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**ABSTRACT**

The guide was developed by the coordinating teachers of the Developmental Vocational Education Program for the junior high school level in the Model Cities area of Cleveland, Ohio. The purpose of the guide is to strengthen the students' ability to select and acquire a positive attitude toward work, toward all levels of occupational choices found in society, and toward themselves. To these ends, the junior high school students are to learn the functional interrelationships between the production, management, and service areas of business and industry. Students also sample the operations and skills required in a number of occupations through work-site tours and experience. All seventh grade students are to participate in the program. Participation in grades 8 and 9 is optional. The Office of Education's division of fifteen occupational clusters is to be integrated into all junior high school classes. A conceptual approach is used, listing specific behavioral objectives. Vocabulary lists, learning experiences, desired outcomes, and instructional and resource materials are specified. Each unit coordinates subject area, grade level, and occupational cluster. An appendix of related materials and a four-page annotated bibliography are included. (AG)

**CAREER DEVELOPMENT CURRICULUM GUIDE**

1970 - 1973

**JUNIOR HIGH**

**Seventh thru Ninth Grades**

**DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM**

**(DVEP)**

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**CLEVELAND PUBLIC SCHOOLS**

**CLEVELAND, OHIO**

**1973**

**Creating Bridges Between School and Earning a Living**

ED 089114

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1973

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"Strong claims are being made for career education's efficacy. To the extent that the concepts are not untried, there is already evidence in experiment and demonstration. But given the high mortality rate of panaceas in recent times, it is wise to leave room for uncertainty: Some of it may not work because of being improperly done. In such a broad concept some applications are likely to be unsuccessful. But the experiment is sufficient to promote reasonably high success probabilities to major aspects of the notion where they are carefully thought through and well administered".<sup>1</sup>

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<sup>1</sup>Kenneth B. Hoyt, Rupert N. Evans, Edward F. Mackin, and Garth L. Mangun, "Career Education: What It Is," Career Education-What it is and how to do it. Salt Lake City, Utah: Olympus Publishing Company, 1972, p. 16.

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FOREWORD

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A new emphasis is being placed on the development of technical-vocational programs in the Cleveland Public Schools in line with our goal of providing quality education to all Cleveland children.

A reevaluation of programs is being made, existing programs are being upgraded, and new programs are being offered.

This "five to twelve" Career Development Curriculum Guide outlines the Cleveland program of training in Career Education.

Paul W. Briggs  
Superintendent of Schools

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PREFACE

This curriculum guide has been developed by the co-ordinating teachers of the Developmental Vocational Education Program which is funded under Part D of the Vocational Education Amendments of 1968. This program is being administered and implemented by the Cleveland Board of Education in cooperation with the Model Cities Association of Cleveland.

The material and information that is needed to implement this program has been gathered by the Co-ordinating Teachers and Vocational Aides from the local business world.

## STATEMENT

This Exemplary Project in Vocational Education is conducted under Part D of the Vocational Education Amendments of 1968, P.L. 90-576.

The schools in the Model Cities area in Cleveland, Ohio are presently bounded by East 55th on the West, East 79th on the East, Superior Avenue on the North, and Kingsbury Run on the South. This amendment was designed to assist the cities in raising the standards of living for those locked into the target areas of selected cities.

During the summer of 1972, approximately sixty classroom teachers, department chairmen and guidance counselors prepared curricula materials and selected visual aids that formed the nuclei for this Career Development Curriculum Guide.

The purpose of this guide is to strengthen the students' ability to select and acquire a positive attitude toward work, toward all levels of occupational choices found in society, and toward themselves as prospective employees and their employers.

The results of these individuals during the summer of 1972, warrants our thanks and appreciation.

William I. Sims  
Project Director  
Developmental Vocational Education-  
Program

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## TABLE OF CONTENTS

	Page
Junior High School Career Development Units.....	142 - 312
English .....	145 - 155
Social Studies .....	156 - 171
Mathematics .....	172 - 201
Science .....	202 - 213
Typing .....	214 - 219
Home Economics.....	220 - 237
Industrial Arts.....	238 - 260
Art .....	261 - 282
Music.....	283 - 294
Physical Education.....	295 - 312
Appendixes.....	526 - 554
Materials Available at DVEP Office .....	527 - 533
DVEP Visual Aids Description.....	534 - 539
Student Office Tours.....	540 - 543
DVEP Career Pyramids.....	544 - 551
Career Wheels (Newspaper, radio, Television).....	552 - 554
Bibliography.....	555 - 558

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**PHILOSOPHY**

**Cleveland Public Schools**

It is through education that a society not only transmits to individuals, but also reinforces for them, the values, skills, understandings, and standards of behavior through which society renews and repairs itself.

The responsibility for education is properly viewed as a partnership featuring a complementary and supplementary relationship among such agencies as organized religion, social and welfare agencies, cultural institutions, governmental agencies, and mass media as well as the schools. All these agencies support the family as the basic unit of personal and social development.

In a democratic society the school should create an environment in which young people will receive an integrated view of their culture, come to accept the basic assumptions of democratic behavior, and acquire a body of common knowledge essential for effective citizenship.

**PHILOSOPHY**

**Developmental Vocational Education**

Through the concept of career education all educational experiences, curriculum instruction, and counseling should be geared to preparation for economic independence and an appreciation for the dignity of work.

DVEP embodies the main thrust of career education, that is, to prepare all students for a successful life of work by increasing their options

for occupational choice, by eliminating barriers, real and imagined,  
to attaining job skills, and by enhancing learning achievement in all  
subject areas and at all levels of education.

## PROGRAM DESCRIPTION AND OBJECTIVES

In cooperation with the Model Cities, the overall goal of the DVEP project is to create a bridge between school and earning a living.

This is done through a career development program beginning in elementary school and continuing through high school. It provides students with a broad base of vocational information and exploratory experiences on which to base career decisions, with skill training to enable them to secure employment or undertake future training in the field of their choice and with actual job placement. Thus, the program is designed to increase options for making occupational decisions; to eliminate real and imagined barriers to attaining job skills; and to enhance learning achievement in all subject areas and at all levels of education for the youth in high poverty Model Cities area schools.

The program is developmental in nature and pyramidal in design. It begins with a broad informational/organizational approach at the elementary level, and is narrowed to an exploratory/preparational approach at the senior high level. Such an approach is designed to put the student at each level in a position to make informed decisions as to the next step in his career development and successively narrow his vocational preference.

Beginning at the upper elementary school level, students in grade five and six acquire reliable and valid information on the broad range of available occupations and their requirements.

The program is worked in conjunction with the Social Studies classes. The emphasis is on occupational clusters rather than on specific jobs, including future occupational areas which are expected to emerge as a result of new technology. The students are to become oriented to the world of work through multi-faceted experiences including field trips, work simulation games, and role playing, and are to obtain experience in basic job skill operations.

At the junior high school level, the orientational-explorational aspect of the program involves learning the functional interrelationships between the production, management, and the service areas of business and industry. Students also sample the operations and skills required in a number of occupations through work-site tours and experience.

Finally, at the senior high level the program orientation is toward exploration and preparation for actual job placement beyond school. Students move from exploratory experiences in a number of occupational areas to intensive training in one skill area of their choice. High school students get on the job experience in work study programs.

## PROGRAM DESCRIPTION AND OBJECTIVES

### I. Specific Objectives For The Teacher

- A. To assist students in identifying a variety of jobs in the 15 occupational clusters (elementary school level).
- B. To cause an awareness through a description of various occupations (elementary school level).
- C. To teach and demonstrate the relationship between specific vocational activities and "real" occupations (junior high school level).
- D. To increase knowledge and functional interrelationships between management, production and service areas of business and industry (junior high school level)
- E. To foster positive attitudes toward self, others, and the world of work (senior high school level).

### II. Specific Outcome Objectives For Students

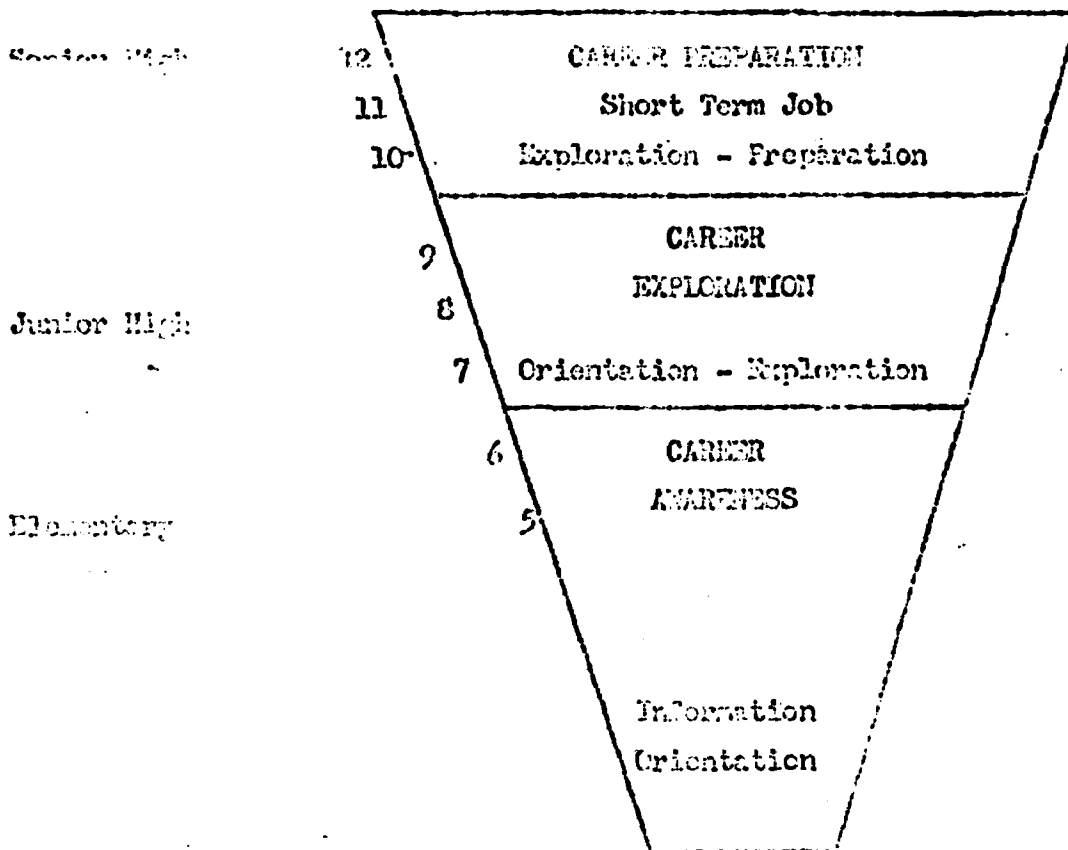
- A. Increased ability to identify and describe a variety of occupations in a broad array of occupational areas (elementary school level).
- B. Increased knowledge of equipment used in various occupations and their utility (elementary school level).
- C. Increased knowledge of the operations of a functional interrelationship between management, production and service areas of business and industry (junior high school level).
- D. Increased ability to describe the relationship between specific vocational activities and "real" occupations (junior high school level).
- E. Increased positive attitudes toward vocational education (senior high school level).

## INTRODUCTION

The Model Cities Developmental Vocational Education Program is directed toward serving the occupational needs and aspirations of those youths in the Cleveland Model Cities area. This vocational education project embraces four basic components:

1. An informational-orientation program at the elementary school.
2. An orientational-exploratory component at the junior high school level.
3. An exploratory-preparational phase at the senior high school level.
4. An extensive short term job program.

The figure below illustrates a clearer picture of the above mentioned components:



## INSTRUCTIONS FOR USE OF THIS GUIDE

All units in this guide have been developed around the fifteen occupational clusters as have been identified by the United States Office of Education's Bureau of Adult, Vocational and Technical Education.

The Developmental Vocational Education Program has made a concentrated effort to assist Model Cities area disadvantaged and handicapped youth who have been turned off by education. Since it is probable that many of these inner city youth will never leave the city of Cleveland, it becomes necessary to make these individuals aware of the many career opportunities available in other areas in general and the City of Cleveland in particular.

The various materials in the elementary section of this guide are designed for injection in the various fifth and sixth grade social studies units presently used in the schools participating in this program. Obviously use of all of the occupational clusters is not possible in any one social studies unit, nor are all of the social studies units equally amenable to use of all of the clusters. Certain clusters complement and enhance certain units better than others.

In using this guide, the elementary social studies teacher will have to decide which cluster to use in any given unit on the basis of how well the cluster will integrate with said unit, and the interests and aptitudes of his/her students. The use of the guide necessitates the use of teacher creativity and discretion in its implementation.

The time allotted to cover a regular social studies unit varies from two to six weeks. In scheduling the time allotted for the "cluster" material, the teacher may find that a certain cluster can best be presented in one or two sessions; another cluster may be enhanced by injection bit by bit at various stages in the teacher's regular social studies schedule.

At the elementary level, the conceptual approach, followed by a list of specific behavioral objectives is used. To augment this, vocabulary lists, learning experiences, desired outcomes, and instructional and resource materials are listed. Preceding each unit is a brief general discussion related to the cluster under consideration. In most cases a pre test and a post test is used at some point during the presentation of each occupational cluster; however, teachers are encouraged to be creative and use their own initiative in developing varied means of generating interest and enthusiasm for the subject.

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On the secondary level, each unit is preceded by a list of general objectives, followed by specific behavioral objectives. General discussions, information and study sheets, and in some cases pre tests and post tests are provided for the majority of the units in the secondary section. In many instances, answers are provided for pre tests and post-tests. On occasions where answers are not given, it is suggested that teachers refer to their basal and supplementary textbooks used in the classroom, and the array of occupational resources available in the school's career library and guidance office. At all levels, instructional and resource materials (films, slides, tapes, books, pamphlets, etc.) are indicated and available in either the school, the DSEP office, or the Audio-Visual Services office provided by the Cleveland Board of Education.

The teacher, vocational aide, or any other resource person is not expected to use all of the learning activities listed or to achieve all of the objectives and goals listed in any one setting; only those which are applicable and appropriate should be used for a particular class. However, the teacher is encouraged to use his/her own objectives if he/she feels the need to do so.

In summary, for each unit in this curriculum guide, an effort has been made to supply the teacher with as much information as possible, such as lists of films, tapes, and videotapes, contact points for speakers and field trips etc.. Teachers are also encouraged to call upon the school guidance staff, the librarian, and any other qualified school and/or community resource who may be more effective in aiding the students in developing more positive attitudes toward self, others, school and the world of work.

## OUTLINE OF PROCEDURES

### A. Elementary (Informational -- Orientation Component)

1. Involve or inject the 15 occupational clusters into fifth and sixth grade social studies.
2. Relate occupational areas to the subject matter.
3. Emphasize occupational areas rather than specific jobs.
4. Introduce future occupational areas.
5. Develop appropriate classroom activities:
  - a. role playing
  - b. simulated games
  - c. time organization problems
6. Secure films, slides and other visual aids for reinforcement.
7. Secure speakers for informational purposes.
8. Organize field trips:
  - a. local companies and businesses
  - b. junior high and senior high school vocational education facilities.

### B. Junior High (Orientational -- Exploratory Component)

1. Inject the 15 occupational clusters into all junior high classes. (all classes and subject areas are involved)
2. Relate the full range of occupational requirements, opportunities and advantages.
3. Establish a model industrial system:
  - a. management
  - b. production
    1. production line
  - c. service components
    1. related concepts to actual operations
    2. managing the production
  - d. business office
    1. planning the production
    2. managing the production
  - e. each student to have equal time in every department

4. Arrange field trips to local business and industrial work sites.
  - a. Time spent by students talking with employees in different areas:
    1. get a feel of actual duties performed
    2. working conditions
    3. wages
    4. job requirements
    5. advantages of the occupation
5. Encourage student reactions to the field trips.
  - a. Individual counseling sessions
    1. discuss reactions to field trip
    2. discuss and relate roles students play in the model industrial system (Vocational course of study will be an elective at grades eight and nine).
  - b. Self-evaluation
    1. analyzing own abilities
    2. aptitudes
    3. interests in future employment possibilities
6. Provide special instruction and experiences in narrower work areas.
  - a. Build competence in a number of skill areas
    1. woodwork
    2. mechanical drawing
    3. printing
    4. metal shop
    5. typing
    6. home economics
7. Instruct and teach by direction.
  - a. Junior high students instruct elementary school pupils
    1. tools
    2. machinery
    3. shops
    4. operations
8. Establish a career information center
  - a. books
  - b. pamphlets
  - c. brochures
  - d. films
  - e. filmstrips

## C. High School (Exploratory-Preparational Component)

### 1. Establish a Career Information Center

- a. information on job opportunities
- b. post graduate training program
- c. job requirements
- d. career planning

### 2. Counsel for career and occupational choices

- a. students analyze their interest
- b. aptitudes
- c. abilities
- d. discuss the next step in career development
- e. select a small area to work in for one year
  1. visit work sites
    - a. observe operations involved in related occupations
    - b. demonstration by tradesmen

### 3. Selection of one major occupational skill by student

- a. intensive training
- b. continue to make work-site visits
- c. observe and talk to the advanced students in the program (work and study)
- d. enter work-study program ( $\frac{1}{2}$  day school --  $\frac{1}{2}$  day work)
  1. earn money
  2. put training to use in real work situation

### 4. Plan for post graduation

- a. finding a job
  1. employment office
  2. work orientation teacher
  3. high school vocational counselor
  4. newspapers
- b. furthering vocational training (Cleveland Board of Education)
  1. Max S. Hayes
    - a. for males
    - b. know specific industrial career he wants to train for
  2. Jane Addams High School
    - a. for females
    - b. know specific industrial career she wants to train for

3. Martin Luther King High School

- a. for males
- b. vocational training for interested and qualified students
- c. high school diploma
- d. academic instruction geared toward related occupational goals

## OCCUPATIONAL CLUSTERS

1. Business and Office Occupations
2. Marketing and Distribution Occupations
3. Communications and Media Occupations
4. Construction Occupations
5. Manufacturing Occupations
6. Transportation Occupations
7. Agri-Business and Natural Resources Occupations
8. Marine Science Occupations
9. Environmental Control Occupations
10. Public Service Occupations
11. Health Occupations
12. Hospitality and Recreation Occupations
13. Personal Services Occupations
14. Consumer and Homemaking-Related Occupations
15. Fine Arts & Humanities

\*The above clusters have been identified and codified by the United States Office of Education's Bureau of Adult, Vocational and Technical Education.

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM  
MODEL CITIES  
for  
JUNIOR HIGH LEVEL

At the junior high level the program will move into an orientational exploratory phase, where the students will continue to learn about the range of occupational choices available but will begin to sample different job areas more deeply through study and actual experience. The activities are designed to enable the students to be in a better position to make the next step in their career development. All students in Grade 7 will participate. In Grades 8 and 9, participation will become optional, but students will be able to transfer between academic and vocational courses of study at any time.

The following ingredients will compose the junior high program.

Grade 7

1. All students in Grade 7 will take vocational education. Students will continue to learn the full range of occupational opportunities along with the requirements and advantages of each. Instruction will be organized around how different occupations fit into the production management-services cycle of business and industry so that students will see business and industry as a totality.
  
2. A model industrial system will be established with management, production, and service components to enable the students to relate the concepts they have learned to actual operations. A business office will give students experience in planning and managing the production of a product. A production line will actually produce the product and a service department will service and repair the product. Each student will spend 12 weeks learning the operations of each of the three areas.

3. A series of field trips to company work sites will enable the students to spend time with and talk to employees working in different areas to get a feel of the actual duties performed, working conditions, wages, job requirements, and advantages of the occupation.
4. The work orientation team will conduct group and individual counseling sessions in which students discuss their reactions to the field trips and the roles they play in the model industrial system. The team will assist the students in a self-evaluation procedure wherein the students begin analyzing their own abilities, aptitudes, and interests in the context of future employment possibilities. Counseling will be coordinated with activities of the Guidance Department. The team will be responsible for organizing and conducting the field trips, model industrial system activities, and instruction in the way an economic system functions.
5. A career information center will be established in the library of each participating junior high school. The centers will contain books, pamphlets, brochures, and films on the opportunities available in different occupational areas.
6. Parent-pupil clubs will be formed for after school or evening meetings using school facilities in which the parents will join their children in working on projects of interest to the students. The clubs will be organized and conducted by the work orientation team.

#### Grades 8 and 9

1. The vocational course of study will become optional to the student at Grades 8 and 9.
2. On the basis of his sampling of a broad range of occupations and his exposure to and experience with some of the operations involved, the student with the aid of the work orientation team will choose areas that are of interest to him for further study and experience.
3. Counseling, field trips, industrial speakers, use of the career information center, participation in the model industrial system, and in parent-pupil clubs will continue as in Grade 7, but more time will be spent on instruction and



experiences in narrower work areas. The orientation will remain exploratory, but on a deeper level and within a more restricted range.

**OCCUPATIONAL CLUSTER: Business and Office**  
**SPECIFIC JOB: Occupations**

**SUGGESTED SUBJECT AREA:** English

**SUGGESTED GRADE LEVEL:** 7,8,9

**GENERAL OBJECTIVES:** (1) To help each student realize his own potential.

(2) To acquaint the student with a business vocabulary.

(3) To help the students realize the importance of accuracy in spelling, writing, listening and speaking.

(4) To acquaint the student with job availability.

(5) To teach the student the basic skills in job applications.

