high quality curriculum material at minimum cost within minimal time constraints is enhanced through use of common procedures during unit refinement/development.

Unit Format

Introduction - Discuss the purpose of the instructional unit and provide a brief overview.

Unit Goal(s) - A global statement of direction, intent or long range aim.

Unit Objective(s) - A statement of instruction that is intended to produce observable or measurable student performance. One of the three conditions of a performance objective should be met:

1. What the learner must do.
2. Under what conditions and with what materials must it be done.
3. Standard of performance to be met - how will the teacher and student know that a specific standard or level of accomplishment has been attained.

Each unit goal should have at least one performance objective. Performance objectives must be stated so that their accomplishment enables the student to reach the stated intent.

Learning Activities - Specific classroom, community or campus based activities that facilitate attainment of the objectives. The content should be in topic form and generally describe the concepts, skills, understandings, and affective learnings that will be provided the learner. It is suggested that at least one learning activity be outlined for each performance objective.

Resources - Curriculum materials, lists, games, tests, resource people, field experiences, work-study stations, etc. To assist the learner in meeting unit objectives.

Evaluation - Specific techniques or procedures to assess learner achievement and/or program effectiveness.

Time Constraints - Recommended time frame for presenting the unit.

Prepared by C.W. Ryan 11/2/76

## Social Science Research Institute

## Follow-up Interview for

## University Based Career Education Seminar Series

Respondent....  
Interviewer...  
Date.....  
Time started..  
Time finished..

First, I'd like to ask a few questions about your background.

A1. How many years teaching experience do you have? \_\_\_\_\_ years

A2. Has all your teaching been in post-secondary education?

1. YES

5. NO

A3. How many years were not post-secondary? \_\_\_\_\_ years

A4. Are you a full-time teacher, a full-time administrator, or both a teacher and administrator?

% time teacher \_\_\_\_\_ % time administrator \_\_\_\_\_

A5. Before the seminar series did you have any experience or training in career education?

1. YES

5. NO

A6. What was it? \_\_\_\_\_  
\_\_\_\_\_

A7. Are you between the ages of 20 and 29? \_\_\_\_\_

30 and 39? \_\_\_\_\_

40 and 49? \_\_\_\_\_

50 and 59? \_\_\_\_\_

60 or over? \_\_\_\_\_

## B. Seminar Series

As you know, we're interested in your evaluation of the University-Based Seminar Series of the Comprehensive Career Education Project. Here's a list of the seminar topics. (Hand R card 1)

B1. (HUSSON) How would you rank order the sessions in terms of their usefulness to you? (Interviewer record letter)

1. \_\_\_\_\_ (most useful) → 1a. What made this presentation especially effective?

2. \_\_\_\_\_

3. \_\_\_\_\_

4. \_\_\_\_\_ → 1b. In your view what made this presentation ineffective?

B1. (UMO) Which 2 sessions were most useful to you?

1. \_\_\_\_\_ (most useful) → 1a. What made this presentation especially effective?

2. \_\_\_\_\_

And which 2 were least useful?

3. \_\_\_\_\_

4. \_\_\_\_\_ (least useful) → 1b. In your view what made this presentation ineffective?

B2. Which topics, if any, should be deleted in future series? \_\_\_\_\_

B3. Are there any additional topics you feel should have been included? \_\_\_\_\_

B4. Was the series as a whole well suited for post-secondary educators?

1. YES

5. NO

8. DK

B5. How could this be improved? \_\_\_\_\_

B6. Did the sessions meet your needs?

1. YES

5. NO

8. DK

B7. What needs were best met?

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

B8. What needs weren't met?

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

B9. Did your attitude toward your professional role change as a result of the sessions?

1. YES

5. NO

8. DK

B10. How?

B11. Who or what had the greatest influence?

B12. Did you gain essential information from the sessions?

1. YES

5. NO

8. DK, Undecided

B13. In what areas and from whom?

Area

Person

B14. Did you gain any behavioral skills as a result of the workshops?

1. YES

5. NO

8. DK

B15. What skills, and from whom?

Skill

Person

B16. Did the seminar series generate any unexpected problems or "help" for you?

1. YES, problems

2. YES, help

3. YES, both

4. NO

8. DK

B17. What were these problems or help?

Problems

Helps

B18. As a result of the seminars are you now aware of any significant issues you weren't aware of before?

1. YES

5. NO

B19. What are they?

B20. Would you recommend this series to someone else?

1. YES

5. NO

B21. Why do you say this?

B22. Do you feel the sessions should be continued for others?

1. YES

5. NO

8. DK

B23. Why not?

B24. Did the seminar sessions constitute a well-integrated body of knowledge or did they seem too unrelated to each other?

1. Integrated

5. Unrelated

8. DK

B25. What overall "grade" would you give the sessions, excellent, good, fair, poor, or very poor?