(6) To teach the students procedures to follow after filing applications.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to demonstrate his knowledge of job applications by completing sample applications.</p> <p>The students will be able to:</p> <p>(a) write compositions using business vocabulary.</p> <p>(b) write and answer want ads.</p> <p>(c) correctly address business envelopes.</p> <p>(d) solve work puzzles made up from words in the vocabulary list.</p> <p>The student will be able to list various Business and Office related jobs available in the city of Cleveland.</p>	<p>Clerk-Typist</p> <p>Computer Programmer</p> <p>Job Family</p> <p>Occupational Cluster</p> <p>Office Manager</p> <p>Receptionist</p> <p>Secretary</p> <p>Typist</p> <p>Want-ad</p>	<p>Distribute survey to discover student interest--general discussion will follow.</p> <p>Student will solve word puzzles using business terms.</p> <p>Using flash cards, students will play word game.</p> <p>Student will role-play procedures of interviewing and being interviewed.</p> <p>Students will complete a booklet of available jobs in business and office occupations in the city of Cleveland--booklet will also include qualifications and salaries.</p>	<p>The students will be aware of the importance of the proper use of English (spelling, writing, speaking and listening) in any type of career.</p> <p>Students will be more aware of the requirements for a job in Business and Office occupations.</p>



## INSTRUCTIONAL AND RESOURCE MATERIALS

## BUSINESS AND OFFICE OCCUPATIONS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Planning Your Career"</p> <p>"Job Interview--Three Young Men"</p> <p>"Job Interview--Three Young Women"</p> <p>Filmstrips:</p> <p>"Your Job Interview"</p> <p>"Job Hunting--Where to Begin"</p> <p>"Your First Week on the Job"</p>	<p>Office Machine Operator</p> <p>Secretary</p> <p>Stenographer</p> <p>Typist</p>	<p>Contact:</p> <p>Ohio Bell Telephone Company, (Have speaker discuss proper use of telephone and the importance of English in Business and Office Careers)</p>	<p>Contact:</p> <p>Ohio Bell Telephone Company</p>	<p><u>Materials</u></p> <p>Daily Newspaper Applications</p> <p>Overhead projector Screen</p> <p>Word Games Pamphlets</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one, two and three will be based on: (a) the ability of 90-95% of the students to correctly complete one sample job application, (b) the ability of 85-90% of the students to write a composition using business vocabulary, write and answer at least one want ad, correctly address eight out of ten business envelopes, and correctly solve a word puzzle using vocabulary discussed in class with a minimum of five errors, and (c) 85-90% of the students will be able to orally cite eight out of ten office related jobs available in the Cleveland community.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

ENGLISH-BUSINESS AND OFFICE OCCUPATIONS

POST-TEST

1. Complete the job application provided by the Higbee company. (Show Sample Job Application).
2. Define the following terms:
  - (a) Job family
  - (b) Occupational cluster
  - (c) Want-ad
  - (d) Receptionist
  - (e) Stenographer
  - (f) Secretary
  - (g) Clerk-Typist
  - (h) Office Manager
  - (i) Computer Programmer
3. Write a short composition (300 words) using business vocabulary terms.
4. Write an example of a want-ad

**OCCUPATIONAL CLUSTER: Communication**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** English

**SUGGESTED GRADE LEVEL :** 7,8,9

- GENERAL OBJECTIVES :**
- (1) To make the student aware of the numerous jobs available in communication.
  - (2) To help the pupil become familiar with the vocabulary related to these jobs.
  - (3) To help the student become aware of the skills necessary to qualify him for a career in communication.
  - (4) To strive to help student develop skills in reading, writing and speaking.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to define and describe the duties of the people working on jobs listed in the vocabulary list.</p> <p>The students will be able to write a news article based on a short story he has read.</p> <p>The students will be able to write editorials and edit materials written by other students.</p> <p>Students will be able to correctly fill out telegrams.</p> <p>Students will be able to list the proper procedures for writing a school newspaper.</p>	<p>Announcers            Communication Editors            Interviewers            Job Family            Occupational Cluster            Telephone Personnel            Television Personnel            Translators            Underwriters</p>	<p>Give oral survey on "What Is Communication?"</p> <p>Through role-playing, dramatize difficult occupations in the area of Communication (e.g. the telephone supervisor and operator).</p> <p>Students will write editorials-- they will edit other student's writing.</p> <p>Students will write a school paper.</p> <p>Students will collect feature and special stories for the newspapers and summarize them.</p> <p>Students will have a mock television program.</p>	<p>The students will be more aware of jobs available in the communication field.</p> <p>The students will have a general knowledge of the requirements and operations involved in the occupations discussed in this unit.</p> <p>The students will have developed better skills in reading, writing and spelling.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

COMMUNICATION

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
"Television Serves its Community" "Careers in Communication" "Communication and Our Town" "Radio" "The Newspaper" "Newspaper Serves its Community"	Announcer Artists Cartoonist Disc Jockey Editor(Managing) Printing Pressman Reporters Salesman Sports Editor	Contact: Speakers' Bureau of The Plain Dealer or Contact the Call and Post Channel 25 Cleveland, Ohio WBOE Radio WJMO am Radio	Contact: The Press The Plain Dealer The Call and Post Radio and Television Station--Contact all	Brochures Pamphlets SRA Kits Popeye Career-Comics Occupational Outlook Handbook Chronicle Occupational Library DOT

EVALUATION: Successful teacher evaluation of objectives in this Unit will be based on the ability of 80-85% of the students to: (a) write one news article based on a short story they have read, (b) write one editorial, (c) correctly complete a blank telegram form and (d) list, on paper, the proper procedures for writing a school newspaper. All the above will be done within a period of one week.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

## ENGLISH-COMMUNICATION

### POST-TEST

1. List the qualifications and skills required for the following: Telephone personel interpreter, TV personnel reporter, advertisers, editors announcers, translators.
2. State the basic differences between a short story and a news article.
3. What is an editorial: Write an example of one school subject of your choice.

**OCCUPATIONAL CLUSTER: Fine Arts & Humanities**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** English

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students develop effective skills in reading, writing and speaking.

(2) To make the pupils aware of the numerous verbal and non-verbal ways of imitating real life.

(3) To help students draw, from their imaginations, solutions to real conflicts.

(4) To make the students aware of the many jobs connected with acting.

(5) To broaden the student's experiences in the varied fields of acting.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list and describe the duties of actor, actress, director, stage director, producer, etc.</p> <p>The students will be able to write a brief review of a TV play or movie.</p> <p>Students will be able to write, produce and dramatize a play or skit.</p> <p>The students will be able to list or state requirements involved in acting, producing plays or skits and reviewing movies of plays.</p>	<p>Actor</p> <p>Actress</p> <p>Business Manager</p> <p>Fine Arts</p> <p>Job Family</p> <p>Occupational Cluster</p> <p>Producer</p> <p>Stage Director</p> <p>Technical Writer</p>	<p>Distribute opinion poll about acting field.</p> <p>Pre-test on vocabulary terms.</p> <p>Discuss the elements of a play (plot, setting, characters, theme, irony, etc.).</p> <p>Various groups will perform and direct a play or skit.</p> <p>This performance will be taped.</p> <p>Invite actors and actresses from local playhouses to put on skits for the students.</p>	<p>The students will have a greater knowledge of the various fields of acting.</p> <p>The students will be more aware of the many jobs connected with acting.</p> <p>The students will have developed more effective skills in reading, writing and speaking.</p> <p>The students will be aware of the interrelations between the activities in the classroom and real occupations.</p>



FINE ARTS AND HUMANITIES

INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "First World Festival of Negro Art"                      "Design for Growing"</p>	<p>Actor                      Actress                      Dancer                      Director                      Singer                      Singing Teacher</p>	<p>Contact:                      Mr. Ruben Silver,                      Director, Karamu House</p>	<p>Contact:                      The Karamu House                      Cleveland, Ohio</p>	<p>Brochures                      Pamphlets                      SRA Kits                      Popeye Career Comics                      Occupational Outlook Handbook                      Chronicle Occupational Library                      DOT</p>

**EVALUATION:** Successful attainment of objectives one and four will be based on the ability of at least 85-90% of the students to write, in detail, or orally list and describe the duties, requirements, etc. of at least 90% of the jobs listed in this Unit. Within a period of four days, at least 85-90% of the students will turn in a brief review of a TV play or a movie. Teacher rating of play or skit presented in class will be that 85-90% of the students participated in the actual writing, producing and dramatizing of the play or skit.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

## FINE ARTS AND HUMANITIES

### ADDITIONAL LEARNING EXPERIENCES OF ACTIVITIES

SUBJECT AREA: English  
Grades : 7, 8, 9

1. Encourage students to take part in a play that will appear in one of the community theaters.
2. Have students put on a school play.
3. Students will read and discuss reviews of plays and movies that appear in the newspapers.
4. Students will watch plays on television and write reviews of them
5. Given a situation the entire class will develop and write a short story in class.
6. Students will read and discuss selected short stories.
7. Students will write their own short stories, skits will be written from the three of four best short stories.
8. Students will participate in a short story contest.
9. Students will read articles or write a play illustrating some kind of conflict(e.g. between sister, brother, parent, classmate, or teacher).

**OCCUPATIONAL CLUSTER: Marketing and Distribution  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** English

**SUGGESTED GRADE LEVEL :** 7,8,9

- GENERAL OBJECTIVES :**
- (1) To develop in the student an awareness of marketing and its effect(s) on him.
  - (2) To familiarize the student with terms relating to marketing and distribution.
  - (3) To help students develop proper speech habits.
  - (4) To teach the students basic skills in advertising.
  - (5) To help students to read and interpret advertisements.
  - (6) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe the relation between English (speech, writing, listening) and the world of marketing and distribution.</p> <p>The students will be able to list general requirements for Careers in area of Stocks&amp;Bonds.</p> <p>The students will be able to read and interpret advertisements.</p> <p>After viewing several TV stations, the student will be able to analyze the types of commercials appearing on the stations.</p>	<p>Advertisement Bonds Common Stock Consumer Distribution Distributor Dow Jones Industrial Job Family Marketing Mutual Funds Occupational Cluster Seller Stock Broker Stocks</p>	<p>Oral discussion of students' knowledge of marketing</p> <p>Using newspapers, make charts illustrating trends in marketing-- read and discuss newspaper ads, stocks, bonds, watch evening news.</p> <p>Write paragraphs discussing Dow Jones, mutual funds, common stocks, etc.</p> <p>Using library, study local, national and international trades.</p> <p>After field trips to various areas of the city to compare marketing prices, write a comparative analysis paper.</p>	<p>The student will be familiar with terms related to marketing and distribution.</p> <p>The student will be more aware of the need to develop correct speech habits.</p> <p>The student will be more knowledgeable about the requirements and operations involved in marketing and distribution occupations.</p> <p>The student will be more aware of marketing and its effects on himself and others around him.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p><u>Films:</u></p> <p>(1) Broker (2) Stocks (3) Buyer</p> <p><u>Filmstrips:</u> "What Do You Like to Do?"</p>	<p>Account Manager</p> <p>Field Interviewer</p> <p>Statistical Analyst</p> <p>Tabulator</p>	<p>Contact: American Marketing Association</p> <p>Cleveland Advertising Club, Statler Hotel, 241-4807</p> <p>Invite former students in marketing and advertising to talk with small groups in the school.</p>	<p>Contact: WVIZ Station Channel 25 (3500 Brookpark Rd. Cleveland, Ohio)</p> <p>Purpose: To see how television commercials are made.</p>	<p>Newspapers Magazines--"Bust News World" Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives in this Unit will be based on the ability of at least 85% of the students to define, in writing or orally, at least 75% of the vocabulary terms used in this Unit.</p> <p>Teacher evaluation of students' ability to read and interpret advertisements will be that at least 75% of the students will obtain a newspaper or magazine advertisement and write an analysis of that advertisement as a homework assignment. 75-80% of the students will be able to orally cite duties and educational requirements for individuals interested in careers dealing with stocks and bonds.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p>				
<p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: BUSINESS AND OFFICE  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Social Studies

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students understand how social studies relates to jobs in the Business and Office occupations cluster.

(2) To help students gain a knowledge of occupations in the Business and Office Occupations cluster.

(3) To give students the requirements for jobs in the Business and Office Occupations.

(4) To help students understand the Social Studies qualifications for jobs in the Business and Office Occupations cluster.

(5) To create self-awareness of student's interest.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list or discuss at least four ways in which Business and Office Occupations are related to Social Studies.</p> <p>To demonstrate a knowledge of various jobs in business and how to interpret ads and press releases, the students will write ads for various products and write press releases on important Social Studies topics.</p> <p>The students will be able to describe and identify the duties, educational requirements, etc., of jobs listed in this unit.</p>	<p>Accountant Advertiser Bookkeeper Cashier Electronic Computer Operator Personnel Staff Public Relations Staff Receptionist Secretary Stenographer Telephone Operator Typist</p>	<p>Students will list jobs from the Business and Office Cluster on the board. Each student conduct library research as to duties, qualifications, etc, of the jobs listed.</p> <p>Students will view the film, "Careers in Business and Office Occupations".</p> <p>Students will (a) write an ad for a trip to Ethiopia,--make it appeal to Black Americans. (b) write an ad for a Jackson-five Album. (c) write a press release for the Mayor of Cleveland. Explain why taxes are necessary.</p>	<p>The students will have a more positive attitude toward self, others, and the world of work.</p> <p>The students will be more aware of sources of Business and Office jobs in the greater Cleveland area.</p> <p>The students will be able to perceive the relation between specific vocational activities related to this unit and "real" occupations.</p> <p>The students will be aware of duties, requirements, etc., for jobs discussed in this unit.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Business and Office Occupations"</p>	<p>Accountant Cashier Office Machine Operator Personnel Staff Secretary Stenographer Typist</p>	<p>Contact: The Cleveland Advertising Club 241-4807  (Acquaint students with job qualifications and specifically how Social Studies Skills-- would relate to these jobs.</p>	<p>Contact: The Ohio Bell Telephone Company-- The Public Relations Divisions</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comic Chronicle Occupational Library Occupational Outlook Handbook DOT</p>
<p><b>EVALUATION:</b> Attainment of objectives (1), (2), and (3) will be based on the ability of 80-85% of the students to            (a) write or orally discuss at least four ways in which Business and Office occupations are related to social studies.            (b) write ads for two products of their choice and write one press release on an important social studies topic.            (c) write or orally identify and describe 80% of the jobs listed in this unit. (d) Correctly answer at least 80% of the items on the post test.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER- BUSINESS AND OFFICE  
SOCIAL STUDIES**

**Additional Learning Experiences or Activities**

Discuss how various business and office careers are related to Social Studies.

Invite a speaker from the Cleveland Advertising Club.

Plan a field trip to a local public relations firm.

Have students write ads for speciality products in specific countries or areas. Students will also write press releases for special interest groups.

Post Test

**OCCUPATIONAL CLUSTER: COMMUNICATION AND MEDIA  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Social Studies

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES:** (1) To help students gain knowledge of occupations in communication.

(2) To help students understand how social studies relates to jobs in communication.

(3) To give students the requirements for jobs in communication

(4) To help students understand the social studies qualifications for jobs in communication.

(5) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will demonstrate their knowledge of various communication jobs by writing and preparing a newspaper article about a famous person.</p> <p>The students will be able to enumerate a variety of generalized job characteristics on which he can base comparisons of desirable careers.</p> <p>The students will be able to list at least three ways in which Social Studies relates to jobs in communication.</p> <p>The students will be able to list and describe duties, qualifications for jobs listed in this unit.</p>	<p>Announcer Broadcast Technician Cable Splicer Camera Man Disc Jockey Guard Mail Carrier Morse Operator Music Director Make-up Artist News reporter Photographer Postal Clerk Sales Representative Telephone Coin-Collector</p>	<p>Pre-test Discuss the areas of communication and the jobs it provides. Show the film, "Careers in Communication." Each student will choose a job in communication and research its job description and qualifications. Discuss qualifications for jobs in communication and stress those requiring social studies skills---reporter (TV, Radio, Newspaper) Invite a speaker from WKYC TV Station. Plan a field trip to the Plain Dealer Newspaper office. Post Test</p>	<p>The students will be more aware of how school subjects relate to various communication jobs available in the Cleveland community.</p> <p>The students will be knowledgeable about the duties, responsibilities, training, etc., required for jobs discussed in this unit.</p> <p>The students will have a more positive attitude toward school, self, others, and the world of work.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>Careers In Communication</p>	<p>Broadcast Technician Cartoonist Copy Writer Delivery Man Disc Jockey Make-up Artist News Writer Newspaper Reporter Salesman Station Manager TV News Director Traffic Manager</p>	<p>Contact: WKYC TV Station Public Relations Department 646-1100</p>	<p>Contact: The Plain Dealer 1801 Superior Avenue Promotion Department Cleveland, Ohio 523-4245</p>	<p>Pamphlets Brochures SRA Kits Popeye Career-Comics DOT Occupational Outlook-Handbook Chronicle Occupational Library</p>

**EVALUATION:** Successful attainment of post test objectives will be based on the ability of 80-85% of the students to (a) write in detail or orally list and describe duties, requirements, etc., of at least 80% of the jobs listed in this unit. (b) write three ways in which social studies relates to jobs in communication. (c) write one newspaper article about a famous person. (d) obtain on the post test, a 10% accuracy increase over their initial scores on the pre-test

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

OCCUPATIONAL CLUSTER: FINE ARTS AND HUMANITIES  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Social Studies

SUGGESTED GRADE LEVEL: 7, 8, 9

GENERAL OBJECTIVES: (1) To help students gain knowledge of occupations in Fine Arts and Humanities.

(2) To help students understand how social studies relates to jobs in Fine Arts and Humanities.

(3) To give students the requirements for jobs in Fine Arts and Humanities

(4) To help students understand the social studies qualifications for jobs in Fine Arts and Humanities.

(5) To develop and foster a positive attitude toward the value of fine art.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify duties, requirements, training, etc., for jobs listed in this unit.</p> <p>The students will be able to identify a variety of considerations involved in choosing a career.</p> <p>The students will be able to demonstrate awareness of the diversity of employment in the area of Fine Arts and Humanities and the need for cooperation among all personnel.</p>	<p>Actor                      Actress                      Commercial Artist                      Dancer                      Director                      Industrial Designers                      Interior Decorator                      Producer                      Pop Man                      Set Designer                      Singer                      Stage Manager</p>	<p>Pre-test</p> <p>List and discuss various jobs in the area of Fine Arts and Humanities.</p> <p>Each student will have to research qualifications, duties, etc., of the jobs listed.</p> <p>Show the film "Careers in Art".</p> <p>Invite speaker from the Karamu House.</p> <p>Plan a field trip to the Hanna Theater, downtown Cleveland.</p> <p>Post test</p>	<p>The students will have knowledge of the requirements and operations involved in jobs listed in this unit</p> <p>The students will have a more positive attitude toward self, others, and the world of work.</p> <p>The students will have a greater appreciation of the fine arts.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films:  Careers In Art	Actor Actress Commercial Artist Dancer Director Industrial Designer Interior Decorator Singer Singing Teacher	Contact:  Karamu House	Contact:  Hanna Theater	Pamphlets  Brochures  Sra Kits  Popeye Career Comics  DOT  Chronicle Occupational Library  Occupational Outlook Library
<p><b>EVALUATION:</b> Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write in detail or orally identify and describe the duties, requirements, etc., of 80% of the jobs listed in this unit. (b) write at least three considerations involved in choosing a career. (c) obtain on the post test, at 10% accuracy increase over their initial scores on the pre-test.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL RESOURCE MATERIALS:</b></p>				

OCCUPATIONAL CLUSTER: MANUFACTURING  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Social Studies  
 SUGGESTED GRADE LEVEL: 7, 8, 9

- GENERAL OBJECTIVES :
- (1) To help students gain knowledge of occupations in manufacturing
  - (2) To help students understand how social studies relates to jobs in manufacturing.
  - (3) To give students the requirements for jobs in manufacturing.
  - (4) To help students understand the social studies qualifications for jobs in manufacturing
  - (5) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe at least three different ways in which school subjects can be applied in the world of work.</p> <p>The students will be able to discuss a range of considerations that enter into career choice.</p> <p>The students will be able to list, describe and discuss the duties, educational requirements, salary, job outlook, etc., of jobs discussed in this unit.</p>	<p>Assemblers                      Designer                      Dispatcher                      Draftsman                      Electrician                      Inspector                      Lab Technician                      Machinist                      Mechanical Engineer                      Pipefitter                      Sewing Machine Operator                      Sheet Metal Worker                      Shipping Clerk                      Time Clerk                      Tool and Die Maker                      Unskilled Plant workers</p>	<p>Pre-test</p> <p>Students will list various manufacturing jobs on the board.</p> <p>Show and discuss the film, "Careers in The Machine Trades".</p> <p>Have students contact various Manufacturing firms and ask what qualifications are necessary for two different types of jobs available in that firm.</p> <p>Discuss qualifications for jobs in manufacturing and social studies skills that may apply.</p> <p>Invite speakers from associated industries of Cleveland-Management relations</p> <p style="text-align: right;">Post test</p>	<p>The students will have a more positive attitude toward self, others, and the world of work,</p> <p>The students will have a greater knowledge of manufacturing occupations in the Cleveland Community.</p> <p>The students will have a greater understanding of the interrelations between the production, management, and service area of business and industry.</p>

## OCCUPATIONAL CLUSTER: MANUFACTURING

## INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films :  Careers in the Machine Trades	Designer Dispatcher Draftsman Dressmaker Electrician Lab Technician Machinist Order Clerk Pipefitter Sewing Machine Operator Sheet Metal Worker Shipping Clerk	Contact: The Associated Industries of Cleveland 1740 East 12th Str. Cleveland, Ohio (Labor Management Relations) 861-3100	Contact: The Warner and Swasey Company 5701 Carnegie Avenue Cleveland, Ohio 431-5580 Ext 304	Pamphlets  Brochures  SRA Kits  Popeye Career Comics  DOT  Chronicle Occupational  Occupational Outlook Handbook

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write orally, identify, and describe the duties, requirements, benefits, etc., of 80% of the jobs listed in this unit. (b) write or orally describe three ways in which school subjects can be applied to the world of work. (c) Obtain on the post test, a 10% accuracy increase over their initial scores on the pre-test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:****ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**MARKETING AND DISTRIBUTION**  
**OCCUPATIONAL CLUSTER:**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Social Studies

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students gain knowledge of occupations in marketing and distribution

(2) To help students understand how social studies relates to jobs in marketing and distribution.