1. EXCELLENT

2. GOOD

3. FAIR

4. POOR

5. VERY POOR

B26. Did your attitude toward career education become more positive, more negative, or stay unchanged as a result of attending the seminar series?

1. POSITIVE

3. UNCHANGED

5. NEGATIVE

8. DK

B27. In the future, should representatives of the business and labor community be included in the seminar series as participants, as speakers, as both participants and speakers or should they not be included?

1. PARTICIPANTS

3. SPEAKERS

5. BOTH

7. NEITHER

8. DK

B28. In the future should students, undergraduates and graduates, be invited to the sessions as interactors?

1. YES, UNDERGRADS

2. YES, GRADS

3. YES, BOTH

5. NO

8. DK

C. Consultants

C1. Do you think it would be worthwhile to have the consultants here for a longer time, perhaps having two sessions with each?

1. YES

5. NO

C2. Would participants benefit from more interaction or discussion with each consultant?

1. YES

5. NO

C3. Were the consultants sufficiently aware of, or sensitive to, local situations or problems?

1. YES

5. NO

C4. Was the balance between theory and practical knowledge about right or was there too much emphasis on one or the other?

1. TOO MUCH THEORY

3. ABOUT RIGHT

5. TOO MUCH PRACTICAL

8. DK

C5. Was it beneficial to bring in consultants or could local resource people be used more extensively?

1. CONSULTANTS

5. LOCAL PEOPLE

8. DK

C6. Did the presentors generally assume you already had more knowledge, less knowledge, or about as much knowledge as you really had?

1. MORE

3. AS MUCH

5. LESS

8. DK

D. Materials

D1. Did you read the seminar notebook materials which you received at the beginning of the series?

1. YES

5. NO

D2. About what percentage of the material did you read? \_\_\_\_\_%

D3. Why not? \_\_\_\_\_

(Go to D11).

(HAND R CARD 2)

Here are some statements about the materials. Would you say you strongly agree, agree, disagree, or strongly disagree with each?

D4. The materials are easy to understand; ideas are clearly communicated.

1. SA

2. A

3. UND

4. D

5. SD

D5. The materials seem difficult to use.

1. SA

2. A

3. UND

4. D

5. SD

D6. I think that using the materials would significantly improve my instruction.

1. SA

2. A

3. UND

4. D

5. SD

D7. I will probably use at least part of the materials.

1. SA

2. A

3. UND

4. D

5. SD

D8. The materials were not well coordinated with the seminar contents.

1. SA

2. A

3. UND

4. D

5. SD

D9. The materials were an important part of the seminar instruction.

1. SA

2. A

3. UND

4. D

5. SD

D10. Have you used the notebook material at all since the seminars?

1. YES

5. NO

D10a. What parts? \_\_\_\_\_

D11. The consultants also sometimes handed out materials. Did they contribute to the presenter's effectiveness? \_\_\_\_\_ally

1. YES

5. NO

8. DK

D12. Will the consultants' hand out materials be helpful to you for future reference?

1. YES

5. NO

8. DK

## E. Format

E1. Was the number of sessions too many, too few, or about right?

1. TOO MANY

3. ABOUT RIGHT

5. TOO FEW

E1a. How many more/less would you suggest? \_\_\_\_\_

E2. Were the sessions too long, too short, or about right?

1. TOO LONG

3. ABOUT RIGHT

5. TOO SHORT

E2a. How much longer/shorter would you suggest? \_\_\_\_\_

E3. How about the time interval between sessions? Too long, too short, or about right?

1. TOO LONG

3. ABOUT RIGHT

5. TOO SHORT

E3a. How much longer/shorter should it be? \_\_\_\_\_

E4. Would a second series of seminars be useful to follow-up or expand on the first series for the same participants?

1. YES

5. NO

8. DK

E5. Would it be beneficial to start earlier in the fall and finish by the end of the first semester so that the second semester could be used for infusion of the career education units?

1. YES

5. NO

8. DK

(HAND R CARD 3)

Here are some possible formats for workshops or seminar sessions. Would you recommend that each of these be used more, less, or about as they were?

	USE 1. MORE	ABOUT 3. RIGHT	USE 5. LESS
E6. Reading.....	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
E7. Lecture presentations.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E8. Discussion with lecturers.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E9. Panel presentation & interaction with panel.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E10. Role playing and discussion.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E11. Combination of small group & large group discussion.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E12. Practical exercises during sessions.....	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
E13. Development of career education units.....	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

USE  
1. MORE

ABOUT  
3. RIGHT

USE  
5. LESS

E14. Discussion of units developed by participants.....

☐☐☐

E15. Demonstrations.....

☐☐☐

E16. Field visits.....

☐☐☐

E17. Use of audio-visual materials.....

☐☐☐

F. Field Visit/Demonstration

(For HUSSON Rs use demonstration; for UMO use field visit)

F1. Did you find the field visit/demonstration a worthwhile element of the series?

1. YES

5. NO

8. DK

F2. Was the field visit/demonstration appropriate for your needs as a post-secondary educator?

1. YES

5. NO

8. DK

F3. (HUSSON) Would a field visit to the Bangor career education project be more informative than a demonstration?

1. YES

5. NO

8. DK

F4. (UMO) Would a demonstration by Bangor career education project participants be as informative as a field visit?

1. YES

5. NO

8. DK

F5. Was one demonstration/field visit enough, too little, or too much?

1. TOO LITTLE

3. ENOUGH

5. TOO MUCH

IF HUSSON R, GO TO OG1

F6. (UMO) Were you assigned to visit a teacher whose level or subject was appropriate to you?

1. YES

5. NO

F7. (UMO) Did the method of arranging field visits work smoothly?

1. YES

5. NO

F8. (UMO) Would a group discussion of the field visits be helpful after all visits are completed?

1. YES

5. NO

F9. (UMO) Should the field visit be tied more closely to the content of the pre-seminar sessions?

1. YES

5. NO

8. DK

G. Participant Motivation

G1. Why did you decide to become involved in the seminar series? \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

G2. Did the information you received ahead of time accurately describe the series?

☒ 1. YES

☐ 5. NO

G3. How was it inaccurate? \_\_\_\_\_  
 \_\_\_\_\_  
 \_\_\_\_\_

(HAND R CARD 4)

Which number best describes the importance of each factor in your decision to participate?

Very  
Important

Not at all  
Important

G4. Interest in the topic.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G5. Professional growth.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G6. The stipend.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G7. Publication of participants' units.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G8. Administrative pressure.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G9. Need for information.....	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5
G10. Other (Specify) _____	<input type="checkbox"/> 1	<input type="checkbox"/> 2	<input type="checkbox"/> 3	<input type="checkbox"/> 4	<input type="checkbox"/> 5

G11. Considering the requirements for the stipend was the amount too little, too much, or about right?

☐ 1. TOO LITTLE

☐ 3. ABOUT RIGHT

☐ 5. TOO MUCH

☐ 8. DK

G12. Would you have participated if there had been no stipend?

☐ 4. YES

☐ 5. NO

☐ 8. DK

H. Unit Development

H1. Did you find it difficult to prepare a career education related unit?

1. YES

5. NO

H2. How valuable an experience was writing the unit? Was it very useful, somewhat useful, or not useful?

1. VERY USEFUL

3. SOMEWHAT USEFUL

5. NOT USEFUL

8. DK

H3. How well did the seminar materials and sessions prepare you for writing the unit; very well, well, poorly, or very poorly?

1. VERY WELL

2. WELL

3. POORLY

4. VERY POORLY

H4. Were the comments you received about your unit constructive?

1. YES

5. NO

8. DK

I. Infusion of Career Education

I1. Have you used the unit you developed in your courses?

1. YES

5. NO

I2. Do you plan to?

1. YES

5. NO

(GO TO I9)

I3. Did you consider it very successful, somewhat successful, or unsuccessful?

1. VERY

3. SOMEWHAT

5. UN

8. DK

I4. Did you encounter any problems in using it?

1. YES

5. NO

I5. What were they?

I6. Did your students or colleagues evaluate the unit?

1. YES

5. NO

(GO TO I8)

I7. How was this done?

I8. What were the results?

I9. Have you written any additional units?

1. YES

5. NO

I10. Do you plan to?

1. YES

5. NO

8. DK

I11. Have you discussed the seminar ideas with your colleagues?

1. YES

5. NO

112. Have you read literature related to career education as a result of the sessions?

1. YES

5. NO

113. What have you read?

---



---



---

114. Was that helpful to you?

1. YES

5. NO


115. How often will you have opportunities to apply what you learned from the seminars, frequently, occasionally, rarely, or never?

1. FREQUENTLY

2. OCCASIONALLY

3. RARELY

4. NEVER

8. DK

116. Which ideas, materials, or skills, if any, do you use now as a result of attending the series?

---



---



---

117. In your opinion should career education have an expanded role in higher education?

1. YES

5. NO

THANK YOU FOR YOUR ASSISTANCE.

PRECODED DATA:

1. Sex: ☐ 1. MALE ☐ 5. FEMALE

2. Terminal degree:

☐ 1. BA/BS ☐ 2. MA/MS ☐ 3. CAS ☐ 4. Ph.D/Ed.D ☐ 5. Other \_\_\_\_\_

3. Professorial rank:

☐ 1. Instructor ☐ 2. Ass't. ☐ 3. Assoc. ☐ 4. Prof. ☐ 5. Other \_\_\_\_\_

4. Institution:

☐ 1. UMO ☐ 5. HUSSON

5. Number of sessions attended \_\_\_\_\_

## Appendix U

## Special Career Education Reading List

## Topic 1 - Foundations and Overview of Career Education

An Introduction to Career Education

Why We Need Career Education

Essential Concepts of Career Education

Statements of Position on Career Education

Career Education and Teacher Education

Straight Answers on Career Education

Business Office Occupations and Distributive Education:  
Keys to Career Education