(3) To give students the requirements for jobs in marketing and distribution

(4) To help students understand the social studies qualifications for jobs in marketing and distribution.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to demonstrate familiarity with the careers available in the Marketing and Distribution cluster and with the application of social studies in these jobs.</p> <p>The students will be able to identify and describe the duties educational requirements of jobs listed in this unit.</p> <p>The students will be able to perform the duties of some of the jobs listed in this unit or list the procedures involved in performing some of these duties.</p>	<p>Auto Salesman            Cashier            Clerk            Insurance Salesman            Marketing Researcher            Public Relations            Personnel            Real Estate Salesman            Receiving Clerk            Service Station            Attendant            Shipping Clerk</p>	<p>Pre-test</p> <p>List various jobs in marketing and distribution</p> <p>Show the film, "Careers in Skilled Services" or "Joys of Selling".</p> <p>Each student will contact a person working in the area of Marketing and Distribution They will inquire about the duties, qualifications, etc., in a particular job.</p> <p>The students will discuss and describe jobs requiring social studies skills.</p>	<p>The students will be aware of duties, requirements, job outlook, etc., of jobs listed in this unit.</p> <p>The students will have a better understanding of how social studies relate to Marketing and Distribution jobs.</p> <p>The students will have a more positive attitude toward school, self, others and the world of work.</p>

OCCUPATIONAL CLUSTER. MARKETING AND DISTRIBUTION

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Film: Careers in Skilled Services The Joys of Selling</p>	<p>Accountant Field Interviewers Marketing Researcher Shipping Clerk Statistical Analyst Stock Clerk</p>	<p>Contact: The American Marketing Association Griswold-Eshleman Company 55 Public Square Cleveland, Ohio</p>	<p>Contact: Research Department The Standard Oil Company 4440 Warrensville Center Road Warrensville Hgts. Ohio 66306200</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Chronicle Occupational Library Occupational Outlook Handbook DOT</p>

EVALUATION: Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write or orally identify and describe the duties, educational requirements, etc., of at least 80% of the jobs listed in this unit, and (b) obtain on the post test a 10% accuracy increase over their initial scores on the pre-test.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

OCCUPATIONAL CLUSTER- MARKETING AND DISTRIBUTION  
SOCIAL STUDIES

Additional Learning Experiences or Activities

Invite speaker from The American Marketing Association.

Plan a field trip to the research department of the Standard Oil Company.

Students will work in groups to solve the following marketing problems. (a) In what areas of the United States would a manufacturer of combs try to sell his product? (b) In what areas of the United States could a ski manufacturer sell his product?

Post Test



OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION  
 JOB FAMILY: SALESMANSHIP

SUGGESTED SUBJECT AREA: Social Studies  
 SUGGESTED GRADE LEVEL: 7, 8, 9  
 GENERAL OBJECTIVES:

- (1) To relate to students the importance of salesmanship, personality qualities, and qualifications
- (2) To make students aware of the different types of salemen. Example. furniture. appliance apparel, accessories, drug stores, dept. stores, grocery stores, etc.,
- (3) To show how experience is an important factor for future advancement in the retail field
- (4) To make students aware of how on-the-job training and supervision is related to job classification.
- (5) To make students aware of personal characteristics sought by employers.
- (6) To stress to students the importance of home economic background for merchandising.
- (7) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
The student will be able to name a variety of occupations in the area of marketing and distribution and give a simple characterization of each one (refer to vocabulary list)	Advertising Manager Buyer Department manager Job Family Marketing and Distribution	Invite a buyer from a department store to explain jobs and responsibilities of qualified members of her department.	The student will be more aware of personal characteristics sought by employers.  The students will be able to demonstrate a greater knowledge of the interrelations between different functional areas of marketing and sales.
The student will be able to identify and describe the duties of at least 7 different types of salesmen.	Occupational Cluster Personnel Manager Salesman Store Manager	Introduce and discuss vocabulary terms.  Stress opportunities for advancement as available through interest and dedication.	
		On a field trip to a department store, visit the training school and behind-the-scene operations, such as inventory, credit department, etc.  Post Test	

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION - SALESMANSHIP

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Cabbages to Kings and various things. Careers in Sales, "The Joy of Selling"</p>	<p>Field Interview</p>	<p>Contact: Invite buyer from a department store to explain jobs and responsibilities of qualified members of her department  American Marketing Association</p>	<p>Contact: May Company (visit the training school and behind the scene operations, such as inventory, credit department etc.</p>	<p>Brochures Pamphlets SRA Kits  Popeye-Career Comics  Occupational Outlook Handbook  Chronicle Occupational library  DOT</p>

EVALUATION: Successful attainment of objective (1) will be based on the ability of 80-85% of the students to write or orally identify and describe the duties, requirements, etc., of 80% of the jobs listed in this unit. Attainment of objective (2) will be based on the ability of 80-85% of the students to write a brief description of at least seven different types of salesmen. Teacher rating of post-test will be that at least 80-85% of the students will correctly answer 80% of post test items.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

OCCUPATIONAL CLUSTER: PUBLIC SERVICE  
SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Social Studies

SUGGESTED GRADE LEVEL: 7, 8, 9.

GENERAL OBJECTIVES : (1) To help students gain knowledge of occupations in Public Service

(2) To help students understand how social studies relates to jobs in Public Service.

(3) To give students the requirements for jobs in Public Service

(4) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to state or discuss at least four different ways in which Social Studies relates to public service jobs.</p> <p>The students will be able to list ten Public Service Careers available in their community and to cite factors that influence the selection of a career.</p> <p>The students will be able to describe and identify the duties educational requirements, etc., of jobs listed in this unit.</p>	<p>Coin Collector Customer Information Fireman Judge Law Librarian Lawyer Meter Reader Playground Attendant Playground Director Policeman Probation Officer Storekeeper Telephone Operator</p>	<p>Pre-test</p> <p>Students will write a list of jobs in Public Service on the board.</p> <p>Show and discuss the film, "Careers In Public Service"</p> <p>Students will research the qualifications, duties, etc., of the Public Service job of their choice. Students will discuss how these jobs are related to Social Studies.</p> <p>Invite a lawyer or policeman to speak to the class.</p> <p>Students will visit city hall.</p>	<p>The students will have a better understanding of how Public Service jobs relate to Social Studies.</p> <p>The students will have a more positive attitude toward self, others, and the world of work.</p> <p>The students will be aware of the duties and requirements of various Public Service Jobs.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Careers In Public Service</p>	<p>Cable Splicer Captain (Fire) Chemist Dog Warden Fireman Meter Reader Policeman Public Safety Aide Stock Clerk Telephone Operator Welding Engineer</p>	<p>Contact: Cleveland Police Department, Public Relations Office Ward Councilmen</p>	<p>Contact: City Hall City Council Meeting</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook DOT Chronicle Occupational Library</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write at least three different ways in which social studies relates to public service jobs. (b) write in detail or orally identify and describe the duties, educational requirements, etc., of at least ten public service jobs available in the Cleveland Community. (c) obtain on the post test a 10% accuracy increase over their initial scores on the pre-test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**AGRI-BUSINESS AND  
NATURAL RESOURCES**

**OCCUPATIONAL CLUSTER:  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL :** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To enable students to identify several occupations related to the agri-business and natural resources cluster.
  - (2) To acquaint students with requirements for various occupations in this cluster
  - (3) To help students develop a greater understanding of the various aspects of this cluster, and its relationship to mathematics.
  - (4) To familiarize students with the mathematical qualifications for various occupations in the Agri-business cluster.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the requirements and duties for at least 10 different jobs in the Agri-business and Natural Resources cluster.</p> <p>The students will be able to name one way that each of the workers studied, use mathematics in their occupations.</p>	<p>Agri-Business Dairy Farmers Drill Operator Extension Service Worker Farmers Geologist Horticulturist Machinist Mechanic Miner Mining Engineer Technician</p>	<p>Pre-Test</p> <p>In informal discussion identify various jobs in the agri-business and Natural Resource cluster, and categorize them according to specific fields (e.g. agriculture mining etc)</p> <p>Show and discuss film "Our Natural Resources"</p> <p>Students will discuss educational requirements for jobs discussed in this unit</p> <p>Plan field trip to East Ohio Gas Company.</p>	<p>The students will have a better understanding of various jobs in this cluster and their relationship to mathematics.</p> <p>The students will have a more positive attitude toward math and how it helps people in their work.</p>

## OCCUPATIONAL CLUSTER

## INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: Our Natural Resources Conserving Our Natural Resources	Biophysicist Chemist Cutting Machine Operator Draftsman Driller Engineers Horticulturist Petroleum geologist	Contact: Morton Salt Company, Euclid Bldg. 241-7282 Natural Science Museum Ohio Agriculture Research and Development Center	Contact: East Ohio Gas Company East 9th and Superior Avenue. Public Relations Dept 522-2929 Natural Science Museum	Pamphlets Brochures SRA Kits Popeye Career comics Occupational Outlook Handbook Chronicle Occupational Library DOT

**EVALUATION:** Successful attainment of objective (1) will be based on the ability of 80-85% of the students to write or orally discuss the duties, requirements, etc., of eight out of ten agri-business and natural resource jobs. Attainment of objective No. (2) will be based on the ability of 80-85% of the students to write at least one way in which the occupations listed in No. (1) use mathematics. Teacher rating of pre-test will be that 80-85% of the students correctly answer 75-80% of pre-test problems and 80-85% of post test problems.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS

MATHEMATICS - AGRI-BUSINESS AND NATURAL RESOURCES

POST TEST

GRADE LEVEL: 7, 8, 9

Match the following agri-business and natural resources occupations with their applicable minimum educational requirements:

<u>Occupations</u>	<u>Minimum Educational Requirement</u>
1. botanist <u>a</u>	a. college degree and post graduate work
2. cattlemen <u>d</u>	b. college degree
3. agricultural engineer <u>b</u>	c. high school diploma
4. mining engineer <u>b</u>	d. less than high school diploma
5. farmer <u>d,c</u>	
6. florist <u>d,c</u>	
7. gardener/groundskeeper <u>d,c</u>	
8. horticulturist <u>b</u>	
9. microbiologist <u>b</u>	
10. miner <u>d,c</u>	
11. nurseryman <u>c</u>	
12. poultryman <u>d</u>	
13. crop and soil scientist <u>b</u>	
14. dairy technologist <u>b</u>	
15. food technologist <u>b</u>	

**OCCUPATIONAL CLUSTER: BUSINESS & OFFICE OCCUPATION  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES:** (1) To inform students about careers in Business Administration and related fields.

(2) To assist students in formulating a list of mathematics requirements for the various occupations in the Business Administration field.

(3) To orient the students in all the mathematical aspects necessary to qualify for immediate employment in the Business Administration field.

(4) To emphasize the importance and usefulness of mathematical skills in pursuing a job in Business and Administration field.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe a variety of ways in which school subjects can be applied in the working world.</p> <p>Through participating in class discussions and role-playing sessions, the students will sample the operations and skills required in a number of occupations in the Business and Office Occupations Cluster.</p>	<p>Cashier Clerk-Typist Computer Operator Receptionist Secretary (legal, medical, etc.) Typist</p>	<p>Have students name as many careers related to the Business Administration field as possible. Each student will select one of the careers they would like to pursue.</p> <p>Describe for the students, the functioning of these jobs as they relate to the various areas of Business Administration and related fields.</p> <p>Invite a technician or specialist from one of the job categories to emphasize the use of mathematics in the performance of his particular job.</p> <p>Have students create a mock administration office and staff and role-play the various job categories.</p>	<p>The students will be more aware of their strengths and weaknesses and their interests and abilities.</p> <p>The students will have a greater knowledge of the interrelations between different functional areas of business and industry.</p> <p>The students will have greater knowledge of the requirements and operations involved in various business and office jobs and how math relates to these jobs.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Careers in Business and Office Occupations"</p> <p>Filmstrips:</p> <p>"Introduction to Business Machines"</p> <p>"What Do You Like to Do"</p> <p>"Careers, Clerical"</p>	<p>Office Machine Operator</p> <p>Secretary</p> <p>Stenographer</p> <p>Typist</p>	<p>Contact:</p> <p>Business teacher from high school to speak to junior high school students about careers in the field.</p>	<p>Contact:</p> <p>Public Relations Office of local business college.</p>	<p>Brochures</p> <p>Pamphlets</p> <p>SRA Kits</p> <p>Popeye Careers Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p>
<p><b>EVALUATION:</b> Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to write in detail or orally discuss at least four ways in which school subjects such as math, can be applied in the world of work. Teacher evaluation of post test will be that at least 80-85% of the students correctly answer 80% of the post test questions.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

OCCUPATIONAL CLUSTER: COMMUNICATIONS & MEDIA  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Mathematics

SUGGESTED GRADE LEVEL: 7, 8, 9

GENERAL OBJECTIVES: (1) To familiarize students with those qualities which distinguish communications and media occupations.

(2) To help the students identify important job requirements for various Communications and Media careers (especially those related to math).

(3) To acquaint the students with several communications occupations.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list various jobs involved in writing a newspaper.</p> <p>The students will be able to list the requirements and operations involved in various jobs discussed in this unit.</p> <p>The students will be able to list or discuss ways in which mathematics is used in the various communications and media jobs listed in this unit.</p>	<p>Disc Jockey                      Mail Carrier                      Newswriter                      Postal Clerk                      Radio Disc Jockey                      Radio/TV Broadcast Technician                      Radio/TV Serviceman                      Reporter                      Service Representative                      Telephone Operator                      Teletypist                      Translator                      TV Announcer</p>	<p>In informal class discussions, identify broad categories of communications and media jobs (newspaper, telephone, TV, Radio, etc.)</p> <p>Organize class into small groups. Each group will choose a category and identify as many jobs as possible. They will also underline any jobs in which they consider math skills important discussions will follow.</p> <p>Students will use slides and films in discussing the requirements and duties of various in the area of communications.</p>	<p>The students will have a more positive attitude toward self, others, and the world of work.</p> <p>The students will be able to perceive the relation between specific vocational education activities and real occupations in the communications and media occupations.</p> <p>The students will be more aware of communications and media jobs in the city of Cleveland and how they relate to math.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      Careers in Communication                      The Newspaper                      Communications and our Town</p> <p>Filmstrips:                      Radio                      Television                      The Newspaper                      The Telephone</p>	<p>Newspaper                      Post Office                      Radio &amp; TV</p>	<p>Contact:                      The Plain Dealer                      WVIZ TV Channel 25                      WBOE Radio Station</p>	<p>Contact:                      The Plain Dealer                      18th Superior Avenue                      Cleveland, Ohio</p> <p>WVIZ Channel 25                      500 Brookpark Rd.                      Cleveland, Ohio                      398-2800 Ext. 43</p> <p>WBOE Radio Station                      Cleveland Board of Education                      1325 East 6th Street                      Cleveland, Ohio</p>	<p>Pamphlets                      Brochures                      SRA Kits                      Popeye Career Comics                      Occupation Outlook Handbook                      Chronicle Occupational Library                      DOT</p>

**EVALUATION:** Attainment of objectives (1) and (2) will be based on the ability of 80-85% of the students to write in detail or orally identify and describe at least ten of the fourteen jobs listed in this unit. Successful attainment of objective (3) will be that 80-85% of the students will write at least three ways in which mathematics can be used in communication and media jobs. Teacher rating of pre-test will be that 80-85% of students correctly answer 75-80% of pre-test items. Teacher rating of post-test will be that 80-85% of the students to correctly answer 85-90% of the post-test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

OCCUPATIONAL CLUSTER - COMMUNICATIONS & MEDIA  
MATHEMATICS

Additional Learning Experiences or Activities

Class version of "What's My Line" is played--dividing class into two groups. Distribute lists of possible jobs that may be used in the game. Students from one team will interview in turn a student from the opposing class team who has assumed the role of a worker in one of the occupations listed on the students' handout. One point is assessed for each indirect question (e.g. "Does your job require a statistics background") Two points for each direct question (E.g. "Are you a radio disc jockey) with 20 points maximum for each occupation. The team with the least number of points assessed against it wins.

Produce a class newspaper. If possible, coordinate with English and perhaps social studies classes. Emphasize the technical aspects of setting up a paper layout, distribution cast, etc.

MATHEMATICS- COMMUNICATIONS AND MEDIA

PRE-TEST

GRADE LEVEL:

- I. Check the occupations below which you feel might relate directly to communications.

           mail carrier  
           TV announcer  
           X-Ray technician  
           life guard

           telephone operator  
           beautician  
           radio disc jockey  
           news writer

POST TEST

II.

1. Name two occupations normally found in any four of the following communication categories:
  - a. newspaper
  - b. television
  - c. radio
  - d. post office
  - e. telephone
  - f. telegram
2. From the list of twelve occupations you named above, choose any three and state the general math requirements for each.
3. Identify three ways in which math was used in writing our student newspaper.
4. Match the following communications occupations with their applicable minimum educational requirements:

Occupations

Minimum Educational Requirement

- |   |   |
|---|---|
| 1. reporter <u>a</u>                            | a. college degree                           |
| 2. postal clerk <u>d or c</u>                   | b. high school diploma and special training |
| 3. disc jockey <u>a or broad-casting school</u> | c. high school diploma                      |
| 4. mail carrier <u>d or c</u>                   | d. less than high school diploma            |
| 5. radio/TV broadcast technician <u>b</u>       |   |
| 6. radio/TV serviceman <u>b</u>                 |   |
| 7. teletypist <u>c</u>                          |   |
| 8. translator/interpreter <u>a or c</u>         |   |

OCCUPATIONAL CLUSTER: Construction  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Mathematics  
 SUGGESTED GRADE LEVEL: 7, 8, 9

- GENERAL OBJECTIVES:
- (1) To assist the students in determining the types of careers they may decide to pursue.
  - (2) To assist students in understanding and defining the various aspects of how mathematics pertains or relates to the many career choices the students will be selecting.
  - (3) To inform students of the basic minimum mathematical qualifications necessary for success in particular job families.
  - (4) To create bridges between school and earning a living.
  - (5) To introduce students to apprenticeship and journeyman programs.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify a variety of considerations involved in choosing a career.</p> <p>The students will be able to describe a variety of occupations involved in building an apartment building and will be aware of the future employment possibilities in this industry in the city of Cleveland.</p> <p>With the use of "hands-on" occupational kits, tours and class discussions, the students will be able to sample the operations and skills required in various construction occupations.</p>	<p>Bricklayer                      Carpenter                      Cement Mason                      Electrician                      Glazier                      Iron Worker                      Lather                      Millwright                      Plasterer                      Plumber                      Pointer                      Roofer                      Sheet Metal Worker</p>	<p>Students will prepare a list of the construction jobs they have observed in progress in the Cleveland area--list jobs necessary to complete this construction.</p> <p>Discuss the following as side issues:                      redevelopment, union membership, apprenticeship, craft unions involved in the construction business</p> <p>Show slides and filmstrips on construction.</p> <p>Visit construction supply company.</p>	<p>The students will be able to demonstrate awareness of the diversity of employment in the construction industry and the need for cooperation among all personnel.</p> <p>The students will be aware of ways in which math is used in the construction industry.</p> <p>The students will have a more positive attitude toward math and the world of work.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: Construction

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Building Trades" Filmstrips: "What is a Job?" "Building a House"</p>	<p>Bricklayer Carpenter Draftsman Electrician Sheet Metal Worker</p>	<p>Contact: Bureau of Apprenticeship and Training Federal Building</p>	<p>Contact: Construction job site</p>	<p>Brochures Pamphlets SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to write, in detail, or orally identify and describe at least 80% of the jobs listed in this Unit and tell how each of these jobs are related to a knowledge of mathematics.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: CONSUMER AND HOMEMAKING  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES:** (1) To enable students to identify several occupations related to the consumer and homemaking cluster.

(2) To acquaint students with requirements for various occupations in the cluster.

(3) To help students develop a greater understanding of the various aspects of the homemaking cluster.

(4) To familiarize students with the mathematics qualifications for various occupations in the homemaking cluster.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe numerous consumer and homemaking careers that are dependent on math to some degree.</p> <p>The students will be able to identify and describe the duties and educational requirements for consumer and homemaking related jobs discussed in this unit.</p>	<p>Baker Butcher Chef Clothing designer Cook Dietician Dressmaker Economist Household worker Interior Decorator Tailor</p>	<p>Pre Test</p> <p>Have students identify as many occupations as possible occupations on the pre-test.</p> <p>Show sound slides on jobs related to homemaking and consumer education.</p> <p>Students will solve math problems that are related to the homemaking and consumer cluster.</p> <p>Individual students or groups of students will conduct their own homemaking and consumer related field projects.</p> <p>Post Test</p>	<p>The students will be more aware of how math is related to consumer and homemaking occupations</p> <p>The students will be more aware of consumer and homemaking related jobs available in their community.</p> <p>The student will have a more positive attitude toward self, others, and the world of work.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Film: "Mass Production (How Clothing is Made)"	Home Economist Pattern Maker Tailor And Dressmaker	Contact: School Home Economics Teacher Metropolitan Cleveland Jobs Council-Nation Alliance of Businessmen 1375 Euclid Avenue 861-6100	Contact: Bobbie Brooks	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT

**EVALUATION:** Successful attainment of objectives (1) and (2) will be based on the ability of 80-85% of the students to write a detailed description or orally identify at least 10 consumer and homemaking careers and state how each career is related to math. Teacher evaluation of pre test and post-test will be that at least 75-80% of pre test items and 80-85% of post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

MATHEMATICS - CONSUMER AND HOMEMAKING

PRE-TEST

GRADE LEVEL: 7, 8, 9

I. Check the occupations below which you feel might relate directly to the consumer and homemaking cluster:

       disc jockey  
  X   chef  
  X   tailor  
       airline pilot

       bartender  
  X   butcher  
  X   dietitian  
  X   clothing designer

POST TEST

II. Match these homemaking related occupations with their minimum educational requirements:

- |  |  |
|--|--|
| 1. dietitian <u>  a  </u>                  | a. college                                       |
| 2. baker <u>  c often b  </u>              | b. high school and trade or additional schooling |
| 3. cook <u>  d often c or b  </u>          | c. high school diploma                           |
| 4. butcher <u>  d often c  </u>            | d. less than high school diploma                 |
| 5. fashion designer <u>  b  </u>           |  |
| 6. tailor <u>  c  </u>                     |  |
| 7. dressmaker <u>  d often c  </u>         |  |
| 8. economist <u>  a  </u>                  |  |
| 9. executive housekeeper <u>  c or a  </u> |  |
| 10. home economist <u>  a  </u>            |  |
| 11. household worker <u>  d  </u>          |  |
| 12. interior decorator <u>  a or b  </u>   |  |

CONSUMER AND HOMEMAKING  
RELATED MATH PROBLEMS

GRADE LEVEL: 7, 8, 9

1. The following are ingredients for a recipe for "Burgundy Beefburgers". The recipe makes six servings.

1 lb. 8 oz. ground beef  
 $\frac{1}{2}$  cup soft bread crumbs  
1 egg  
 $\frac{1}{2}$  cup burgundy  
2 tablespoons sliced green onions  
1 teaspoon salt

Rewrite the ingredients for this recipe to serve the following amounts of people, converting measures to larger or smaller units as appropriate:

- a. 48 people  
b. 2 people  
c. 300 people
2. At right is the seasonally adjusted consumer price index for the period June 1, 1971 to May 31, 1972. For all problems, round off to the nearest percent.
- a. Find the average percent increase for the year.  
b. Using the average percent increase from part (a), find the average increase and new price for the following items:

<u>Item</u>	<u>Price in June '71</u>	<u>Increase</u>	<u>Price in May '72</u>
TV set	\$ 120		
Stereo	300		
Automobile	3,500		

OCCUPATIONAL CLUSTER: ENVIRONMENTAL CONTROL  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Mathematics

SUGGESTED GRADE LEVEL : 7, 8, 9

GENERAL OBJECTIVES : (1) To assist students in determining the types of careers they may decide to pursue.  
 (2) To inform students of the basic minimum mathematical qualifications necessary for success in particular job families.