Comprehensive Career Education Matrix

Career Education Development - by Elements or Themes

Career Education Learner Outcomes

Career Education and Counselor Education

Some Definitions of Career Education for Analysis and  
Discussion

Topic 2 - Self Development Techniques and Resources for  
Teacher Education Majors

Self Esteem Exercise

Education Alternatives

A Field Force Analysis of Career Goals

A Career Investigation Report

## Topic 3 - Curriculum Development Infusing Career Education

Infusion: North Dakota Style

A Course Syllabus for University Level Career Education

137  
University of Georgia, College of Education, Educational  
Psychology

Infusion/Secondary School

University of Maryland Presentation

Topic 4 - Models for Higher Education

The North Dakota Model

The University of Georgia Model

College of Education, U.M.O. - Options for Teacher  
Education.

Education Awareness Chart

Career Awareness Program

Sample Business Information Blurb

Integrating Career Education into Teacher Preparation

Topic 5 - Career Planning: Skill Development

Ways of Looking at Vocational Choice and Development

Career Education Occupational Clusters

Observations of the Work Milieu

5 Year Career Plan

Suggested Career Planning Exercise

A Career Interview Guide

## Appendix V

Comprehensive Career Education Project  
1976-77

## University Based Seminar Series

Evaluation FormPart I

Read each statement carefully and decide how you feel about it. You will agree with some statements and disagree with others. There are five possible answers to each statement. The "undecided" answer should be used only when you have no opinion. You are to mark your answers on the answer sheet (IBM 556) accompanying this evaluation form. Blacken the space on the answer sheet corresponding to the distractor that best represents your feelings. For example, if you choose the distractor "agree" you would blacken between the lines in the column headed "2".

1  
Strongly  
Agree

2  
Agree

3  
Undecided

4  
Disagree

5  
Strongly  
Disagree

1. The objective of this seminar series were clear to me. . . . .
2. Specific goals and planning made it easy to work efficiently . . . . .
3. I did not learn anything new . . . . .
4. The material presented was valuable to me. . . . .
5. I was stimulated to think about the topics presented . . . . .
6. We worked well together as a group. . . . .
7. I did not have an opportunity to express my ideas. . . . .
8. My time was well spent . . . . .
9. The seminar series met my expectations . . . . .
10. The content presented was applicable to the implementation of Career Education at the post-secondary level . . . . .

## Part II

Think about the seminar series and respond to the following semantic differential. Use the same answer sheet and blacken the space that corresponds to the distractor that best represents your feelings.

	1	2	3	4	5	6	7	
	Very	Quite	Some- What	Neither or Both	Some- What	Quite	Very	
11. Respectable	_____	_____	_____	_____	_____	_____	_____	Disrespectable
12. Purposeful	_____	_____	_____	_____	_____	_____	_____	Aimless
13. Practical	_____	_____	_____	_____	_____	_____	_____	Impractical
14. Interesting	_____	_____	_____	_____	_____	_____	_____	Boring
15. Realistic	_____	_____	_____	_____	_____	_____	_____	Unrealistic
16. Important	_____	_____	_____	_____	_____	_____	_____	Unimportant
17. Harmful	_____	_____	_____	_____	_____	_____	_____	Helpful
18. Meaningless	_____	_____	_____	_____	_____	_____	_____	Meaningful
19. Profitable	_____	_____	_____	_____	_____	_____	_____	Unprofitable
20. Worthless	_____	_____	_____	_____	_____	_____	_____	Valuable

Part III

Please respond to the following items, using the space provided.

1. In your opinion, what were the major strengths of this seminar series?

2. In your opinion, what were the major weaknesses of this seminar series?

3. If the seminar series is to be continued, what materials, speakers or other relevant activities should be added which were not a part of the current series?

This Evaluation form was adapted from:

Even, Brenda R. Integrating Career Education into Teacher Preparation  
Implementing Guide for College/University Use. U.S. Government Printing  
Office, Washington: 1976.

## Appendix W

Career Education Knowledge Test  
(fourth revision)

## PART I MULTIPLE CHOICE QUESTIONS

INSTRUCTIONS

This part of the Inventory consists of 30 objective questions. For each of the questions, you are to choose the best answer, and using your pencil, blacken the corresponding space on the answer sheet. If you do not have an answer for a question, DO NOT GUESS, simply leave the answer space blank and go on to the next question.

## EXAMPLE:

## Question:

1. Business Law is a course which belongs to one of the following academic disciplines:
- A) Social Sciences
  - B) Education
  - C) Behavioral Sciences
  - D) Business Administration

## Answer:

1.    A       B       C       D  
      ☐    ☐    ☐    ☒

Business Law, belongs to the Business Administration discipline and you would respond by blackening the fourth answer space on the answer sheet.