(3) To avail the students with information describing the various requirements for the many career job titles.

(4) To assist students in understanding and defining the various aspects of how mathematics pertains or relates to the many career choices the student will be selecting

(5) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list or state the requirements for individuals interested in pursuing the jobs listed in the vocabulary.</p> <p>The students will be able to describe the general duties of the occupations listed.</p>	<p>Air pollution index                      Anthropologist                      Biochemist                      Botanist                      Job family                      Occupational Cluster                      Physicist                      Urban geographer</p>	<p>Students will list the many kinds of pollution they are familiar with and name a scientist who may be instrumental in preventing the increase of the kinds of pollution listed.</p> <p>Discuss the several types of environments inherent in a large urban area and discuss these environments that are beneficial and those that are detrimental to humanity.</p> <p>Invite TV weatherman to discuss the air pollution index and how it works.</p> <p>Post Test</p>	<p>The students have a better understanding of how mathematics relates to careers in Environmental Science.</p> <p>The students will have improved knowledge of the interrelations between the different functional areas of industry and business,</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Science and Technology"                      Filmstrips:                      "Conservation"</p>	<p>Oceanographer                      Meteorologist                      Geophysicist                      Geologist</p>	<p>Contact: persons from Air Pollutions or Water Pollution Control                      Contact:                      TV Weatherman</p>	<p>Contact:                      Tour Cleveland, East Side and the Lake for the purpose of discussing detrimental effects of pollution on the environment</p>	<p>Brochures                      Pamphlets                      SRA Kits                      Popeye Career Comics                      Occupational Outlook Handbook                      Chronicle Occupational Library                      DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives (1) and (2) will be based on the ability of 80-85% of the students to write or orally describe the duties, requirements, etc., for at least five environmental control jobs. Teacher rating of post test will be that at least 80-85% of the students will correctly answer 80% of the post test items.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS</b></p>				

**OCCUPATIONAL CLUSTER: MANUFACTURING  
JOB FAMILY:**

**SUGGESTED SUBJECT AREA:** Mathematics  
**SUGGESTED GRADE LEVEL:** 7, 8, 9  
**GENERAL OBJECTIVES**

- (1) To assist students in determining the types of careers they may decide to pursue.
- (2) To avail the students with information describing the various requirements for the many career job titles.
- (3) To assist students in understanding and defining the various aspects of how mathematics pertains or relates to the many career choices the students will be selecting.
- (4) To inform students of the basic minimum mathematical qualifications necessary for success in particular job families.
- (5) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to name one way that each of the workers studied, use mathematics in their occupations.</p> <p>The students will be able to identify and describe the duties and skills required in various jobs in the area of manufacturing.</p> <p>The students will be able to identify a variety of considerations involved in choosing a career.</p>	<p>Blue Collar Worker Die Maker Draftsmen Electrician Industrial Engineer Instrument Repairmen Mechanical Engineer Skilled Worker Unskilled Worker Welder White Collar Worker</p>	<p>Have students define the term industrial.</p> <p>Students will list major industries in the U.S. and the major industries in Cleveland, Ohio.</p> <p>Students will list and define ten different types of scientists.</p> <p>Discuss Cleveland as a Major industrial City.</p> <p>List and discuss some of the new industries that result from advance technological needs in our society.</p> <p>Post test</p>	<p>The students will be aware of the duties and requirements for jobs in the manufacturing cluster.</p> <p>The students will be able to discuss the relationship between mathematics and jobs in the manufacturing cluster.</p> <p>The students will have a more positive attitude toward self, others, and the world of work,</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Careers in Industry Careers in Machine Trades</p>	<p>Die Maker Dispatcher Draftsmen Electrician Instrument Repairman Maintenance Mechanic Mechanical Engineer Millwright Pipe Filter</p>	<p>Contact: Warner and Swasey</p>	<p>Contact: Bobbie Brooks Pepsi Cola Richmand Brothers Dandee Potatoe Chip and Pretzel Company</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Chronicle Occupational Library DOT (Dictionary of Occupational Titles)</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write or orally identify and describe at least 80% of the manufacturing jobs listed in this unit, and name one way in which each of the careers named utilize mathematics. (b) Correctly answer at least 80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES :** (1) To familiarize students with those qualities which distinguish marketing and distribution occupations.

(2) To acquaint the students with several marketing related occupations.

(3) To help the students identify outstanding job requirements for several marketing occupations, especially those related to mathematics.

(4) To acquaint the students with several marketing occupations which require mathematical skills.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Each student will pick five or more occupations from the vocabulary list and explain how each uses math in their everyday work.</p> <p>The students will be able to list or state the various requirements and basic operations involved in the various jobs listed in the vocabulary list.</p> <p>The students will be able to perform the basic operations involved in the occupations listed.</p>	<p>Account Manager Cashier Field Interviewer Job Family Marketing &amp; Distribution Occupational Cluster Public Relations- Personnel Researchers Retail Clerk Salesmen Statistical Analyst Survey Tabulator</p>	<p>The teacher will initiate an informal class discussion on various marketing and distribution careers.</p> <p>Students will form groups and write brief descriptions of requirements, trainings, etc., for various jobs in this cluster.</p> <p>Visual aids will be used to give a inside picture of one or several marketing operations.</p> <p>Students will be given matching columns containing occupations and job requirements and asked to correctly match them.</p>	<p>The students will be more aware of the fact that all jobs have a need for mathematics.</p> <p>The students will have knowledge of requirement and basic operation of a large variety of jobs in the marketing and distribution cluster.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DYER	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Careers in Sales"</p> <p>"The Joy of Selling"</p>	<p>Account</p> <p>Field Interviewer</p> <p>Manager</p> <p>Marketing</p> <p>Research Presentation</p> <p>Researcher</p> <p>Statistical Analyst</p> <p>Tabulator</p>	<p>Contact:</p> <p>American Marketing Association or, The Willmon Company</p> <p>14053 6th Street</p> <p>Cleveland, Ohio</p> <p>241-6956</p>	<p>Contact:</p> <p>Sears Roebuck &amp; Co.</p> <p>795-2233 Ext. 346</p> <p>8501 Carnegie Avenue</p> <p>Cleveland, Ohio</p> <p>(Observe actual Marketing practice in operation and gain a first hand knowledge of several marketing occupations)</p>	<p>Pamphlets</p> <p>Posters</p> <p>SRA Kits</p> <p>Popeye</p> <p>Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to write in detail or orally identify and describe requirements, duties, etc., of at least 80% of the jobs listed in this unit, and explain how at least five of these careers are related to math. Teacher rating of pre-test will be that at least 85% of the students should correctly answer 75%-85% of pre-test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

MATHEMATICS - MARKETING AND DISTRIBUTION

PRE-TEST

GRADE LEVEL: 7, 8, 9

- I. Place a check beside those occupations you would consider to be related to marketing and distribution.

\_\_\_\_\_ cashier

\_\_\_\_\_ nurse

\_\_\_\_\_ dancer

\_\_\_\_\_ real estate salesman

\_\_\_\_\_ chemist

\_\_\_\_\_ stock clerk

\_\_\_\_\_ service station attendant

\_\_\_\_\_ drill operator

- II. Next to each occupation, mark the letter of two math requirements that are considered to be necessary for that occupation.

1. cashier a,d

2. marketing researcher a,b,c,d

3. service station attendant a,d

4. insurance salesman b,d

5. real estate salesman c,d

6. receiving and shipping clerk a,d

- a. knowledge of decimal operations, facility in handling money
- b. statistics
- c. perimeter and area
- d. computing with integers

MATHEMATICS - MARKETING AND DISTRIBUTION

POST TEST

GRADE LEVEL: 7, 8, 9

1. Name at least six occupations related to marketing and distribution.
2. Choose any two of the occupations you listed above, and indicate what mathematical skills are required by the job.
3. Indicate for each area below, two occupations that ordinarily exist on any level of a department store operator.
4. Match the following marketing and distribution occupations with the applicable minimum educational requirements:
  - a. college degree
  - b. junior college or business college degree
  - c. high school diploma
  - d. less than high school diploma
  1. accountant b
  2. actuary a
  3. advertising account executive a
  4. advertising copywriter a or c
  5. bookkeeper c
  6. buyer c or a
  7. cashier c or d
  8. shipping & receiving clerk c or d
  9. stock clerk d
  10. industrial or labor relations worker a
  11. public relations worker a
  12. purchasing agent a or c
  13. real estate agent c or a
  14. auto salesman c
  15. manufacturer's salesman c
  16. radio, TV time salesman a
  17. house-to-house salesman d
  18. retail store salesman c

**OCCUPATIONAL CLUSTER: MARINE SCIENCE  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL :** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To assist students in determining the types of careers they may decide to pursue.
  - (2) To avail the students with information describing the various requirements for the many career job titles.
  - (3) To assist students in understanding and defining the various aspects of how mathematics pertains or relates to the many careers choices the students will be selecting
  - (4) To inform students of the basic minimum mathematical qualifications necessary for success in particular job families.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to portray the large number of Marine Science occupations that contribute to the life of a community and to demonstrate an awareness of the interdependence of these occupations.</p> <p>After reading Popeye Career Comics (Marine Science) the students will be able to cite the requirements and basic operations involved in a variety of Marine Science occupations.</p>	<p>Aquanaut Biologist Deck Hand Deep Sea Diver Ecologist Fish Wholesaler Fishing Boat Captain Food Processor Marine Geologist Oceanographers Scuba diver</p>	<p>Students will visit Cleveland Aquarium and discuss the mathematics involved in the care and feeding the aquatic life living there.</p> <p>Discuss the volume of water necessary for survival of aquatic life.</p> <p>Discuss the temperature ranges aquariums and terrariums must maintain to sustain aquatic life.</p> <p>Discuss mathematics involved in food preparation for aquatic life.</p>	<p>The students will be more aware of various Marine Science Careers they might want to pursue.</p> <p>The students will have more positive attitudes toward math and its importance in any area.</p> <p>The students will be knowledgeable about the minimum mathematical qualifications necessary for success in particular job families,</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: MARINE SCIENCE

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Seaport"</p> <p>Filmstrips:</p> <p>"What Good Is School"</p>	<p>Marine Biologist</p> <p>Marine Geologist</p> <p>Marine Meteorologist</p> <p>Oceanographer</p>	<p>Contact:</p> <p>The Cleveland Aquarium</p>	<p>Contact: The Cleveland World Port and discuss the lake's usefulness to the City of Cleveland and amount of annual upkeep to maintain an operable seaport</p> <p>Cleveland Aquarium Board of Education Classroom Ship</p>	<p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>SRA Career Information</p> <p>DOT</p> <p>Popeye Career Comics</p>

**EVALUATION:** Successful attainment of objectives No (1) and (2) will be based on the ability of 80-85% of the students to write in detail or orally identify and describe the duties, requirements, importance, etc., of at least 10 Marine Science Careers.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

OCCUPATIONAL CLUSTER. MARINE SCIENCE  
MATHEMATICS

Additional Learning Experiences or Activities

Discuss reading statistical charts and graphs on water depths.

Visit Submarine base at 9th Street, downtown Cleveland and Observe the gauges and meters that are utilized in submarine operations and how much mathematics is involved in this operation.

Have students discuss the consistency of temperatures of the water at certain ocean depths and the effect of the water pressure at certain depths.

**OCCUPATIONAL CLUSTER: Public Service Cluster  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL:** 7,8,9

**GENERAL OBJECTIVES:** (1) To enable students to identify several occupations related to the public service cluster.

(2) To acquaint students with requirements for various occupations in public service.

(3) To help students develop a greater understanding of the various aspects of the public service cluster, and its relationship to mathematics.

(4) To familiarize students with the mathematical qualifications for various occupations in the public service.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list ways in which public service jobs are related to mathematics.</p> <p>The students will be able to name and characterize a wide range of Public Service Occupations.</p>	<p>Clerk-Typist Director of Recreation Firemen Lawyer Librarian Meter Reader Playground attendant Policemen Policewomen Probation Officer Sanitarian Sewage Plant Attendant Telephone Operator</p>	<p>Pre-test Informal class discussion to identify jobs in public service according to services such as police, fire, gas, water, etc. Show film "Careers in Public Service". Plan field trip to Cleveland Water Department. Teacher will provide public service related to math problems for students to complete Use visual aids to explain public service jobs in more detail. Post test</p>	<p>The students will have a greater ability to describe the relationship between specific vocational activities performed in class and real occupations in the Public Service Cluster.</p> <p>The student will have a more positive attitude toward math and its relation to the world of work.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Careers in Public Service" "Science & Technology" "Erosion" "Earth--Changes in its Surface"	Geologist Meteorologist Police	Contact: City Hall Department of City Government	Contact: Cleveland Water Dept. Division of Water and Heat, Rm. 104, City Hall, 861-4600 (Ext. 443 or 444)  Cleveland Metropolitan Park  District Trailside Museum	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT
<p><b>EVALUATION:</b> Successful attainment of objectives one and two will be based on the ability of at least 80-85% of the students to orally discuss or write a detailed description of duties, requirements, etc. of 80% of the jobs listed in this Unit and also write or state at least one way in which each of the jobs are related to math. Teacher rating of post test will be based on the ability of at least 80% of the students to score a ten percent accuracy increase over their initial scores on the pre-test.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				



**OCCUPATIONAL CLUSTER: TRANSPORTATION**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Mathematics

**SUGGESTED GRADE LEVEL :** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To enable students to identify several occupations related to transportation.
  - (2) To acquaint students with requirements for various occupations in transportation.
  - (3) To help students develop a greater understanding of the various aspects of the transportation cluster, and their relationship to mathematics.
  - (4) To familiarize students with the mathematics qualifications for various occupations in the transportation cluster.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to demonstrate familiarity with the careers available in the transportation industry and with the extensive application of mathematics in these jobs.</p> <p>The students will correctly solve at least 80% of the math problems related to transportation.</p> <p>The students will be able to identify and describe jobs in the four different areas of transportation.</p>	<p><b>Air Traffic Controller</b>  <b>Airline Dispatcher</b>  <b>Flight Engineer</b>  <b>Line Maintenance Mechanic</b>  <b>Maintenance Base Mechanic</b>  <b>Pilot, Co-Pilot</b>  <b>Reservation Clerk</b></p>	<p>Students will identify various jobs in transportation, and categorize according to air, land, rail, water.</p> <p>Show and discuss film "Careers in Transportation".</p> <p>Compile list of air transportation jobs and their requirements, emphasize mathematical requirements.</p> <p>Plan a field trip to Hopkins' Airport to observe workers performing their duties.</p> <p>Have students solve mathematical problems related to transportation.</p> <p>Post Test</p>	<p>The students will have a more positive attitude towards self, others and the world of work.</p> <p>The students will be aware of a variety of jobs in the transportation cluster and how these jobs relate to math.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Careers in Transportation"                      "Airplanes Work for Us"                      "Trucks in Our Neighborhood"                      "Careers in Mathematics"</p>	<p>Airport                      Railroad                      Ships                      Crane Operator                      Diesel Mechanic                      Equipment Electrician</p>	<p>Contact: Public Relations Department of Cleveland Hopkins Airport                      Cleveland Port Authority or White Motor Company</p>	<p>Contact: Cleveland Hopkins Airport                      Cleveland Port Authority, Public Relations Representative 241-8004                      White Motor Company                      East 9th and St. Clair</p>	<p>Pamphlets                      Brochures                      SRA Kits                      Popeye Career Comics                      Occupational Outlook Handbook                      Chronicle Occupational Library                      DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to write detailed descriptions or orally discuss five jobs in each of the four different areas of transportation. Teacher rating of post test will be that at least 80% of the students correctly solve at least 75-80% of the post-test problems.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

OCCUPATIONAL CLUSTER: Agri-Business and Natural Resources Occupations  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Life Sciences

SUGGESTED GRADE LEVEL : 7,8,9

GENERAL OBJECTIVES : (1) To show a relationship between school subjects and opportunities that exist throughout life.

(2) To expose students to a full range of occupational opportunities available in the Cleveland community and Cuyahoga County.

(3) To create self-awareness of students' abilities.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to explain and describe the duties, educational requirements, fringe benefits, etc. for jobs listed in this Unit.</p> <p>The students will be able to identify and discuss a variety of considerations involved in choosing a career.</p> <p>The students will be able to enumerate a variety of generalized job characteristics on which he can base comparisons or desirable careers.</p>	<p>Agricultural Economist                      Agricultural Engineer                      Agronomist                      Biochemist                      Entomologist                      Geneticist                      Home Economist                      Horticulturist                      Human Nutritionist                      Inspector                      Microbiologist                      Pathologist                      School Teacher                      Soil Conservationist                      Soil Scientist                      Veterinarians</p>	<p>Pre-test -- Post test</p> <p>The students will make a list of various jobs in the agri-business and natural resource occupations which are related to science.</p> <p>Show visual aids that point up other related jobs and describe their significance.</p> <p>Add the list of new jobs from the filmstrip to those previously mentioned and list or state the educational and job requirements.</p> <p>Invite speaker from a local company to speak to the class about job opportunities in the area of Agri-Business and Natural Resources. Plan a field trip.</p>	<p>The students will have more positive attitudes toward the world of work.</p> <p>The students will be aware of Natural Resource jobs available in the Cleveland community.</p> <p>The students know the general duties, educational requirements and benefits offered in the career areas listed.</p>

AGRI-BUSINESS AND NATURAL RESOURCES OCCUPATIONS

INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Health Careers" "Horizon Unlimited" "Earth--Resources in its Crust" "Insects in a Garden" "Garden Plants and How They Grow"	Biophysicist Corn Farmer Dairy Farmer Ecologist Geneticist Horticulturist Live Stock Farmer Plant Propagator Poultry Farmer	Contact: John Carroll University Biology Department City of Cleveland Greenhouse	Contact: Case Western Reserve University, Genetics Department and Biology Department Natural Science Museum Etomology Department Department of Environmental Control, City of Cleveland	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT People and Choices--Career Folios

**EVALUATION:** Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to: (a) write or orally explain and describe the duties, educational requirements, etc. of 80% of the jobs listed in this Unit, (b) write at least three considerations involved in one's career choice.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

LIFE SCIENCE - AGRI-BUSINESS AND NATURAL RESOURCES

PRE-TEST

GRADE LEVEL: 7, 8, 9

1. What is a natural resource and how is it related to agriculture?
2. Name some of the different jobs in conservation.
3. Why is there a need for conservation?
4. Have you ever practiced conservation on a farm?
5. Name five different types of conservation programs.
6. What is the job of a conservationist or agriculturalist?
7. What are the benefits of a conservation career?
8. Do you know someone who is a conservationist or agriculturalist?
9. Name three types of soil.
10. Where does acid soil come from and how is it made?

**OCCUPATIONAL CLUSTER: Environmental Control**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Science

**SUGGESTED GRADE LEVEL:** 7,8,9

**GENERAL OBJECTIVES:** (1) To help students gain a better knowledge of the environmental control program and its related occupations.

(2) To show a relationship between school subjects and opportunities that exist throughout life.

(3) To broaden the occupational aspirations of youth in the high-poverty Model-cities area schools.