1.    C       A       B       C       D  
      ☐    ☐    ☐    ☐    ☒

REMINDERS

Use only the answer sheet provided.

DO NOT GUESS - if you don't have an answer, leave the answer sheet blank and go on to the next one.

Use only a pencil.

Prepared by C. W. Ryan, J. M. Sutton, Jr., R. J. Drummond and V. L. Burgess,  
 Comprehensive Career Education Project, College of Education, UMO, June, 1977.

1. Career Education is:
  - a) a new concept designed to prepare students for work in a technological society.
  - b) a program of vocational instruction for all levels of education.
  - c) a concept consisting of all activities and experiences through which individuals are prepared for life and work.
  - d) all of the above.
2. Which of the following is the least important phase in a career education based teacher education program.
  - a) career exploration
  - b) self development
  - c) career awareness
  - d) skill development
3. Economic awareness is:
  - a) an element of career education which has received much attention throughout high school, but is lacking at the elementary level.
  - b) an element of career education which most high school graduates have achieved at a 5th grade level of competence.
  - c) an element of career education which becomes applicable when the student reaches the college of university level.
  - d) not an element of career education.
4. The relationship of career education to vocational education is that:
  - a) they are two names for the same process.
  - b) career education includes vocational education.
  - c) vocational education is incompatible with career education.
  - d) vocational education includes career education.
5. Which of the following is true of career education?
  - a) its concepts are effective motivators for students
  - b) its goal is for individuals to decide upon one's vocation
  - c) its major emphasis is on rewarding cognitive ability.
  - d) all of the above
6. According to a survey of campus residential students:
  - a) college students acknowledged no need for career education at present.
  - b) college students desired help with career planning and received none.
  - c) college students desired help with career planning and received this assistance from professors.
  - d) college students acknowledged the desire to postpone career planning until their senior year.

7. A career education based teacher education model should be:
- a) based on a career development model.
  - b) oriented to include field experiences.
  - c) flexible to accommodate individual programs.
  - d) all of the above.
8. Kenneth Hoyt has remarked that the real "desert in career education" is at the:
- a) elementary school level (K-6).
  - b) junior high school level (7-9).
  - c) secondary school level (9-12).
  - d) higher education (post secondary).
9. Which of the following is not a central issue in career development in higher education?
- a) helping students form work values
  - b) overcoming inequality of career opportunity
  - c) writing career related curriculum materials
  - d) developing transferable academic skills
10. Which of the following would not be an essential element of career education at the elementary school level (K-6)?
- a) developing a positive self-concept
  - b) developing a community action plan
  - c) developing work attitudes and worker discipline
  - d) developing a career plan
11. The basic career education element which helps students understand the role of business and industry is:
- a) employability skills.
  - b) economic awareness.
  - c) beginning competencies.
  - d) career awareness.
12. Classroom activities for the elementary school student based on the finding of Piaget fall under the career education element of:
- a) attitudes and appreciations.
  - b) beginning competencies.
  - c) self-awareness.
  - d) decision-making.
13. Self social fulfillment or an active and satisfying work role is the outcome sought from the career education element called:
- a) appreciations and attitudes.
  - b) decision-making.
  - c) economic awareness.
  - d) self-awareness.

14. Which of the following is not a functional definition of career education?

- a) a program infused into the existing curriculum
- b) a program of discrete career education curriculum blocks
- c) a cooperative educational venture involving school, home, and community
- d) a comprehensive educational program which focuses on careers.

15. A career education based teacher education model is primarily directed toward the:

- a) teacher educator.
- b) student teacher.
- c) public school teacher.
- d) all of the above.

16. The following offers a strong argument for career education:

- a) academic standards are affected by such a program.
- b) schools and politics don't mix.
- c) vocational education is a low status curriculum.
- d) many of today's students feel unneeded by our technological society.

17. At seventh to ninth grade levels, career education emphasizes:

- a) career exploration.
- b) career awareness.
- c) career preparation.
- d) all of the above.

18. The personality theory of career development states that a person naturally moves toward occupations which:

- a) satisfy his needs.
- b) his parents approve of.
- c) he is most often exposed to.
- d) he unconsciously likes.

19. The strength of a comprehensive career education program that uses a decentralized approach is:

- a) singular focus.
- b) diversity of values.
- c) central control.
- d) shared planning.
- e) all of the above..