(4) To acquaint students with Cleveland community resources leading to jobs.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify and describe a number of occupations that have changed or developed recently in response to the need to improve man's use of the environment.</p> <p>The students will be able to describe the duties and requirements of jobs listed in this Unit.</p> <p>The students will be able to list and explain all fringe benefits and job opportunities available for advancement in Environmental Control Occupations.</p>	<p>Conservation</p> <p>Environmental-Control</p> <p>Fire Warden</p> <p>Forest Aide</p> <p>Forest Technician</p> <p>Forest Technology</p> <p>Occupational Cluster</p> <p>Pruner</p> <p>Science Sprayer</p> <p>Tree Planter</p>	<p>Pre-test --- Post test</p> <p>Students will list various jobs in environmental control--they will work in groups to determine the need for the specialities listed.</p> <p>Show filmstrip that depicts related jobs--discuss educational job requirements.</p> <p>Invite speaker to discuss environmental control careers.</p> <p>Plan a field trip down the Cuyahoga River and observe effects of environmental control</p>	<p>The students will be more knowledgeable about the concept of environmental control and the occupations therein.</p> <p>The students will be more aware of environmental control jobs available in the city of Cleveland.</p> <p>The students will have a more positive attitude toward self, others and the world of work.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Scientist at Work" "Science and Technology" "Conservation" Filmstrip: "Man's Natural Environment: Crisis Through Abuse"	Geologist Geophysicist Meteorologist Oceanographer	Contact: State Agency-Environmental Control Agent	Contact: A boat cruise down the Cuhahoga River Contact: The Good-time Cruise Line 150 East 209, Cleveland, Ohio, 531-1505	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT

**EVALUATION:** Successful attainment of objectives in this Unit will be based on: (a) the ability of 80-85% of the students to orally describe and identify 80% of the environmental control jobs listed in this Unit, and (b) the ability of at least 80% of the students to show, on the post test, a 10% accuracy increase over their initial scores on the pre test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Health Service Occupations**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Science

**SUGGESTED GRADE LEVEL :** 7, 8, 9

**GENERAL OBJECTIVES :** (1) To show a relationship between school subjects and opportunities that exist throughout life.

(2) To enable students to gain a better knowledge of the requirements and qualifications for Health Service Occupations.

(3) To create bridges between school and earning a living.

(4) To create self-awareness of students' abilities.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Students will be able to explain the functions and duties of each Health Service Occupation listed in this Unit.</p> <p>Through tours, games and occupational kits, the students will sample the operations and skills required in a large number of health careers.</p>	<p>Audiologist                      Chiropractor                      Dental Hygienist                      Dietitian                      Lab Technician                      Medical Lab Assistant                      Medical Records Librarian                      Nurse                      Optometrist                      Pharmacist                      Physical Therapist                      Physician                      Podiatrist                      Sanitarians                      Speech Pathologist                      X-Ray Technician</p>	<p>Pre-test -- Post test</p> <p>Using lists of various jobs in the Health Service Cluster, the students will form small groups and discuss the need for the occupations listed.</p> <p>Show and discuss the importance of related jobs in the health service field.</p> <p>Discuss the educational requirements for the jobs discussed.</p> <p>Make bulletin board of various health careers.</p>	<p>The students will be aware of the minimum requirements, minimum salary, fringe benefits and job opportunities in the Health Careers listed in this Unit.</p> <p>The student will have some knowledge of Cleveland community resources leading to jobs.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "About the Human Body" "Good Health Practices" "Health and Families" "Dentistry Through the Ages"	Dentist Dietitian Doctor Librarian Medical Records Nurse Nutritionist Pharmacist Physical Therapist X-Ray Technician	Contact: Greater Cleveland Hospital Association  City of Cleveland Health Service Department	Contact: Cleveland Clinic  Cleveland Metropolitan General Hospital  City of Cleveland Health Service Depart- ment  Health Museum	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Out- look Handbook Chronicle Occupa- tional Library DOT

**EVALUATION:** After participating in activities in this Unit, at least 80% of the students will be able to write or orally identify and describe duties, requirements, descriptions, etc. of 80% of the health careers listed in this Unit. Successful attainment of post test objectives will be based on the ability of 80% of the students to obtain a 10% accuracy increase over their initial scores on the pre-test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

SCIENCE - HEALTH SERVICE OCCUPATIONS

PRE-TEST

GRADE LEVEL: 7, 8, 9

1. Define the term Health.
2. Why is Health an important issue?
3. Name some of the different jobs in the Health Service Occupations.
4. Why is there a need for Health Service Occupations?
5. What Health Services have you used?
6. Do you know someone who has selected or chosen a Health Service Occupation as a career?
7. What basic skills are needed in the Health Service Occupation field?
8. What future services must Health Service Occupations provide?
9. How would you evaluate a Health Service Occupation?
10. What suggestion would you incorporate in the objectives or goals of the Health Service Program?

OCCUPATIONAL CLUSTER: Marine Science Occupations  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Natural Science

SUGGESTED GRADE LEVEL: 7,8,9

GENERAL OBJECTIVES: (1) To enable students to develop a greater ability to describe the relation between specific vocational activities and real occupations.

(2) To improve the students' knowledge of the requirements and operations involved in a variety of occupations.

(3) To create self awareness of students' aptitudes.

(4) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to explain and describe the functions, skills and minimum educational requirements needed for various marine science occupations.</p> <p>The students will be able to identify a variety of considerations involved in choosing a career.</p> <p>The students will be able to list and describe various marine science jobs available in the city of Cleveland.</p>	<p>Biological</p> <p>Chemical</p> <p>Geological</p> <p>Marine Meteorologist</p> <p>Oceanographer</p> <p>Oceanographic Engineers</p> <p>Physical</p> <p>Science Teacher (Biology)</p>	<p>Pre test</p> <p>Post test</p> <p>Students will list various jobs in the oceanographic profession and will work in groups to determine the need for the specialities listed.</p> <p>Show visual aids that point up other related jobs and describe their significance.</p> <p>Invite a speaker from a local company to speak to the class about job opportunities in the field of oceanography.</p> <p>Plan field trip to oceanography laboratory or to a university which offers course in oceanography.</p>	<p>The students will be knowledgeable about the duties and requirements for jobs in the area of marine science.</p> <p>The students will have a more positive attitude toward others, self and the world of work.</p> <p>The students will be more aware of job opportunities available in the city of Cleveland.</p>

FILMS, FILM TRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Oceanography"                      "Exploring the Ocean"                      "What's Under the Ocean"</p>	<p>Marine Biologist                      Marine Geologist                      Skin Diver</p>	<p>Contact:                      Case Western Reserve University                      Biology Department</p>	<p>Contact:                      Case Western Reserve University's Biology Department</p>	<p>Pamphlets                      Brochures                      SRA Kits                      Popeye Career Comics                      DOT                      Chronicle Occupational Library                      Occupational Outlook Handbook                      People and Choices - Career Folios</p>

**EVALUATION:** Successful attainment of objectives in this Unit will be based on the ability of at least 80-85% of the students to write, in detail, or orally describe the duties, requirements, benefit, etc. of 80% of the Marine Science jobs listed in this Unit and write at least three considerations involved in choosing their future careers. Attainment of post test objectives will be based on the ability of 80% of the students to obtain a 10% accuracy increase over their initial scores on the pre-test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Public Services**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA: Science**  
**SUGGESTED GRADE LEVEL: 7,8,9**  
**GENERAL OBJECTIVES: (1)**

To make students aware of the vastness of the field of science, and to help each student gain a better knowledge of Public Service Occupations through:

- a. explaining the function and duties of each public service occupation listed.
- b. describing the minimum educational requirements needed for the occupations.
- c. describing the experiences needed for minimum and maximum pay.
- d. listing and explaining all fringe benefits and job opportunities for advancement within the field.

- (2) To acquaint students with Cleveland Community Resources leading to jobs.
- (3) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to cite the functions, duties and minimum educational requirements for Public Service jobs discussed in this Unit.</p>	<p>Bacteriologist            Doctor            Biologist            Botanist            Dietitian            Nurse            Nurse's Aide            Occupational Cluster            Sanitation Engineer            Chemist            X-Ray Technician            Zoologist</p>	<p>Pre test      ---      Post test            List and discuss the need for various jobs in the Public Service cluster.            Working in small groups, the students will determine the need for the occupations listed.            Show visual aids that point up other related jobs in this cluster.            Discuss educational and job requirements for the public service jobs.            Invite a speaker to discuss opportunities in the field of Public Service.</p>	<p>The students will have a greater knowledge of the educational requirements and job opportunities available in the area of Public Services in Cleveland.            The students will be more aware of employment trends and outlook in Public Service Careers.</p>
<p>After touring various health facilities, participating in various group discussions and viewing slides and films, the students will be able to list or state the duties, educational requirements, and various fringe benefits for one working in the Public Service areas discussed.</p>			

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>FILMS:</p> <p>"About the Human Body"</p> <p>"Simple Demonstration With Water"</p>	<p>Chemist</p> <p>Dietitian</p> <p>Doctor</p> <p>Dog Warden</p> <p>Geologist</p> <p>Medical Records Secretary</p> <p>Nurse</p> <p>Nutritionist</p> <p>X-Ray Technician</p>	<p>Contact:</p> <p>Public Health Service Department</p> <p>City of Cleveland</p>	<p>Contact:</p> <p>Chester Clinic</p> <p>St. Lukes Hospital</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>DOT</p> <p>Occupational Outlook Handbook</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one and two will be based on the ability of at least 80-85% of the students to write, in detail, or orally discuss the functions, duties, educational requirements, etc. of 80% of the Public Service jobs listed in this Unit. Teacher rating of post test will be based on the ability of 80% of the students to score a 10% accuracy increase over their initial scores on the pre-test.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

OCCUPATIONAL CLUSTER: Business and Office  
 SPECIFIC JOB: Receptionist

SUGGESTED SUBJECT AREA: Typing  
 SUGGESTED GRADE LEVEL : 7,8,9

- GENERAL OBJECTIVES :
- (1) To help students understand how typing is related to the job of a receptionist.
  - (2) To help the student to acquire knowledge of the nature of the work done by a receptionist.
  - (3) To introduce training, other qualifications and advancements to the students.
  - (4) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to sample the skills and operations involved in a job as a receptionist through field trips and actual practice in the classroom.</p> <p>The students will be able to identify a variety of considerations involved in choosing a career.</p> <p>The students will be able to describe the duties and requirements for one interested in becoming a receptionist.</p>	<p>Receptionist</p>	<p>Students will list and discuss the personal characteristics, duties, etc. of a receptionist.</p> <p>Students will name the different places and types of offices where receptionists are found.</p> <p>Show film, "Careers in Business and Office Occupations."</p> <p>Plan a trip to an office so that students can actually see how a receptionist's job would differ from a secretary's job.</p> <p>Post test</p>	<p>The students will have a more positive attitude toward self, others and the world of work.</p> <p>The students will be aware of the importance of developing a wide variety of marketable skills</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

BUSINESS AND OFFICE - Receptionist

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Business and Office Occupations"</p>		<p>Contact: Metropolitan Cleveland Jobs Council 1375 Euclid Avenue  Addressograph Multi-Graph</p>	<p>Contact: Addressograph Multi-Graph, Babbitt Road  Warner and Swasey  Eaton Corporation 100 Erieview Plaza</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics DOT Occupational Outlook Handbook  Chronicle Occupational Library</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one and two will be based on the ability of at least 80-85% of the students to take turns serving as receptionist in a mock office set-up in the classroom, the same percentage of students will also be able to write three considerations involved in choosing a career as a receptionist. Attainment of post test objectives will be based on the ability of at least 80-85% of the students to correctly answer 80% of post test items.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				



**OCCUPATIONAL CLUSTER:** Business and Office Occupations  
**SPECIFIC JOB:** Secretary

**SUGGESTED SUBJECT AREA:** Typing

**SUGGESTED GRADE LEVEL :** 8,9

**GENERAL OBJECTIVES :** (1) To show students the various tasks involved in secretarial jobs other than typing and taking shorthand.

(2) To acquaint students with the various places of employment.

(3) To help students acquire knowledge as to the amount of training, the qualifications and the advancements that are related to the job.

(4) To create self-awareness of students' aptitudes.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify and describe the varied duties and requirements of one interested in becoming a secretary.</p> <p>Through role-playing and class discussions and "hands on experience", the students will sample the operations and skills required in the secretarial field.</p>	<p>Secretary</p>	<p>Invite a secretary to class, discuss his/her duties and other pertinent information that may be helpful to the students.</p> <p>Plan a trip to the Cleveland Trust Bank to show students how secretaries perform in the office and how their work may vary from day to day.</p> <p>Assuming that each student is a secretary, have each one demonstrate one of the roles of a secretary.</p>	<p>The students will be aware of the various places in Cleveland that employ qualified secretaries.</p> <p>The students will have a more positive attitude toward self, others and the world of work.</p> <p>The students will be aware of duties and requirements for one interested in becoming a secretary.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Your Career as a Secretary"                      "Careers--Clerical"</p>	<p>Office Machine Operator                      Secretary                      Typist</p>	<p>Contact:                      National City Bank                      Ohio Bell                      U.S. Federal Civil Service Job Information Center</p>	<p>Contact:                      Cleveland Trust Bank</p>	<p>Pamphlets                      Brochures                      SRA Kits                      Popeye Career Comics                      DOT                      Chronicle Occupational Library                      Occupational Outlook Handbook</p>

EVALUATION: Successful attainment of objective one will be based on the ability of at least 80-85% of the students to write, in detail, or orally describe the requirements, duties, training, etc. necessary for a career as a secretary. Teacher rating of students' "hand-on" secretarial experience will be that at least 80-85% of the students will role-play and perform some of the duties of a secretary in varied classroom activities.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

**Business and Office  
Occupational Cluster:  
Occupations  
Specific Job: Typist**

**SUGGESTED SUBJECT AREA:** Typing

**SUGGESTED GRADE LEVEL:** 8, 9

**GENERAL OBJECTIVES:** (1) To help students to be able to distinguish between a junior typist, a senior typist and a clerk typist, and the duties of each.

(2) To make students aware of the basic requirements of a good typist.

(3) To help students to understand the difference between tele-typewriters, proportional spacing typewriters, electric typewriters, and manual typewriters.

(4) To create self-awareness of students' aptitudes.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to type at least 30 words per minute with a minimum of five errors.</p> <p>The students will be able to distinguish between a tele-typewriter, a proportional spacing typewriter, an electric typewriter and a manual typewriter.</p> <p>The student will be able to describe the various duties and requirements for one interested in becoming a typist.</p>	<p>Clerk Typist</p> <p>Junior Typist</p> <p>Senior Typist</p>	<p>Pre-test -- Post test</p> <p>Explain the duties of a junior typist, senior typist and a clerk typist.</p> <p>Discuss the requirements of a typist.</p> <p>Invite a speaker to answer any questions the students may have. The speaker will give a brief lecture on the duties of a typist.</p> <p>Have students make a chart listing the differences and similarities of the receptionist, secretary and the typist.</p>	<p>The students will have a more positive attitude toward self, others and the world of work.</p> <p>The students will be more aware of the importance of developing typing in school.</p> <p>The students will be aware of how typing skills can be helpful in other school subjects and in obtaining part-time and summer jobs.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Film: "Careers--Clerical"	Typist	Contact: National City Bank  US Federal Civil Service: Job Information Center  Ohio Bell  Standard Oil Company	Contact: Ohio Bell  Federal Building	Pamphlets Brochures SRA Kits Popeye Career Comics DOT Occupational Outlook Handbook Chronicle Occupational Library

**EVALUATION:** Successful attainment of objectives one, two and three will be based on: (a) the ability of at least 80% of the students to type at least 30 words per minute with a minimum of three errors, (b) the ability of at least 80% of the students to give a brief oral description of four kinds of typewriters listed in objectives number two, and (c) the ability of at least 80% of the students to write, in detail, or orally describe the duties, requirements, etc. for one interested in becoming a typist.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: COMMUNICATION & MEDIA  
JOB FAMILY: NEWSPAPER REPORTER FOR FOODS**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL:** 7,8,9,

**GENERAL OBJECTIVES:** (1) To expose students to the interests daily newspapers provide for us

(2) To make students aware of personal characteristics that would be important in the newspaper world--"Nose for News," curiosity, persistence, initiative, accurate memory, and and the physical stamina necessary for an active life.

(3) To help students be aware of the importance of a good background in nutrition and cooking skills.

(4) To acquaint students with special writing skills involved in writing newspaper articles

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list or state at least six personal characteristics that would be important in the newspaper world.</p> <p>The student will be able to list or discuss the various operations of value in reporting for the foods section of a newspaper.</p>	<p>Communication</p> <p>Job family</p> <p>News reporter</p> <p>Occupational cluster</p>	<p>Introduce students to different types of articles that appear in the food section of the newspaper.</p> <p>Have students evaluate newspaper food section in reference to reasons they feel the editor picked this particular subject.</p> <p>After viewing a demonstration on cooking foreign food, the student will write an article summarizing the presentation.</p> <p>Visit test kitchen of the Plain Dealer.</p> <p>Interview a reporter from the Plain Dealer.</p> <p>Post test</p>	<p>The students will be more aware of the various jobs available in the newspaper business.</p> <p>The students will be able to perceive the relation between specific vocational educational education activities and "real" occupations.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: COMMUNICATION AND MEDIA

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Filmstrip, Communication, The Newspaper</p>	<p>Reporter Home Economist</p>	<p>Contact: Invite East Ohio Gas Representative to give a demonstration on cooking foreign food.  Local Newspapers</p>	<p>Contact: Test kitchen of the Plain Dealer (watch reporter testing the recipes.</p>	<p>Occupational Outlook Handbook Chronicle Occupational Library  SRA Kits DOT</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write a list of at least five personal characteristics that would be important in newspaper careers. (b) write or orally discuss the duties, operations, and requirements for a reporter interested in working for the foods section of a newspaper. Teacher evaluation of post test will be that at least 80-85% of the students will correctly answer 80% of post test items

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**Agri-Business and Natural  
 OCCUPATIONAL CLUSTER: Resources  
 SPECIFIC JOB: County Extension Worker**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students to become aware of the importance of a good background in home economics.

(2) To introduce students to the idea of extension workers helping people with their home problems: (The main objective is helping people to help themselves).

(3) To expose students to the personal characteristics that are important (good speaking ability, creativity, well-groomed, friendly).

(4) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe and identify the various duties performed by a County Extension Worker.</p> <p>The student will be able to identify a variety of considerations involved in choosing a career as a County Extension Worker.</p>	<p>Agri-Business            County Extension Worker            Home Economics            Job Family            Occupational Cluster</p>	<p>Pre-test</p> <p>Introduce students to the idea of Extension Workers helping themselves.</p> <p>Discuss ways in which Extension Workers inform people of latest research in home economics field.</p> <p>Student reports on subjects that would be of interest to Extension Workers (e.g. F.H.A., civics class, Mother's clubs, etc.).</p> <p>Post test (Same as Pre-test)</p>	<p>Students will be aware of the personal characteristics that are important in working with people.</p> <p>The students will be able to perceive the importance of a good background in home economics in relation to related careers.</p> <p>The students will have a greater ability to describe the relations between specific vocational activities and real occupations.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
		<p>Contact: Cooperative Extension Services Cleveland, Ohio 631-1890</p>	<p>Contact: Cooperative Extension Services, Cleveland, Ohio, 631-1890</p>	<p>Occupational Outlook Handbook Chronicle Occupational Library SRA Kits DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives number one and two will be based on: (a) the ability of 80-85% of the students to write in detail or orally identify and describe the duties, personal and educational requirements, etc. of a County Extension Worker, and (b) the ability of all students to orally cite at least three considerations involved in choosing a career as a County Extension Worker.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				



**OCCUPATIONAL CLUSTER: COMMUNICATIONS AND MEDIA  
JOB FAMILY: RADIO AND TV BROADCASTING**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVE:**

- (1) To create an awareness of the important part radio and television play in our daily living.
- (2) To expose students to the types of jobs available to women in a field that at one time was exclusively male.
- (3) To make students aware of personal characteristics and educational requirements by employers.
- (4) To help students understand how a good knowledge of the field of home economics would be helpful in specific areas of broadcasting.
- (5) To create bridges between school and earning a living.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the requirements for individuals interested in careers in the Radio and TV broadcasting field.</p> <p>The student will be able to identify a variety of considerations involved in choosing a career in the communications and media cluster.</p>	<p>Broadcaster Casting director Costumes or set designer Job family Newswriter Occupational Cluster Producer (Radio and TV) Production assistant Supervisor (Of religious and childrens programs) Time Salesman</p>	<p>Introduce Students to the different areas of communication.</p> <p>Have students list different ways television is both entertaining and educational.</p> <p>Aquaint girls to type of jobs in the broadcasting field they may be interested in.</p> <p>Invite costume designer to discuss past experiences in home economics and how it helped.</p> <p>List her particular job.</p> <p>Field trip-WVIZ TV Station</p> <p>Post Test</p>	<p>The students will have knowledge of the basic requirements and operations of occupations in the area of radio and TV broadcasting.</p> <p>The students will be more aware of the role radio and TV plays in providing information about goods and service.</p>



INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: COMMUNICATIONS & MEDIA

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Television is What You Make It"</p> <p>"Communication and Our Town"</p> <p>"Radio"</p> <p>"Television Serves its Community"</p>	<p>Announcer</p> <p>Broadcast-Technician</p> <p>Chief Engineer</p> <p>Consultant</p> <p>Director</p> <p>Disc Jockey</p> <p>Field Technician</p> <p>Make-up Artist</p> <p>Music Director</p> <p>News Director</p> <p>News Writer</p> <p>Program Director</p> <p>Public Relations</p> <p>Producer</p> <p>Station Manager</p> <p>Traffic Manager</p> <p>Video Technician</p>	<p>Contact:</p> <p>Costume Designer</p> <p>Radio and Television Stations</p>	<p>Contact:</p> <p>WVIZ TV Station</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

EVALUATION: Successful attainment of objectives (1) and (2) will be based on the ability of 80-85% of the students to (a) write or orally identify, and describe the duties, requirements, benefits, etc., of all jobs listed in this unit, and write at least three considerations involved in choosing a career in communications and media jobs. Teacher evaluation of post-test will be that at least 80-85% of the students will correctly answer at least 80% of the post test items.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

**OCCUPATIONAL CLUSTER: FINE ARTS AND HUMANITIES  
JOB FAMILY: COSMETOLOGIST**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL :** 7, 8, 9

**GENERAL OBJECTIVES :**

- (1) To help students gain a knowledge of the increasing importance of the occupations available in the field of cosmetology.
- (2) To focus attention on the various qualifications required for occupations in the field.
- (3) To help students understand how good personality characteristics are significant in this field.
- (4) To show students how home economics is cosmetology.
- (5) To help students understand various aspects of the fields of cosmetology.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list various jobs in the field of cosmetology. They will also be able to list the types of training required.</p> <p>The students will be able to orally state the difference between a cosmetologist and a beautician.</p> <p>The students will be able to define all vocabulary terms in this unit.</p>	<p>Beautician Beauty Operator Cosmetologist Fine Arts Hair Stylist Humanities Job Family Manicurist Occupational Cluster</p>	<p>Discuss vocabulary terms</p> <p>Difference between a cosmetologist and a beautician.</p> <p>Make a bulletin board showing various jobs in the field of cosmetology.</p> <p>Role-play a situation related to a phase of cosmetology.</p> <p>Students will plan, list, and discuss the operation involved in operating a beauty shop.</p> <p>Post test</p>	<p>The students will have gained more knowledge of the skills and personal qualities required for jobs in the cosmetology field.</p> <p>Students will be able to describe the relation between home economics and the field of cosmetology</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: FINE ARTS AND HUMANITIES

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "World of Work" "Hair Dresser" "Beauty for a Career"	Beautician	Contact: Wilkins School of Cosmetology  Erma Lee Beauty School	Contact: Jane Addams Vocational High School Cosmetology Department  Barber College  Erma Lee Beauty School  Wilkins' School of Cosmetology	Brochures  Pamphlets  SRA Kits  Popeye Career Comics  Occupational Outlook Handbook  Chronical Occupational Library  People and Choices Career Folios  DOT

EVALUATION: Successful attainment of objectives in this unit will be based on the ability of 80-85% of participating students to write or orally discuss the job description, duties, etc., of the careers listed in this unit. Teacher rating of post test will be that 80-85% of the students will correctly answer 80% of post test items.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:

**OCCUPATIONAL CLUSTER: MANUFACTURING  
JOB FAMILY: APPAREL INDUSTRY**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL:** 7, 8, 9,

**GENERAL OBJECTIVES.** (1) To make students aware of the fact that the garment industry employs more women than any other industry.