20. Which of the following is not included in the rationale for using the instructional unit approach to career education:
- a) career education should be reflected in the curriculum at all grade levels.
  - b) career education should be infused into all discipline areas.
  - c) career education units should follow the same approach that students are accustomed to.
  - d) career education should involve the instructional staff since they are closest to the students.
21. Curriculum units containing primarily career development goals and supportive contents:
- a) can be used independently of a subject area.
  - b) can be used with any discipline area preferred.
  - c) are called career development units.
  - d) all of the above.
22. One role of the teacher in helping the student develop employability skills is to help bridge the gap between:
- a) school and job.
  - b) school and home.
  - c) job skills and job.
  - d) all of the above.
23. At the tenth through twelfth grade levels, career education emphasizes:
- a) career exploration.
  - b) career awareness.
  - c) career preparation.
  - d) all of the above.
24. Infusion into the academic curriculum is aimed specifically at:
- a) encouraging the use of off-campus professionals in the classroom.
  - b) influencing student groups to promote career related programs.
  - c) influencing curriculum to show relevance to careers.
  - d) encouraging learning experiences in off-campus settings for students.
  - e) all of the above.
25. Which of the following societal changes have provided impetus for career education in the last ten years?
- a) family living patterns have changed
  - b) education has extended beyond completion of high school
  - c) young people have reduced contact with adults or community agencies
  - d) all of the above

26. Which of the following would be the most logical procedure for a post-secondary institution desiring to implement a program of career education:
- a) inventory and marshal all available resources.
  - b) study the career education program most appropriate for your community.
  - c) seek cooperation from community organizations, institutions, and individuals.
  - d) develop an understanding of the concepts of career education.
27. The purpose of an outreach program in career education would be to:
- a) overcome the tendency for campus/community isolation.
  - b) develop closer connections with the business community.
  - c) provide for a job shadow program.
  - d) implement a community speaker pool.
  - e) all of the above.
28. Which group has been least critical of career education?
- a) students
  - b) employers/business
  - c) faculty
  - d) government
29. Analysis of sex role stereotyping in career education is most important in:
- a) creating career decisions.
  - b) providing career options.
  - c) reducing career discrimination.
  - d) all of the above.
30. Career education on the campus will be most influenced by:
- a) administrative policy.
  - b) student personnel staff.
  - c) professor acceptance and adoption.
  - d) student demands.

## PART II CONFIDENCE WEIGHTED TRUE-FALSE QUESTIONS

INSTRUCTIONS

This part of the Inventory consists of 30 objective questions. For each of the questions, you are to choose the best answer, and using your pencil, blacken the corresponding space on the answer sheet. If you do not have an answer for a question, DO NOT GUESS, simply blacken the space on the answer sheet which corresponds with "I have no reason to respond."

## EXAMPLE:

## Question

1. Business Law is a course which belongs to the academic discipline of Business Administration.

- a) this statement is probably true
- b) this statement is possibly true
- c) I have no reason to respond
- d) this statement is possibly false
- e) this statement is probably false

## Answer:

A B C D E

1. ☐ ☐ ☐ ☐ ☐

Business Law belongs to the Business Administration discipline, therefore, you would respond by blackening either the first or second space on the answer sheet, according to how certain you are concerning the correctness of your response.

A B C D E

1. ☒ ☐ ☐ ☐ ☐

Remember - if you don't have an answer to a question, blacken the third space, corresponding to "I have no reason to respond."

REMINDERS

DO NOT GUESS - if you don't have the answer, blacken the third space which corresponds with "I have no reason to respond."

- a) this statement is probably true
- b) this statement is possibly true
- c) I have no reason to respond
- d) this statement is possibly false
- e) this statement is probably false

- 31. "Appreciations and Attitudes" is one of the eight career education elements.
- 32. Career education represents a call for massive educational reform.
- 33. Career education as a concept, is primarily concerned with the period of formal education from kindergarten through grade twelve.
- 34. One of the basic outcomes of career education is that most individuals reach a minimal competency level in basic academic skills.
- 35. In the long run, implementation of career education programs will be more costly in terms of tax dollars than present systems.
- 36. Career education is an outgrowth of the vocational education movement.
- 37. Career education attempts to bring about educational reform by proposing changes in basic American educational concepts.
- 38. The major role that the community plays in the career education model is providing real work experiences.
- 39. Career education offers a promising response to the dropout/failure rate among college students.
- 40. Career education tends to favor whites and work against the racial minorities where the work ethic is not as strong.
- 41. Within the career education concept, a major task of the public school system is to act as a feeder of skilled workers into the work force.
- 42. Career education has not received serious attention by faculty members in our teacher education institutions.
- 43. Career education has been well accepted by the public school systems in America with over one-third having initiated some type of career education program.
- 44. Self-awareness, career development, and decision-making are elements that are not applicable to all phases of a career education based teacher education program.
- 45. The primary focus of career education is on those individuals who seek educational and employment experiences below the baccalaureate degree level.
- 46. One of the major advantages of career education is that it can be taught as a separate subject so as not to interfere with the basic academic program.