(2) To acquaint the student with the different jobs available in the garment industry - designer, pattern maker, cutter, hand sewer, bushelmen or alterators, tailors, makers, sewing machine operators, thread trimmers and cleaners, pressers, inspectors and checkers

(3) To inform students of reasons for a good employment outlook in the garment industry.

(4) To help students understand the home economics qualifications needed in the garment industry

(5) To guide the students in choosing the proper courses needed in junior high school and senior high school to help them qualify for their desired job.

**SPECIFIC BEHAVIORAL OBJECTIVES**

The students will be able to cite some of the complexities of the apparel industry and identify various occupations involved in preparing a garment for the market.

After role playing, specific persons in charge of making a garment, the students will identify the various tasks involved in making the garment.

**VOCABULARY**

Bushelman  
Checkers  
Cutter  
Designer  
Hand sewer  
Inspector  
Job Family  
Occupational Cluster  
Pattern maker  
Presser  
Sewing machine operator  
Tailor  
Thread trimmer

**LEARNING EXPERIENCES OR ACTIVITIES**

Pre-test  
Have students work in groups each playing the role of specific persons in charge of making a garment.  
Make a bulletin board of articles found in newspapers about fashion changes.  
Plan a comparative study of field trips made to determine exact job opportunities and qualifications.  
Examine the leading fashion magazines to pull.  
Post test

**DESIRED OUTCOMES**

The students will be acquainted with the different jobs available in the garment industry, and the various level of skills required  
The student will be more aware of the relationship between school subjects and opportunities that exist throughout life.

**OCCUPATIONAL CLUSTER: MANUFACTURING-APPAREL INDUSTRY**

**INSTRUCTIONAL AND RESOURCE MATERIALS**

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Careers in Industry</p>	<p>Designer Pattern Maker Inspector and Checker Tailors and dress makers</p>	<p>Contact: Bamberger Rental Co. Bobbie Brooks</p>	<p>Contact: Richmond Brothers Bobbie Brooks Jane Addams Vocational High School Explore the training and courses of study relating to the clothing courses</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library People and Choices Career Folios DOT</p>
<p>"Mass Production How Clothing is Made"</p>	<p>Sewing Machine Operators</p>			
<p>"Clothes around the world"</p>	<p>Hand Sewers Thread Trimmers and Cleaners Bushelmen</p>			
<p>"Fiber to Fabric"</p>				

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to write or orally identify and describe at least 10 occupations involved in preparing a garment for market. Teacher rating of post test will be that at least 80% of the students will obtain a 10% accuracy increase over their initial scores on the pre test.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER:** Marketing and Distribution  
**JOB FAMILY:** Marketing Research

**SUGGESTED SUBJECT AREA:** Home Economics  
**SUGGESTED GRADE LEVEL :** 7, 8, 9  
**GENERAL OBJECTIVES :**

- (1) To create an interest and awareness of rapidly increasing field of marketing research its importance in the '70's.
- (2) To give the students the requirements for various occupations in marketing.
- (3) To help students relate their knowledge of home economics to marketing.
- (4) To help students understand the home economics qualifications of various jobs in the marketing area.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to enumerate a variety of generalized job characteristics on which he can have comparison of desirable careers</p> <p>The students will sample skills and operations involved various careers in marketing research by actually conducting interviews conducting surveys, conducting research and recording or tabulating the results of the above.</p>	<p>Advertising                      Availability                      Competition                      Consumer                      Interviewer                      Job Family                      Marketing                      Occupational Cluster                      Producer                      Product                      Research Presentation                      Statistical Analyst                      Tabulators                      Writer</p>	<p>Class discussions</p> <p>Make bulletin board showing products that could be researched and why.</p> <p>Using library sources and counselors, list places in the area of Marketing research that may be secured.</p> <p>Discuss the importance that research has on the producer and the consumer.</p> <p>Students will survey classmates on two food products.</p> <p>Post Test</p>	<p>The students will be able to relate knowledge of home economics to marketing.</p> <p>The students will be cognizant of the operations and skills required in various marketing careers.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION- RESEARCH

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Sales"</p>	<p>Marketing Re-searchers Statistical Analyst Tabulator Field Interviewer Account Manager</p>	<p>Contact: Sears Roebuck &amp; Co. May Company Higbee Company Pick-n-pay</p>	<p>Contact: Stouffer's (observe advertising and re-search department) Department Stores</p>	<p>Pamphlets Brochures SRA Kits Popeye Career comics Occupational outlook Handbook Chronicle Occupational Library DOT</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to orally identify and describe at least 80% of the jobs listed in this unit. Teacher rating of post-test will be that at least 80% of the students correctly answer 80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**



**OCCUPATIONAL CLUSTER: MARKETING & DISTRIBUTION  
JOB FAMILY: COMPARISON SHOPPER**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES:** (1) To make students aware that the role of the comparison shopper is to report on the merchandise and business stores in competition with the store employing her.

(2) To stress the importance of good home economics knowledge in household equipment, clothing, fabrics, etc.

(3) To expose students to necessary qualifications - good actress to give a good imitation of a woman shopping for herself rather than looking like a paid-comparison shopper.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Through role playing and actual comparison shopping, the students will sample the skills and operate required in the area of comparison shopping.</p> <p>The students will be able to list the difference between a merchandise shopper, price shopper and a response shopper.</p>	<p>Comparison shopper Home economics Job family Merchandise shopping Occupational cluster Price shopping Response shopper</p>	<p>Students will discuss reasons why characteristic such or good memory, natural curiosity, out-going personality, etc., are good for this type of work.</p> <p>Students will role play the parts of a comparison shopper and a sale clerk</p> <p>Invite a comparison shopper to relate her experience to the students.</p> <p>Students will pick five items and compare price shopping in different stores</p>	<p>The students will be aware of the role and qualifications required for that of a comparison shopper.</p> <p>The students will be more aware of the role of home economics in the production, management, and service areas of business and industry.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS      OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION - SHOPPER      COMPARISON

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVEP OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>Filmstrips:</p>		<p>Contact: The Public Relations Department of a local department store</p>	<p>Contact: The Public Relations Department of a local department store</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Attainment of objectives in this unit will be based on the ability of 80% of the students to write or orally identify and describe the duties, requirements, etc., of a comparison shopper and write the difference between a price shopper and a response shopper. Teacher rating of post test will be that at least 80-85% of the students will correctly answer 80% of post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Personal Service**  
**SPECIFIC JOB: Private Household Workers**

**SUGGESTED SUBJECT AREA:** Home Economics

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :**

- (1) To guide students to types of jobs available as household workers. (General maid, nursemaid, personal maid, infant's nurse, housekeeper, working companion, governess, cook, laundress, companion).
- (2) To expose students to the needs of certain people.
- (3) To stress the importance of good personal qualifications such as being neat, clean, trustworthy, healthy, etc.
- (4) To demonstrate increased needs of people in our modern society to employ household workers.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the requirements and general operations involved in the various jobs listed in the area of household workers.</p> <p>The students will be able to identify a variety of considerations involved in choosing a career.</p> <p>The students will be able to list and characterize a wide range of careers related to Personal Services.</p>	<p>Companion Cook General Maid Governess Housekeeper Job Family Laundress Nursemaid Occupational Cluster Personal Maid Personal Service Private Household Worker</p>	<p>Students will write and orally discuss reports on various types of household occupations.</p> <p>List on board examples of how home economics background is helpful in various household occupations.</p>	<p>The students have more insight into the importance of personality and attitudes in seeking jobs in any area.</p> <p>The students will be aware of the satisfaction gained from providing personal service for others.</p> <p>The students will be able to evaluate an occupation in terms of its actual contributions to society rather than its prestige stereotypes.</p>

PERSONAL SERVICE - Private Household Workers

INSTRUCTIONAL AND RESOURCE MATERIALS	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>FILMS, FILMSTRIPS, AND TAPES</p> <p>Films: "Careers in Personal Services" "Beauty for a Career"</p>	<p>Barber Beautician Governess Odd Job Man Valet</p>	<p>Contact: Representative from employment agency</p>	<p>Contact: Cleveland Sheraton Hotel</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Out-look Handbook Chronicle Occupational Library DOT</p>

**EVALUATION:** Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to write, in detail, or orally discuss the requirements and general operations involved in at least 80% of the Personal Service jobs listed in this Unit.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: TRANSPORTATION (AIR)  
JOB FAMILY: STEWARDESS**

**SUGGESTED SUBJECT AREA:** Home Economics  
**SUGGESTED GRADE LEVEL :** 7, 8, 9  
**GENERAL OBJECTIVES :**

- (1) To make students aware of the increasing need for stewardesses and the availability of jobs due to great turnover (40%) Yearly.
- (2) To stress the qualities airlines demand such as attractiveness, personality, and intelligence.
- (3) To inform students of the duties of airline stewardesses.
- (4) To inform students of the necessary educational background and training.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list requirements and duties of one interested in becoming an airline stewardess.</p> <p>The students will be able to list and actually perform some of the duties performed by airline stewardesses.</p>	<p>Job Family Occupational Cluster Steward Stewardess</p>	<p>Students will list on the board the advantages and disadvantages of being an airline stewardess.</p> <p>Show 3M slides on Airport.</p> <p>Discuss ways home economic background will be beneficial to an airline stewardess (manners, good grooming, cooking knowledge.</p> <p>Invite a stewardess to class for the purpose of relating her training and Job experience. Students will have prepared questions.</p> <p>Post Test</p>	<p>The students will have knowledge of the requirements and basic operations involved in performing the duties of an airline stewardess.</p> <p>The student will be aware of the employment trends.</p>



**OCCUPATIONAL CLUSTER:** Business and Office Occupations  
**SPECIFIC JOB:** Electronic Computer Operator and Service Repairman.

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students gain knowledge of occupations involved in the Business and Office Occupations Cluster.

- (2) To acquaint the students with requirements for jobs as electronic computer operators, repairmen and servicemen for the computers.
- (3) To help students develop an understanding of the jobs and how industrial arts relates to the jobs.
- (4) To help students understand how industrial arts can help in qualifying them for these jobs.
- (5) To create self-awareness of students' interests.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list ways in which a knowledge of techniques learned in an industrial arts class can help one in a job as an electronic computer operator and service repairman.</p> <p>The students will be able to identify the duties and educational requirements for a job as an electronic computer operator and service repairman.</p>	<p>Electronic Computer Operator Service Repairman</p>	<p>Have students research and find out what an electronic computer operator is and what he does.</p> <p>Students will discuss the duties and educational requirements for an electronic computer operator and service repairman.</p> <p>Use visual aids to relate these two jobs to industrial arts. (Electronic Computer Operator and Service Repairman)</p> <p>Post test</p>	<p>The students will be aware of the requirements and skills needed for the two jobs listed in this Unit.</p> <p>The students will be more aware of the relationship between school subjects and opportunities that exist throughout life.</p> <p>The students will have a more positive attitude toward self, others and the world of work.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS - BUSINESS AND OFFICE OCCUPATIONS - Electronic Computer Operator & Service Repairs

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Business and Office Occupations" "So You Want to be an Electronics Technician"</p>		<p>Contact: Electrbrnic Computer Operator, Eaton Corporation Repair and Service-man, Eaton Corp. IBM AT &amp; T (American Telephone and Telegraph)</p>	<p>Contact: Eaton Corporation Cuyahoga Community College--IBM Department IBM Greyhound Computer Center</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT</p>

**EVALUATION:** Successful attainment of objectives one and two will be based on: (a) the ability of 80% of the students to write or orally discuss at least three ways in which a knowledge of techniques learned in an industrial arts class can be helpful in jobs listed in this Unit, and (b) the ability of 80% of the students to accurately write or orally describe and identify the duties, requirements, etc. of jobs listed in this Unit. Teacher rating of post test will be based on the ability of 75-80% of the students to correctly answer at least 80-85% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**



INDUSTRIAL ARTS - BUSINESS AND OFFICE OCCUPATIONS

POST TEST

1. What are the duties of an electronics computer operator?
2. What qualifications does an operator need for the job?
3. Name three companies in Cleveland, Ohio where electronic computers are used.
4. Do you feel you could qualify for this job providing training was available to you?
5. Is an electronic computer operator's job important? Give reasons for your answer whether it is yes or no.
6. What is the salary of computer operators?
7. What qualifications do the electronic computer repairman and serviceman need?
8. Can one man handle the two jobs listed in # 7?
9. Does our work in the shop relate in any way to these jobs?
10. How would our work in the shop qualify you for these jobs?

**Communication and Media  
Occupational Cluster: Occupations  
Specific Job: Newspaper Photographer**

**SUGGESTED SUBJECT AREA:** Industrial Arts  
**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES:** (1) To help students understand what a photographer does.

(2) To acquaint students with requirements for the job.

(3) To acquaint students with a camera and show them the process which evolves from the time the picture is taken until the time it shows up in a newspaper.

(4) To show students that photographers are used in many industries not only on a newspaper. Show how fundamentals can carry from one job to another.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to take pictures with a simple camera and develop them in a dark room.</p> <p>The students will be able to list or describe ways in which a photography job relates to production of a newspaper.</p> <p>The students will be able to list various jobs in the city of Cleveland that use photographers.</p>	<p>Camera</p> <p>Dark Room</p> <p>Distributor</p> <p>Newsman (Reporter)</p> <p>Newspaper Editor</p> <p>Photoengraver</p> <p>Photographer</p> <p>Printing Pressman</p>	<p>Students will take pictures related to a prescribed theme (cameras will be provided). Set up dark room and go through developing process with students.</p> <p>Have students make a list of different industries who use photographers.</p> <p>Show movie on careers in communication.</p> <p>Invite a newspaper photographer to talk to class.</p> <p>Plan a field trip to a newspaper and follow the steps of a photographer and see how his job related to the entire production of the paper. (POST TEST)</p>	<p>The students will have pleasure and satisfaction from taking and developing their own pictures.</p> <p>Students will be familiar with a camera and how it works.</p> <p>The students will be aware of the operations and skills required in a newspaper photographer's job.</p>



## INSTRUCTIONAL AND RESOURCE MATERIALS COMMUNICATION AND MEDIA OCCUPATIONS - Newspaper Photographer

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Careers in Communication"</p> <p>Filmstrips:</p> <p>"Newspaper"</p>	<p>Newspaper Reporter</p>	<p>Contact:</p> <p>Newspaper Photographer, contact: Plain Dealer</p> <p>Call and Post</p> <p>The Press</p>	<p>Contact:</p> <p>Local Newspaper Companies</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Attainment of objectives in this Unit will be based on the ability of 80-85% of the students to:

(a) write detailed descriptions or orally identify all jobs listed in this Unit, (b) follow proper procedures and accurately develop one print in the dark room, and (c) orally discuss at least three ways in which jobs listed in this Unit relate to the total production of a newspaper. Attainment of post test objectives will be based on the ability of at least 80-85% of the students to correctly answer 80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

INDUSTRIAL ARTS - COMMUNICATIONS AND MEDIA

NEWSPAPER PHOTOGRAPHER - PRINTING PRESSMAN

POST TEST

1. List the duties of a newspaper photographer.
2. Name the chemicals needed in developing pictures.
3. Explain the importance of a dark room in the picture developing process.
4. Name five different industries that employ photographers.
5. Write a short resume of what you saw on our field trip to one of our local newspaper establishments.
6. Are all cameras alike? What are some of the differences we find in cameras?
7. What is a printing pressman? What qualifications are necessary for this job?
8. How important is the printing pressman's job in relation to the overall production of a newspaper?
9. How does your experience in the print shop help you toward obtaining a job as a printing pressman?
10. Name at least two places where one can go to observe a printing pressman in action.
11. List the educational requirements for a printing pressman and a newspaper photographer.

**OCCUPATIONAL CLUSTER: Communication and Media**  
**SPECIFIC JOB: Post Office Worker and Auto Mechanic**

**SUGGESTED SUBJECT AREA: Industrial Arts**  
**SUGGESTED GRADE LEVEL : 7,8,9**

**GENERAL OBJECTIVES :** (1) To create self awareness of students' interests.

(2) To help students realize that an auto mechanic is needed in many occupations not just in the post office.

(3) To acquaint students with basic components of an engine.

(4) To help students realize what qualifications are necessary for post office workers and auto mechanics.

(5) To introduce students to basic small engine in the shop, study basic parts and discuss parts where repair is frequently needed.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>With the aid of plastic models, tours and discussions, the students will be able to sample the operations and skills required in the area of auto mechanics.</p> <p>The students will be able to identify and describe the requirements of individuals working in a post office (mail carrier, postal clerk, etc.).</p> <p>The students will be able to identify the various tasks involved in safely delivering mail to their homes.</p>	<p>Auto Mechanic</p> <p>Guard</p> <p>Mail Carrier</p> <p>Mail Handler</p> <p>Postal Clerk</p>	<p>Students will list various industries where auto mechanics can find employment.</p> <p>Invite an auto mechanic to talk to class about his duties.</p> <p>Visit post office garage and observe an auto mechanic at work.</p> <p>Buy V-8 Engine project and have class construct an engine. Emphasize step by step process. (Renwal, Mimeola, N.Y.-visual V-8 engine, Plastic model)</p> <p>Make bulletin board dealing with motors.</p> <p>Post test</p>	<p>The student will have some knowledge of the basic components and functioning of an engine.</p> <p>The students will be aware of the requirements and duties of various post office jobs.</p> <p>Students will be more aware of their own interest and abilities.</p> <p>The students will have a more positive attitude toward others and the world of work.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"ABC of Internal Combustion"</p> <p>"ABC of Automobile Engines"</p>		<p>Contact:</p> <p>Director of Cleveland Post Office</p>	<p>Contact:</p> <p>Main Post Office Downtown Cleveland</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Plastic model or V-8 Engine</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>
<p><b>EVALUATION:</b> After completing this Unit, 80-85% of the students will be able to: (a) dismantle a small auto engine, identify and orally state the functions of 80% of the parts of the engine. With the instructor's help, the students will reassemble the engine, (b) orally discuss the duties, requirements, etc. of jobs listed in this Unit, and (c) correctly answer 75-80% of post test items (post test will be prepared by the instructor)</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: Communication and Media  
SPECIFIC JOB: Telephone Occupation**

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL :** 7,8,9

- GENERAL OBJECTIVES :**
- (1) To make students aware of occupations open to them in the telephone industry.
  - (2) To inform students of the necessary requirements for these jobs.
  - (3) To show the students how work in the shop can carry over into a job with the telephone company.
  - (4) To make students aware of the things installers, repairmen, and cable splicers do.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list and describe the duties of people working in telephone occupations.</p> <p>The students will be able to discuss a range of considerations that enter into career choice.</p>	<p>Apparatus Man Cable Splicer Coin Collector Installer Lineman Repairman Supply Man</p>	<p>Have students write a paper on an installer, repairman or cable splicer explaining <u>what</u> each job consists of.</p> <p>Bring in a telephone, remove the face and show the class <u>how</u> the various parts function.</p> <p>Invite an installer, repairman and a cable splicer in to talk to class.</p> <p>Show movie on communications.</p> <p>Make a bulletin board showing various careers in communication.</p> <p>Plan a field trip to the telephone company.</p>	<p>The students will be aware of telephone occupations available in the city of Cleveland.</p> <p>The students will have a greater ability to describe the relation between specific vocational activities and real occupations.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Careers in Communication" "Communicating Ideas"	Artist Copywriter Printing Pressman	Contact: Installer and repairman (contact Ohio Bell Telephone Company) Cable Splicer (Contact Ohio Bell Telephone Company)	Contact: Ohio Bell Telephone Company Western Electric	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT
<p><b>EVALUATION:</b> Successful attainment of objective number one will be based on the ability of 80% of the students to write or orally identify and describe duties, requirements, etc. of at least seven occupations associated with the rendering of telephone services to the public. Attainment of number two will be based on the ability of 80% of the students to write or orally cite at least three considerations that enter into any career choice.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				



**OCCUPATIONAL CLUSTER: Construction**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To examine each job career extensively enough to give the students an idea of what each job entails.

(2) To examine the qualifications needed for each job.

(3) To examine the salary and benefits required for each job.

(4) In construction these career jobs are very closely related; we want to inform students how they progress and show them what occurs when a breakdown occurs in a phase of construction.

(5) To help students understand how industrial arts aids the students in qualifying for some of these jobs.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify and describe at least ten different construction occupations and give examples of the need for teamwork on the job.</p> <p>The student will be able to describe a variety of ways in which industrial arts can be applied in the working world</p> <p>The students will be able to discuss or give examples of how industrial arts aids in qualifying for some of the construction jobs.</p>	<p>Abestos and Insulating Workers            Bricklayers            Carpenters            Cement Mason            Glazier            Ironworker            Laborer            Lather            Operating Engineer            Painter            Plaster            Plumber            Roofer            Sheet Metal Worker            Teamster</p>	<p>Have class list some of the things a bricklayer does--the class will also discuss qualifications, salaries and benefits.</p> <p>Students will list tools needed by a bricklayer and tell what each one is used for.</p> <p>Invite bricklayer to speak to class.</p> <p>Visit a construction site--have students observe and list various construction jobs.</p> <p>Give demonstration on how bricks are laid. Allow students to lay a few bricks, experiencing the problems that may arise.</p>	<p>The students will be aware of a variety of construction jobs available in the city of Cleveland.</p> <p>The students will be aware of the various construction skills he can learn in the classroom.</p> <p>The student will be aware of operations and skills involved in some of the jobs discussed.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Film:</p> <p>"Careers in Building Trades"</p> <p>"Building a House"</p> <p>"Building Trades--The House Builders"</p> <p>"American Harvest"</p>	<p>Bricklayer</p> <p>Carpenters</p> <p>Electricians</p> <p>Painter</p> <p>Plasterer</p> <p>Plumber</p> <p>Teamster</p>	<p>Contact:</p> <p>Recruitment and Training Program</p> <p>10609 Euclid Avenue</p> <p>795-3900</p> <p>Bureau of Apprenticeship and Training</p> <p>1240 East 9th St.</p> <p>552-3823</p> <p>Youth Opportunity Center, Apprenticeship Information</p> <p>579-7800</p>	<p>Contact:</p> <p>Visit several construction sites (residential and commercial)</p>	<p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p> <p>SRA Career Informational</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one, two and three will be based on the ability of 80-85% of the students to write, in detail, or orally identify and describe at least ten Construction jobs and state how a knowledge acquired in industrial arts classes can benefit individuals interested in the jobs listed.</p>				
<p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p>				
<p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

## INDUSTRIAL ARTS - CONSTRUCTION

### POST TEST

1. What is a bricklayer?
2. List some of the materials that bricklayers use on their job.
3. Is it possible for you to become a bricklayer?
4. What qualifications do you need to become a bricklayer?
5. If a bricklayer falls behind on his schedule, what happens to the construction job?
6. List several careers that are directly related to that of a bricklayer.
7. Name two jobs that must be performed before the bricklayer can start work.
8. What impressed you most about our guest speaker?
9. What impressed you most about our field trip to the construction site?
10. Problem: We are constructing a school. List in order of performance the seventeen careers involved in the construction of the school building.

**OCCUPATIONAL CLUSTER: Manufacturing**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL:** 7,8,9

**GENERAL OBJECTIVES:** (1) To cover four industries on a superficial basis helping students understand the various jobs available.

(2) To acquaint the students with the importance of each job and how each one hinges on the other.

(3) To help students develop a greater understanding of the various aspects of the Aluminum industry and the Iron and Steel industry and how industrial arts relate to them.

(4) To aid the student in understanding the qualifications needed to obtain positions in the manufacturing cluster.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe a variety of occupations involved in the mass production of a basic commodity.</p> <p>After completing research assignments and observing workers on the job in Manufacturing jobs the students will be able to discuss, identify or summarize the basic requirements and operations involved in the occupations discussed in this Unit.</p>	<p>Anode Men            Casting Operator            Chemist            Design Engineer            Die Maker            Draftsmen            Instrument Repairman            Order Checkers            Plumber and Pipefitter            Rough Neck, Scout            Shipping Clerk            Silk Screen Printer            Technician</p>	<p>Student groups will research each job listed in objective number 5 (Refer to Popeye Career Comics-Manufacturing)</p> <p>Students will discuss how jobs relate to each other.</p> <p>Use visual aids to point out what each job entails.</p> <p>Invite guest from Aluminum industry to discuss jobs, job opportunities and how these jobs can be obtained.</p> <p>Post test on materials covered in this Unit.</p>	<p>The student will be aware of the future employment possibilities in the jobs discussed in this Unit.</p> <p>The students will have a greater knowledge of the requirements and manufacturing opportunities available in the city of Cleveland.</p> <p>The students will be aware of the relationship between industrial arts and opportunities existing in the area of manufacturing.</p>

## OCCUPATIONAL CLUSTER: MANUFACTURING

## INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Aluminum of Many Faces" "Drilling for Oil" "Fahrenheit 3300" "How Electricity is Produced" "Steelmaking Today"	Chemist Draftsman Electrical Engineer Machinist Mathematician Tool and Die Maker	Contact: Aluminum Company Supervisor (Alcoa) J&L Steel Ryerson Steel Addressograph Multigraph Republic Steel Warner & Swasey	Contact: Visit Alcoa Aluminum Company in Cleveland Addressograph Multi- graph, Babbitt Road Warner & Swasey	Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Out- look Handbook Chronicle Occupa- tional Library Dictionary of Occu- pational Titles

**EVALUATION:** Successful attainment of objectives one and two will be based on the ability of at least 80-85% of the students to accurately write, in detail, or orally discuss at least 80% of the jobs listed in this Unit. Teacher rating of test at the end of this Unit will be based on the ability of 80-85% of students to correctly answer at least 80% of test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

## INDUSTRIAL ARTS - MANUFACTURING

### POST TEST

GRADE LEVEL: 7, 8, 9

1. Name seven jobs which are connected with the aluminum industry.
2. Which job do you think you could qualify for?
3. Do you see any relationship between the jobs at the aluminum company and our work in the shop?
4. What impressed you most on our field trip?
5. What basic qualifications are needed to qualify for most of these jobs?
6. Twenty-one jobs were covered in the aluminum industry, which one do you feel is the most important?
7. Does a relationship exist between the jobs?
8. How important is schooling in obtaining a position in the aluminum industry?

OCCUPATIONAL CLUSTER: Marketing & Distribution  
 SPECIFIC JOB: (1) Auto Salesman  
 (2) Auto Parts Salesman

SUGGESTED SUBJECT AREA: Industrial Arts

SUGGESTED GRADE LEVEL: 7, 8, 9

GENERAL OBJECTIVES : (1) To introduce the students to what each job requires.

(2) To show the students how a class in small motors can be valuable in obtaining these two jobs.

(3) To introduce the students to the qualifications needed for these jobs.

(4) To show students that a course in auto mechanics can lead in more than one direction.

(5) To arrange with an automobile agency to have groups of students spend a few hours with salesmen to observe actual job setting.

(6) To broaden the occupational aspirations of youth in the high-poverty Model cities area schools.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Through role-play, and actual observations, the students will be able to sample the operations and skills required for jobs as an automobile salesman and an auto parts salesman.</p> <p>The student will be able to identify a variety of considerations involved in choosing a career.</p>	<p>Auto Parts Salesman          Automobile Salesman</p>	<p>Have students list duties of an auto salesman. List additional duties.</p> <p>Set up mock car agency and parts department. Students will role-play the parts of car salesmen.</p> <p>Invite an auto salesman and an auto parts salesman to give students first hand information about their jobs.</p> <p>Visit large car agency and observe the auto salesman and the auto parts salesman in action.</p> <p>Students will write a paper centered around qualifications needed for these jobs.</p>	<p>The students will understand how school subjects (auto mechanics, English, Business, etc.) can prepare them for jobs such as an auto salesman and auto parts salesman.</p> <p>Students will have knowledge of the requirements and operations involved in the area of auto and auto parts sales.</p> <p>The students will have a more positive attitude toward the world of work.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS - MARKETING AND DISTRIBUTION - Auto Salesman and Auto Parts Salesman

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Careers in Skilled Service (Sales)"</p> <p>"The Joys of Selling"</p> <p>"Up From Clay"</p>		<p>Contact: Car Salesman</p> <p>Car Parts Salesman</p>	<p>Contact: A large car agency (one that contains its own parts and service area)</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>People and Choices</p> <p>Career Folios</p> <p>DOT</p>

**EVALUATION:** Successful attainment of objectives one and two will be based on the ability of at least 80-85% of the students to write a detailed description of the duties, educational requirements and various operations performed by automobile salesmen and auto parts salesmen. All students will be able to write or orally discuss at least three considerations involved in choosing a career as a salesman in the automobile industry.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**



**OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION  
JOB FAMILY: SERVICE STATION ATTENDANT**

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL:** 7, 8, 9

**GENERAL OBJECTIVES (1)** to aid the students in developing a knowledge of an occupation related to marketing and distribution.

- (2) To give the student knowledge of the qualifications needed to be a service station attendant.
- (3) To give the student an insight into how industrial arts relates to the job.
- (4) To show students that a carry over does exist between industrial arts and job as gas station attendant.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the various tasks performed by a service station attendant.</p> <p>Through role-playing the duties of a service station attendant visiting a service station and talking to the attendant, the students will be able to sample some of the operations and skills required by a service station attendant.</p>	<p>Mechanic Service Station Attendant</p>	<p>Have students make a list of the duties of service station/attendant and act out role of attendant.</p> <p>Students will visit a service station attendant to discuss his job.</p> <p>Invite a service station attendant to discuss his job.</p> <p>The students will discuss the relationship between Industrial Arts and the job of a gas station attendant.</p>	<p>The students will be more aware of their own abilities and interest.</p> <p>The students will have more knowledge of the requirements of and operations involved in the work of a service station attendant</p> <p>Students will be aware of other jobs performed at a service station.</p> <p>The students will be able to relate industrial arts to the job of Service Station attendant.</p>



INSTRUCTIONAL AND RESOURCE MATERIALS

OCCUPATIONAL CLUSTER: MARKETING AND DISTRIBUTION- Service Station

FILMS AND FILMSTRIPS	SOUND SLIDES DEVELOPED BY DVER OFFICE	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films :</p> <p>Engine Tune-up Ignition System</p> <p>Engine Tune-up Primary</p>		<p>Contact: A local service station attendant</p>	<p>Contact: Main office of the Standard Oil Company</p> <p>Cleveland, Ohio</p>	<p>Pamphlets</p> <p>SRA Kits</p> <p>Popeye Career comics</p> <p>Occupational outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to write or orally identify and describe the duties, training, benefits, etc., needed by one interested in pursuing a career as a mechanic or a service station attendant.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Personal Services**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Industrial Arts

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students understand what these jobs consist of.

(2) To acquaint the students with the qualifications needed for these jobs.

(3) To help students understand how shop courses are directly related to the jobs in question.

(4) To help students become acquainted with jobs in the personal service area and how these jobs can be carried over into other career jobs.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the duties and requirements for the jobs listed in this Unit.</p> <p>In their own school building, the students will be able to sample some of the operations and skills involved in the jobs listed in this Unit.</p>	<p>Building Custodian</p> <p>Maintenance Man</p> <p>Odd Job Man</p>	<p>Students will list the duties of a building custodian, odd job man and maintenance man on the board.</p> <p>Students will list qualifications for jobs listed on the board.</p> <p>Invite speakers in the three occupational areas listed.</p> <p>Have student to see whether the three occupations listed have anything in common.</p> <p>Students will talk to individuals in their school who perform the duties listed in the vocabulary.</p>	<p>The students will have more knowledge of the operations involved in the occupations discussed in this Unit.</p> <p>The students will have a more positive attitude toward his school, others and the world of work.</p> <p>The students will have a greater ability to describe the relation between specific vocational activities in the area of personal service and real occupations.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Building Trades"</p>		<p>Contact: Building Custodian Maintenance Man Odd Job Man  (Note: Contact individuals working in students' pre-sent school)</p>	<p>Contact: Tour own school building with building custodian explaining the duties and skills required for various jobs.</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objective one will be based on the ability of at least 80-85% of the students to write, in detail, or orally discuss the duties, requirements, training, etc. of the jobs listed in this Unit. Teacher rating of objective number two will be that within a period of six weeks at least 80% of the students will submit a report describing the various custodial and maintenance operations and skills they took part in. The school custodian will verify students' participation in this project. Teacher rating of post test will be that at least 80% of the students will correctly answer or at least 80% of the post test items.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**INDUSTRIAL ARTS - PERSONAL SERVICES**

**POST TEST**

**GRADE LEVEL: 7, 8, 9**

1. What does a building custodian do?
2. What does an odd job man do?
3. What does a maintenance man do?
4. Do all these jobs have anything in common?
5. What qualifications are needed for these jobs?
6. How do salaries compare?
7. Did any of your industrial arts courses prepare you for these jobs?

**OCCUPATIONAL CLUSTER: Business and Office  
Occupations  
SPECIFIC JOB: Interior Decorator for  
Commercial Business**

**SUGGESTED SUBJECT AREA:** Art  
**SUGGESTED GRADE LEVEL :** 7,8,9  
**GENERAL OBJECTIVES :**

- (1) To create bridges between school and earning a living.
- (2) To help students become aware of the opportunities involved in interior decorating for business purposes.
- (3) To help students acquire a greater appreciation of good design.
- (4) To help students gain greater sensitivity to form and color, and their role in designing.
- (5) To help students expand their knowledge as to types of furniture including styles and function.
- (6) To help students gain knowledge of some of the basic materials an interior designer must work with (e.g. textiles, woods, metals, plastics, paints, paper, ceramics).

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to explain or describe the relation between various commercial decorating activities in the classroom and "real" occupations in this area.</p> <p>The students will be able to identify various styles of furniture suitable for commercial purposes.</p> <p>The students will be able to identify and classify various types of fabrics studied.</p> <p>The students will be able to explain differences between "warm colors" and "cool colors"</p>	<p>Antique Satin Brocade Burlap Ceramics Chintz Complementary Corduroy Crushed Velvet Form Herculon Interior Decorator Interior Designer Job Family Naugahide-vinyl Occupational Cluster Split Complementary Textiles Traid, Analogous Velveteen</p>	<p>General discussion describing the function and <u>work</u> of an interior designer.</p> <p>Students will compile and classify a notebook on various styles of furniture that would be suitable for commercial purposes. (Use catalogues, <u>magazines</u>, books, etc.)</p> <p>Students will study and classify fabrics into groups as to which are to be used in formal or casual settings.</p>	<p>The student will be more knowledgeable about the requirements and operations involved in decoration for commercial business.</p> <p>The student will be aware of school subjects and opportunities that exist throughout life.</p> <p>The student will be more aware of his abilities.</p> <p>The student will be aware of the role of form and color in interior designing.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films:  "Careers in Art"	Interior Decorator  Commercial Artist	Contact: The Ohio Desk Co.  Irvin & Co. Inc.  J.L. Hunt Company  Halle Bros. Co.  The Plain Dealer  (Ask speaker to speak about commercial Interiors)	Contact: May Company  Halle Bros. Company	Pamphlets  Brochures  SRA Kits  Popeye Career Comics  Occupational Outlook Handbook  Chronicle Occupational Library  DOT

**EVALUATION:** Successful attainment of objectives in this Unit will be based on: (a) the ability of 80-85% of the students to identify, in writing or orally, eight out of ten types of fabric; and seven out of ten pictures of different styles of furniture and (b) the ability of 80-85% of the students to write or orally define 80% of the vocabulary terms listed in this Unit. Teacher evaluation of the post test will be based on the ability of 75-80% of the students to correctly answer at least 80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**BUSINESS AND OFFICE OCCUPATIONS**

**INTERIOR DECORATOR FOR COMMERCIAL BUSINESSES**

**Additional Learning Experiences of Activities**

Subject Area: Art  
Grade Level: 7,8,9

1. Students will complete library research on nine commonly used fabrics for upholstery.
2. Given the floor plans for the reception room for a hospital, students will select the color scheme, the period of furniture, accessories for the room and placement of furniture, etc.

Post Test

1. Do you think your room design was a success?
2. What style of furniture did you select?
3. What fabric was chosen for the upholstery? Is it durable, functional, and attractive?
4. What color scheme did you choose? Does your color sceme create the proper atmosphere?
5. What have you learned from this unit? Was it informative?
6. What is an interior designer? What roles does he play in our society? Does the interior designer have an important role? Give examples of the types of assignments a commercial decorator may design.
7. Identify the nine commonly used fabrics for upholstery as to (a) content (b) general description (c) wearing qualities (d) how fabric can be used (e) unusual characteristics the fabric may have (f) type of texture the fabric displays.



**OCCUPATIONAL CLUSTER: Communication and Media**  
**SPECIFIC JOB: Designing for Mass Media**

**SUGGESTED SUBJECT AREA: Art**  
**SUGGESTED GRADE LEVEL : 7,8,9**  
**GENERAL OBJECTIVES :**

- (1) To create bridges between school and earning a living.
- (2) To help students understand the qualifications needed for a job in designing mass media.
- (3) To help students develop an awareness of the various job possibilities in this area.
- (4) To help students learn the various skills needed for a job in mass media designing, such as television set designer, movie set designer, and stage designer for plays and musicals.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to list or state qualifications needed for a job in designing for mass media.</p> <p>The student will be able to design and build a simple set for a school play or suitable event.</p> <p>The student will be able to list or discuss job possibilities in the area of set designing in the city of Cleveland.</p>	<p>Communication</p> <p>Job Family</p> <p>Mass Media</p> <p>Occupational Cluster</p> <p>Set Designers</p>	<p>Students will design stage settings for a school play or a similar event.</p> <p>Students will attend movie which is favorably recognized for its set design (ex. 2001 B.C.)</p> <p>Student will be divided into groups, each group will be responsible for various stages of the set design.</p>	<p>The student will have improved his knowledge of the requirements for a designing career for mass media.</p> <p>The students will have a general knowledge on how to design and build a set for a play or suitable event.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Career in Art"</p>	<p>Commercial Artist Director Make-up Artist</p>	<p>Contact: Karamu House</p>	<p>Contact: Musicarnival The Playhouse Karamu House  Purpose: To see stage being set up.</p>	<p>Occupational Outlook Handbook  Pamphlets Brochures SRA Kits  Popeye Career Comics  Chronical Occupational Library  DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one, two and three will be based on the ability of 80-85% of the students to: (a) write, in detail, or orally discuss the duties, requirements, job possibilities in the Greater Cleveland area, etc. for one interested in a career as designer for mass media, and (b) design and construct a simple set for a school play or suitable event within a period of six weeks (students will work in groups).</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: Construction Occupations**  
**SPECIFIC JOB: House Painter**

**SUGGESTED SUBJECT AREA: Art**

**SUGGESTED GRADE LEVEL : 7,8,9**

**GENERAL OBJECTIVES : (1) To help students understand the qualifications for a career in house painting.**

**(2) To create bridges between school and earning a living.**

**(3) To help students learn the skills needed for a job in house painting, such as color harmony, and understanding of space.**

**(4) To help students learn how to use the various types and brands of paint, such as water and oil based products, as well as acrylic paint.**

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to demonstrate their knowledge and use of various types and brands of paint by painting various samples on cardboard squares.</p> <p>Each student will be able to select one color and expand it from a tint to a shade using 20 square for painting.</p> <p>The students will be able to mix dry paints to form tempera and oils.</p> <p>The student will be able to sample skills and operations involved in house painting.</p>	<p>Acrylic paint  House Painter  Interior Decorator  Job Family  Occupation Cluster  Oil based paint  Oils, tint, shade  Pigments  Primary Color  Secondary Color  Tempera  Water Based Paint</p>	<p>Students will practice mixing primary colors to intermediate colors.</p> <p>Students will write reports on the history of color.</p> <p>On large cardboard square, student will paint samples of five shades of a water based paint and six shades of an oil based paint.</p> <p>While enjoying visit from house painter the speaker will be asked to discuss harmony, painting, as it is affected by weather conditions and enlarging, and decreasing space with paint.</p>	<p>The students will know how to mix and use various types of paint.</p> <p>The students will know the requirements and skills needed for house painting.</p> <p>The student will be able to relate their knowledge to similar jobs requiring basic knowledge about colors and paint.</p>

**INSTRUCTIONAL AND RESOURCE MATERIALS**

**CONSTRUCTION OCCUPATIONS - House Painter**

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p><b>Films:</b> "Color and Pigment in Art"</p>	<p>Painter</p>	<p><b>Contact:</b> An experienced house painter</p> <p><b>Contact:</b> The Apprenticeship Information Center 579-7802</p> <p>Interior Decorating Firm (Not use of colors and their relationship with surrounding areas)</p>	<p><b>Contact:</b> A house painting site</p>	<p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>SRA Kits</p> <p>DOT</p>

**EVALUATION:** Teacher evaluation of students' knowledge of the skills and operations involved in house painting will be that 80-85% of the students will mix various paints and paint at least five samples of their work on card-board squares. Evaluation of post test will be based on the ability of at least 80-85% of the students to correctly answer 80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

ART - CONSTRUCTION(HOUSE PAINTER)

POST TEST

1. What did you enjoy most about this unit? Why?
2. What type of paint is required for painting the exterior of a building? List three reasons why the paint used on the exterior of a building must differ from the type of paint used on the interior of a building.
3. What is a primer? What is the primer reason for using a primer?
4. Why is it mandatory when mixing paint for a job to mix enough paint to complete the job? Why is it almost impossible to mix a matching batch of paint?
5. Define the following terms:
  - a. color harmonies
  - b. analogous
  - c. split complimentary
  - d. triad
  - e. primary colors
  - f. neutrals
  - g. primer
  - h. complements
  - i. tertiary colors
  - j. tint
  - k. shade
  - l. color wheel
  - m. turpentine
  - n. secondary colors

**Consumer and Homemaking  
Occupational Cluster: Related Occupations  
Specific Job: Interior Decorator for  
the Home**

**SUGGESTED SUBJECT AREA:** Art

**SUGGESTED GRADE LEVEL:** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students understand the qualifications needed for a job in interior decorating of the home.

(2) To help students learn the various skills needed for a job in interior decoration such as proportion, color harmony, drawing fibers, line, and understanding space.