- a) this statement is probably true
- b) this statement is possibly true
- c) I have no reason to respond
- d) this statement is possibly false
- e) this statement is probably false

- 47. Field force analysis is a method of setting and modifying career plans.
- 48. Career education in the secondary school should help students assess themselves.
- 49. Job placement has been defined as a shared responsibility between the university and the student with the burden of that responsibility being assumed by the student.
- 50. Career education in the secondary school should explain cultural and environmental influences on personal need satisfaction.
- 51. Career education would have most junior high students planning for specific occupations.
- 52. In high school, students should begin to relate career interests to capacities and values.
- 53. In elementary school, students should explore career interests.
- 54. One method of infusing career education into any classroom is through an academic or learning contract.
- 55. Super's theory of career choice is developmental in nature.
- 56. Holland has identified six major personal orientations that relate to individual life style and occupational clusters.
- 57. The major purpose of a job interview is to decide on a candidate's qualifications for a position.
- 58. In any job interview it is important to bring out likes and dislikes.
- 59. Career education is not limited to formal school programs.
- 60. Teacher education based career education has two major premises: career development of the student teacher and the development of the student teacher as a career educator.

## Appendix X

Comprehensive Career Education Project  
1976-77

## University Based Seminar Series

Evaluation FormPart I

Read each statement carefully and decide how you feel about it. You will agree with some statements and disagree with others. There are five possible answers to each statement. The "undecided" answer should be used only when you have no opinion. You are to mark your answers on the answer sheet (IBM 509) accompanying this evaluation form. Blacken the space on the answer sheet corresponding to the distractor that best represents your feelings. For example, if you choose the distractor "agree" you would blacken between the lines in the the column headed "2".

1	2	3	4	5
Strongly	Agree	Undecided	Disagree	Strongly
Agree				Disagree

1. The objective of this seminar series were clear to me. . . . .
2. Specific goals and planning made it easy to work efficiently . . . . .
3. I did not learn anything new . . . . .
4. The material presented was valuable to me. . . . .
5. I was stimulated to think about the topics presented . . . . .
6. We worked well together as a group . . . . .
7. I did not have an opportunity to express my ideas. . . . .
8. My time was well spent . . . . .
9. The seminar series met my expectations . . . . .
10. The content presented was applicable to the implementation of Career Education at the post-secondary level . . . . .

## PART II

Rate the overall quality of the individual areas of the seminar as compared to typical professional development seminars you have attended by circling the appropriate rating for each of the following items. Space is provided for further comments and to make future recommendations on each of the items. Use the same answer sheet and blacken the space that corresponds to the distractor that best represents your feelings.

	<u>quality</u>				
	Poor	Fair	Average	Good	Out- standing
11. Pre-seminar information.	1	2	3	4	5
Comments and/or future recommendations:					
12. Meeting facilities.	1	2	3	4	5
Comments and/or future recommendations:					
13. Choice of seminar topics.	1	2	3	4	5
Comments and/or future recommendations:					
14. Choice of presenters.	1	2	3	4	5
Comments and/or future recommendations:					

- |  | Poor | Fair | Average | Good | Out-<br>standing |
|--|------|------|---------|------|------------------|
| 15. Seminar schedule (i.e., length and arrangement of seminar activities). | 1    | 2    | 3       | 4    | 5                |

Comments and/or future recommendations:

/

- |                    |   |   |   |   |   |
|--------------------|---|---|---|---|---|
| 16. Seminar staff. | 1 | 2 | 3 | 4 | 5 |
|--------------------|---|---|---|---|---|

Comments and/or future recommendations:

2

- |   |   |   |   |   |   |
|---|---|---|---|---|---|
| 17. Overall effectiveness of presentations. | 1 | 2 | 3 | 4 | 5 |
|---|---|---|---|---|---|

Comments and/or future recommendations:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 18. Overall usefulness of information presented. | 1 | 2 | 3 | 4 | 5 |
|--|---|---|---|---|---|

Comments and/or future recommendations:

- |  |   |   |   |   |   |
|--|---|---|---|---|---|
| 19. Opportunities for informal interaction and exchange. | 1 | 2 | 3 | 4 | 5 |
|--|---|---|---|---|---|

Comments and/or future recommendations:

	Poor	Fair	Average	Good	Out- standing
20. Seminar as a whole.	1	2	3	4	5

Comments and/or future  
recommendations:

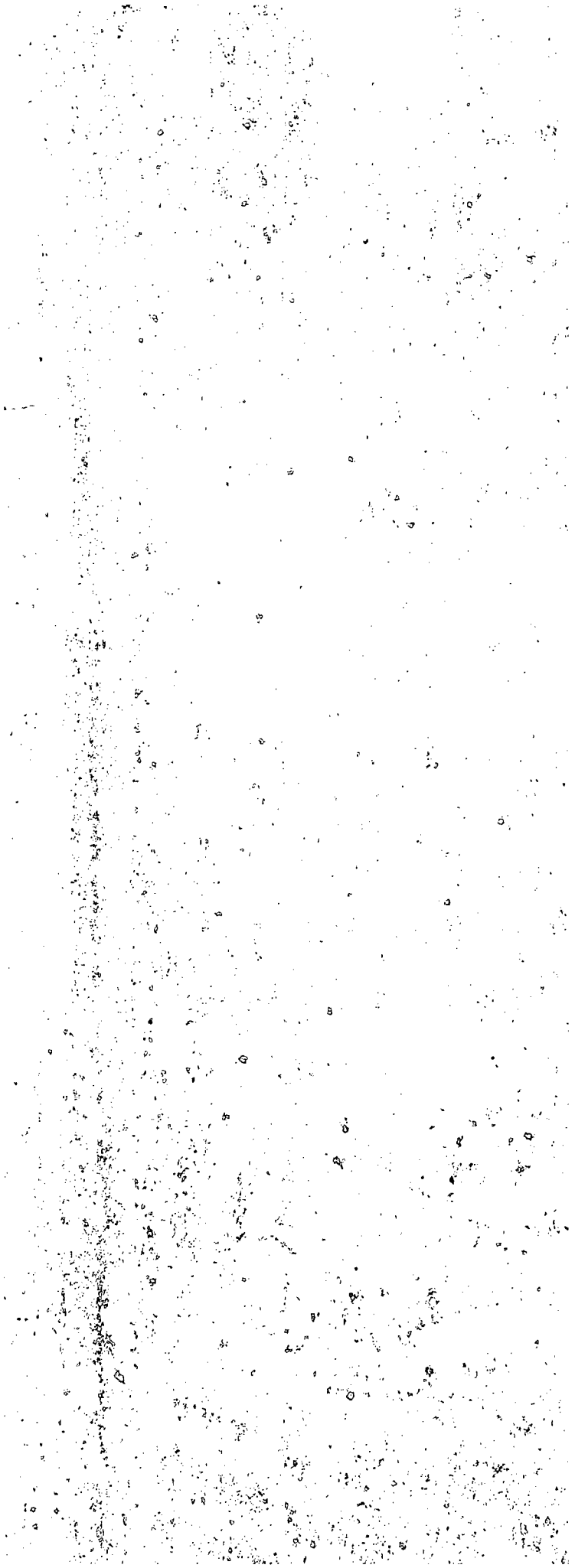
21. Usefulness of notebook materials (respond only if you read this material).	1	2	3	4	5
--	---	---	---	---	---

Comments and/or future  
recommendations:

22. Usefulness of site visit.	1	2	3	4	5
-------------------------------	---	---	---	---	---

Comments and/or future  
recommendations:

---



### PART III

Please respond to the following items, using the space provided.

1. In your opinion, what were the major strengths of this seminar series?
2. In your opinion, what were the major weaknesses of this seminar series?
3. If the seminar series is to be continued, what materials, speakers of other relevant activities should be added which were not a part of the current series?

Part I and Part II of this Evaluation form were adapted from:  
Even, Brenda, R. Integrating Career Education into Teacher Preparation  
Implementing Guide for College/University use. U.S. Government Printing  
Office, Washington: 1976.

## E. Facilities Available:

## Social Science Research Institute

The Social Science Research Institute at the University of Maine was founded in 1973. The Institute serves as a resource for scholars, government agencies, businesses and citizens of the State of Maine. Since its inception, the SSRI has undertaken a sizeable number of studies in various disciplines; a majority have involved some sort of survey research. In addition, the Institute also collects and archives a wide variety of social and economic data. Included below is a sample of funded projects which have been or are in the process of being completed by the Institute:

- Diffusion of Innovation: A Longitudinal Study
- The economic Impact of Acadia National Park on Mount Desert Island
- The Energy Vulnerability of Maine Industries
- Status and Needs of Maine's Elderly
- Determinants of Trends in the Maine Primary Election
- An evaluation of Attitudes Toward the Eastport Oil Refinery

A partial list of Institute project sponsors includes the following:

- National Science Foundation
- New England Regional Commission
- Maine Department of Transportation
- State Planning Office of Maine
- Merrill Trust Company

The Institute has capabilities for developing research proposals, budgeting, survey design, field work (personal, telephone, and mailed), computer analysis and preparation of final reports. The SSRI personnel have conducted statewide random personal interview surveys and personal interview surveys of elites with both state and national samples. They have also conducted many telephone surveys statewide and in smaller regions of the state. The Institute has also conducted mail surveys with samples as large as 7,000. Mail survey capabilities include the sending of personalized cover letters and follow-up letters to all respondents.

SSRI can provide the following services and available data bases:

## Services

1. Analysis
2. Custom Programming
3. Efficient utilization of existing packages  
SPSS  
GPSS, etc, and utilities prepared by CAPS and SSRI
4. Quality controlled,  
coding, keypunching, and verifying

## Data Availability

1. From in-house projects
2. 1970 census
3. Midas and consortium files on request

In addition, the SSRI maintains a computer terminal with access to the University of Maine computer center and also has an IBM Model 29a Key punch at its facility.