(3) To help students learn about the various media used in home decoration--textiles, woods, papers, plastics, patines, ceramics, fibers and plasters.

(4) To create bridges between school and earning a living.

(5) To help students understand the personal requirements for a job in home decorating such as artistic talent, imagination, creative ability, and a keen interest in the field.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Student groups will be able to design a miniature model home made from cardboard. The home must also be furnished and decorated.</p> <p>The students will be able to identify and describe various media used in home decorating.</p> <p>The students will be able to list some of the personal requirements for a job in home decorating.</p>	<p>Ceramics</p> <p>Consumer</p> <p>Interior Design</p> <p>Job Family</p> <p>Occupational Cluster</p> <p>Plasterers</p> <p>Textiles</p>	<p>Students will complete library research concerned with the various types of fabrics.</p> <p>Students will identify fibers found in piece of fabric they bring in--bulletin board will be made from pieces of fabrics.</p> <p>Students will study rooms of their homes and draw up plans on how to make them as attractive as possible.</p> <p>Students will view and discuss interior decorating styles at the Cleveland Museum of Art.</p> <p>Each student will design and decorate a miniature model house.</p>	<p>The students will have a greater knowledge of the requirements and skills needed in the area of interior decorating.</p> <p>The students will be able to perceive relation between the vocational activities in the classroom and "real" occupations in interior decoration in the home.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS - CONSUMER AND HOMEMAKING RELATED OCCUPATIONS - Interior Decorator for the Home

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
	Interior Decorator Home Economist	Contact: Designer for Higbee Company	Contact: Cleveland Museum of Art	Pamphlets Brochures SRA Kits Popeye Career Comics Chronicle Occupational Library Occupational Outlook Handbook DOT

**EVALUATION:** Teacher rating of students' model home projects will be that 80-85% of the students will (working in groups) make, decorate and furnish a miniature, cardboard model home within a period of six weeks. All students will be able to write or orally discuss a detailed list of requirement, duties, job outlook, etc. for interior decorators (home).

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS**

**OCCUPATIONAL CLUSTER: Fine Arts & Humanities**  
**SPECIFIC JOB: Artist**

**SUGGESTED SUBJECT AREA:** Art

**SUGGESTED GRADE LEVEL :** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To create bridges between school and earning a living.
  - (2) To help students become aware of the various opportunities involved in being an artist.
  - (3) To help students become aware of the various disciplines an artist can choose from.
  - (4) To help students find a direction which they may successfully follow.
  - (5) To help students gain skill and knowledge in the artistic discipline of their choice.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will select a discipline from which an artist has to choose (e.g. sculpture, painting, ceramics, etc.) and follow the necessary steps to complete the project.</p> <p>Sample:</p> <ol style="list-style-type: none"> <li>1. Sketch of what is to be sculpted.</li> <li>2. Pouring of plaster into block cast.</li> <li>3. Carving subtraction method.</li> <li>4. Addition of texture or paint for final touch.</li> <li>5. Coat with Sealant</li> </ol>	<p>Artist            Carving Subtraction Method            Ceramics            Fine Arts            Humanities            Job Family            Occupational Cluster            Painter            Printer            Sealant            Sculptor</p>	<p>After visiting Cooper School of Art and viewing the disciplines from which the artist has to choose, each student will write a report on the discipline that most impressed him.</p> <p>Each student will complete a project dealing with one of the artistic disciplines.</p> <p>Class discussion and field trip.</p>	<p>The students will be able to relate the procedures and knowledge of the basic artistic disciplines.</p> <p>The student will have a knowledge of the basic skills and operations required in occupations dealing with artistic disciplines.</p> <p>Students will be aware of the educational requirements for various artistic disciplines.</p>



INSTRUCTIONAL AND RESOURCE MATERIALS

FINE ARTS AND HUMANITIES - Artist

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Art in Action--Form" "Henry Moore--Man of Form" "Fine Britch Work and Talk" "Michelangelo, the Last Giant" "Careers in Art"</p>	<p>Artist Commercial Artist Industrial Designer</p>	<p>Contact: Cooper School of Art Art Department Case Western Reserve School Art Teacher</p>	<p>Contact: Cooper School of Art</p>	<p>Occupational Outlook Handbook Chronicle Occupational Library SRA Kits DOT</p>
<p><b>EVALUATION:</b> Successful attainment of objective one will be based on the ability of at least 85-90% of the students to produce one completed project from the area of sculpture, painting, or ceramics, etc. within a period of six weeks.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: Health Occupations**  
**SPECIFIC JOB: Medical Illustrator**

- SUGGESTED SUBJECT AREA:** Art  
**SUGGESTED GRADE LEVEL:** 7,8,9  
**GENERAL OBJECTIVES:**
- (1) To inform students about the various opportunities involved in becoming a medical illustrator.
  - (2) To create bridges between school and earning a living.
  - (3) To create bridges between school and earning a living while sketching.
  - (4) To create a self-awareness of students' interests.
  - (5) To help students attain skill in depicting what he sees because it provides the basis for his work.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to demonstrate their sketching abilities by rapidly and accurately sketching a subject of their choice.</p> <p>The students will be able to orally state or list the principal duties of a medical illustrator.</p> <p>The students will be able to list educational requirements for a medical illustrator.</p>	<p>Contour Drawing</p> <p>Figure Painting</p> <p>Job Family</p> <p>Medical Illustrator</p> <p>Occupational Cluster</p> <p>Skeletal System</p> <p>Sketch</p>	<p>Class discussion of slides of pictures of various types of medical illustrators.</p> <p>Students will label and discuss charts showing a scale of proportions for the human body and the skeletal system.</p> <p>Students will draw a series of quick schematic sketches (stressing proportion) of a student model.</p> <p>Students will later stress speed, accuracy and detail.</p>	<p>The student will have a greater knowledge of the functional areas of art and health occupations.</p> <p>The students will be aware of the requirements for a medical illustrator.</p> <p>The student will have greater knowledge of the basic operations involved in the area of medical illustrating.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Introduction to Contour Drawing"</p> <p>"Figures"</p> <p>"Figure Painting"</p>	<p>Foot</p>	<p>Contact:</p> <p>Health Careers Speakers:</p> <p>Greater Cleveland Hospital Assoc. 1001 Huron Road 781-2944, Ext. 369</p>	<p>Contact:</p> <p>Medical Museum</p> <p>Health Museum</p> <p>Hospitals</p>	<p>Health Careers Handbook</p> <p>Occupational Outlook Handbook</p> <p>SRA Kits</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Successful attainment of objective one will be based on the ability of 80-85% of the students to complete one sketch of the subject of their choice within a period of one week. Attainment of objectives two and three will be based on the ability of 80-85% of the students to write detailed descriptions or orally identify and describe the duties, requirements, etc. of a Medical Illustrator.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Hospitality and Recreation**  
**SPECIFIC JOB: Arts and Craft Playground**  
 Instructor

**SUGGESTED SUBJECT AREA:** Art  
**SUGGESTED GRADE LEVEL:** 7,8,9  
**GENERAL OBJECTIVES:**

- (1) To create bridges between school and earning a living.
- (2) To help students understand the qualifications needed for a job as an arts and crafts playground instructor.
- (3) To help students learn the various skills needed for such vocations as sewing, embroidery and ceramics.
- (4) To help students understand the relationship between art and the environment.
- (5) To help students learn the importance of developing activities to suit the needs of a particular age group.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will illustrate their basic knowledge of embroidery by completing six of the basic embroidery stitches.</p> <p>The student will be able to describe and give examples of the relationship between art and the environment.</p> <p>The students will have basic skills so that she/he can teach basic sewing, embroidery and ceramics to smaller children.</p>	<p>Art            Arts and Crafts            Ceramics            Embroidery            Environment            Hospitality            Job Family            Occupational Cluster            Playground Instructor            Recreation            Sculpture</p>	<p>Students will visit near-by playground, a discussion of art and the environment will follow.</p> <p>Students will learn the six basic embroidery stitches.</p> <p>Students will make three dimensional animals with clay.</p> <p>Students will design wall hangings on burlap.</p> <p>Students will collect miscellaneous, discarded masks with these objects.</p>	<p>The students will have gained general skilled and knowledge in the area of embroidery sewing and ceramics.</p> <p>The students will have broadened their occupational aspirations.</p> <p>The students will have greater knowledge of the requirements and operations involved in arts, playground careers.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Black Artist"</p>	<p>Embroidery and Applique</p>	<p>Contact: Karamu House Phyllis Wheatley Association Other Community Centers</p>	<p>Contact: Community Centers</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics Chronicle Occupational Library Occupational Outlook Handbook DOT</p>

**EVALUATION:** Successful attainment of objectives one, two and three will be based on: (a) the ability of 80-85% of the students to successfully complete the six basic embroidery stitches, and (b) the ability of 80-85% of the students to write or orally discuss three examples of the relationship between art and the environment.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Manufacturing Occupations**  
**SPECIFIC JOB: Trademark Designer**

**SUGGESTED SUBJECT AREA: Art**

**SUGGESTED GRADE LEVEL: 7,8,9**

**GENERAL OBJECTIVES:** (1) To help students understand the qualifications needed for a job in trademark designing.

(2) To help students learn the various skills needed for such a job (e.g. calligraphy, color theory).

(3) To create bridges between school and earning a living (design such as acrylics, tempera, poster paint, oils, artist colors, and graphic design).

(4) To help students understand how to appeal to public taste in order to promote a product.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to demonstrate their skills in designing original trademarks for items of their choice.</p> <p>Each student will be able to orally promote a product that appeals to the public taste.</p> <p>The students will be able to list various levels of skills required for a career in trademark designing.</p> <p>The students will be able to name and distinguish various media used in trademark designing (ex. acrylics, tempera, poster paint, graphic design etc.).</p>	<p>Acrylics            Advertisement            Artist Colors            Calligraphy            Color Theory            Graphic Design            Job Family            Logos            Occupational Cluster            Oil            Poster Paint            Tempera            Trademark</p>	<p>Students will collect pictures of various trademarks (ex. Coca Cola) notice how the product is placed in a stream for summer ads to make the viewer hot and thirsty.            Notice how its winter ad places it in a warm setting). Discussion will follow.</p> <p>Students discuss how advertisement has changed through the years.</p> <p>Students will design new trademark for Lay's Potato Chips and any company product--containers must be functional.</p>	<p>The student will have greater confidence in his ability to relate to others and to promote a product.</p> <p>The student will have a greater knowledge of qualifications for a job in trademark designing.</p> <p>Each student will have sampled the operations and skills required in trademark designing.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Art Development"</p>		<p>Contact: Cracker Jack Company</p> <p>Discuss how advertisements have changed through the years.</p>	<p>Contact: Ohio Bell (Yellow Pages)</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>Occupational Outlook Handbook</p> <p>Chronicle Occupational Library</p> <p>DOT</p>

**EVALUATION:** Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to: (a) design and promote at least two original trademarks for the products of their choice, (b) write, in detail, or orally discuss the level of skills, duties, etc. required for one interested in a career as a trademark designer, and (c) write, in detail, or orally describe at least three different types of media used in trademark and designing.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Marketing & Distribution**  
**SPECIFIC JOB: Commercial Designer**

**SUGGESTED SUBJECT AREA: Art**

**SUGGESTED GRADE LEVEL: 7, 8, 9**

**GENERAL OBJECTIVES:** (1) To help students understand the qualifications needed for a job in commercial design.

(2) To help students learn the various skills, (e.g. calligraphy, design, color theory) needed for a job in commercial design.

(3) To help students learn the various media (e.g. graphic design, collage and paint types).

(4) To help students learn the various media (e.g. graphic design, collage and paint types).

(5) To create bridges between school and earning a living.

(6) To help students understand how commercial art influences society in regard to the buying and selling of products.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list and discuss the requirements and operations involved in designing for a business establishment.</p> <p>The student will be able to demonstrate his knowledge of various media needed for a job in commercial design by completing projects using graphic designs, collages and various paint types.</p>	<p>Calligraphy</p> <p>Collage</p> <p>Color Theory</p> <p>Design</p> <p>Graphic Design</p> <p>Job Family</p> <p>Marketing and Distribution</p> <p>Occupational Cluster</p>	<p>Visit art director of a large department store, discuss the aspects of commercial art in the business world.</p> <p>Discuss open house and providing it with an interesting theme and correlating decor, students will form groups to discuss how to make theme appeal to public.</p> <p>Student will be assigned to groups to discuss supplementary needs (advertisement of an event, decoration of desired places in school, clean-up committee, etc.).</p>	<p>The student will have a better understanding of how art influences society in regard to the buying and selling of products.</p> <p>The student will be aware of the qualifications needed for a job in commercial design.</p>



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Advertisement at Work--Color" "Advertising is a Long Word"	Commercial Artist Industrial Designer	Contact: Layout designer from local newspaper	Contact: Halle's Department Store--Contact Art Director	Brochures Pamphlets SRA Kits Popeye Career Comics Occupational Outlook Handbook Chronicle Occupational Library DOT

**EVALUATION:** Successful attainment of objective number one will be based on the ability of at least 85-90% of the students to write a detailed description of the requirements and operations involved in designing the interior of a business establishment of their choice. Teacher rating of projects mentioned in objective number two will be that 85-90% of the students will turn in a completed project within a period of six weeks.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Public Service Occupations**  
**SPECIFIC JOB: Commercial Illustrator**

**SUGGESTED SUBJECT AREA: Art**

**SUGGESTED GRADE LEVEL : 7,8,9**

**GENERAL OBJECTIVES :** (1) To help students understand the qualifications needed for a job in illustrating.

(2) To help students learn the various skills needed for a job in illustrating such as calligraphy, printing and cartooning.

(3) To create bridges between school and earning a living.

(4) To improve students' knowledge of the interrelations between different functional areas of business and industry.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>Given samples of various brochures, the students will be able to note various styles and cuts of brochures.</p> <p>The student will be able to demonstrate his knowledge of various media used in commercial illustrating such as painting, printing, watercolor etc.</p> <p>The student will be able to identify, describe and use different modes of advertising such as books, magazines, posters.</p>	<p>Advertising            Calligraphy            Commercial Illustrating            Creative Art Capture            Hooks            Job Family            Monoprint            Occupational Cluster            Printing            Public Service</p>	<p>After reading instructions prepared by teacher, students will draw and paint six and one sequence cartoons which tell the story and methods used in cartooning</p> <p>Using monoprint designs, students will design appreciation cards for instructors, family or friends.</p> <p>Students will orally discuss and define vocabulary terms listed in this unit.</p>	<p>The student will have some knowledge of the requirements and abilities needed in the area of commercial illustrating</p> <p>The student will be able to use at least three types of lettering--he must be able to use at least one type in cartooning.</p>



INSTRUCTIONAL AND RESOURCE MATERIALS

PUBLIC SERVICE OCCUPATIONS - Commercial Illustrator

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Creative Art Monoprints"                      "Painting With Calligraphy"</p>		<p>Contact:                      Hallmark Cards                      Ohio Bell                      Newspapers                      Department Stores</p>	<p>Contact:                      Cleveland Call and Post                      The Plain Dealer                      The Press                      Ohio Bell</p>	<p>SRA Kits                      Occupational Outlook Handbook                      Chronicle Occupational Library                      DOT                      People and Choices Career Folios</p>

**EVALUATION:** Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to: (a) use at least three different types of lettering in the designing, drawing and painting of at least three cartoons, (b) demonstrate their knowledge of at least three types of media used in commercial illustrating by completing at least three samples using the media chosen, and (c) orally describe or write a detailed description of at least three different modes of advertising.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Business and Office Occupations**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA: Music**

**SUGGESTED GRADE LEVEL: 7, 8, 9**

**GENERAL OBJECTIVES:** (1) To aid the student in the selection of Business and Office Occupations related to music.

(2) To acquaint students with requirements and skills necessary to master these jobs.

(3) To develop, in detail, the knowledge and requirements necessary to perform duties necessary to fill positions that are necessary to the music field.

(4) To help the student develop music awareness to Business and Office Occupations.

(5) To show a relationship between school subjects and opportunities that exist throughout life.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The student will be able to identify and describe various Business and Office occupations involved in the field of music.</p> <p>The students will be able to describe at least three ways in which school subjects can be applied in the working world.</p> <p>The students will be able to discuss a range of considerations that enter into career choice.</p>	<p>Accountant                      Advertiser                      Bookkeeper                      Librarian                      Operator                      Receptionist                      Sales Clerk                      Secretary                      Sound Engineer                      Telephone                      Typist</p>	<p>Students will list Business and Office occupations (publicity, public relations, retail store clerks, etc.)</p> <p>Students will conduct group discussions on various business and office jobs and the requirements needed to fulfill these jobs.</p>	<p>The students will be aware of the many business skills and operations involved in the field of music.</p> <p>The students will have a greater knowledge of careers that exist in the Cleveland community.</p> <p>The students will be cognizant of the relationship that exist between school subjects and career opportunities that exist throughout life.</p>

INSTRUCTIONAL AND RESOURCE MATERIALS

BUSINESS AND OFFICE Cluster

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:                      "Your Career as a Secretary"                      "Careers--Clerical"</p>	<p>Secretary                      Stenographer                      Typist</p>	<p>Contact:                      Metropolitan Jobs Council--National Alliance of Businessmen, 1375 Euclid Ave. 861-6100</p>	<p>Contact:                      Local Radio Station                      Local TV Station</p>	<p>Pamphlets                      Brochures                      SRA Kits                      Popeye Career Comics                      People and Choices                      Career Follios                      Chronicle Occupational Library                      Occupational Outlook Handbook</p>

**EVALUATION:** Successful attainment of objective one will be based on the ability of at least 80% of the students to write, in detail, or orally describe at least eight out of eleven jobs listed in this Unit.  
 Attainment of objectives two and three will be based on the ability of all students to list three ways in which school subjects can be applied to the working world, and at least three considerations that enter into their personal career choices.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

OCCUPATIONAL CLUSTER: Communication and Media  
 SPECIFIC JOB:

SUGGESTED SUBJECT AREA: Music

SUGGESTED GRADE LEVEL: 7,8,9

- GENERAL OBJECTIVES :
- (1) To acquaint students with jobs in Communication that relate to music.
  - (2) To assist students in understanding how jobs in Communication may also utilize musical knowledge.
  - (3) To make students aware of the musical qualifications that will raise the level of performance in various jobs in the Communication and Media Cluster.
  - (4) To understand goals, values and aspirations and how they relate to the choice of a career.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list and describe the various jobs involved in operating an educational radio or television station.</p> <p>The students will demonstrate their knowledge of communication and media jobs related to the field of music by planning, producing and presenting a talent show.</p> <p>The students will be able to discuss qualifications and requirements for careers listed in this Unit.</p>	<p>Affiliated                      Broadcast Technician                      Commercial                      Disc Jockey                      Music Director                      Music Librarian                      National                      Non-Commercial                      Radio Announcer                      Regional                      Station Manager                      WHF-FM-VHF</p>	<p>Students will review activities in Business and Office and Marketing and Distribution clusters to determine those that would be included in communication.</p> <p>Give students a vocabulary listing for pronunciation and spelling of professional terminology and tools used in the radio and television media.</p> <p>Divide class into two groups, each group will set up an educational radio station and an educational television station. A discussion of various jobs involved will follow.</p> <p>Post test</p>	<p>The students will have a more positive attitude toward self, others and the world of work.</p> <p>The students will be more aware of skills and operations involved in jobs discussed in this Unit.</p>

## COMMUNICATION AND MEDIA

## INSTRUCTIONAL AND RESOURCE MATERIALS

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>"Music in Motion"</p> <p>"First World Festival of Negro Arts"</p> <p>"Design for Growing"</p>	<p>Actor</p> <p>Actress</p> <p>Dancer</p> <p>Director</p> <p>Musician</p> <p>Singer</p> <p>Singing Teacher</p>	<p>Contact:</p> <p>WVIZ TV</p> <p>398-2800, Ext. 43</p>	<p>Contact:</p> <p>WVIZ TV, Channel 25</p> <p>3500 Brookpark Road</p> <p>398-2800, Ext. 43</p> <p>WBOE Radio Station</p> <p>Administration Bldg.</p> <p>Cleveland Board of Education, Cleveland Ohio, 696-2929</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>People and Choices</p> <p>Career Folios</p> <p>DOT</p> <p>Chronicle Occupational Library</p> <p>Occupational Outlook Handbook</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one and three will be based on the ability of at least 80-85% of the students to write, in detail, or orally describe the duties, requirements, training, etc. of at least 80% of the music related communications and media jobs listed in this Unit. Teacher rating of objective number two will be based on whether at least 80% of the students actually took part in some stage of the planning, production, etc. of a talent show, and whether the show was planned, produced and presented in its entirety either to the entire student body or just the members of the class. Attainment of post test objectives will be that at least 80-85% of the students will correctly answer at least 80% of post test items.</p>				
<p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p>				
<p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

## COMMUNICATION - MUSIC

GRADE LEVEL: 7, 8, 9

**Program Director** - (1) Makes or reads commercial announcements - (Must know how to use his voice) Plays the records used each day.

**Announcers** - Must have pleasant, well-controlled voice. May double as Disc Jockey requiring knowledge of music. Might be a music hobbyist. In this capacity he selects and plays recordings. He may also fill in otherwise open spots by playing and singing a few bars of a current hit songs. Do commercial and ad-lib whenever needed, may do something (that he himself has composed.)

**Broadcast Technician** - Operate sound equipment such as: (1) Microphones (2) Recording equipment; Record Player, Sound effect devices. television cameras, Projectors, Phonograph record, Turn tables, Video tape recording.

**Audio Control Technician** - Operates controls that regulate sound pick-up, transmission and switching.

**Music Librarian** - Maintains music files, fills requests for a specific music selection or a particular type of music.

**Music Director** - Selects music, arranges music, selects musicians for the live shows, directs music in rehearsal and on broadcast.

## POST-EVALUATION

Students to be judged on the following performances:

- (1) Talent show - which will include: Actors, Actresses, Set Designers, Directors of Music and Dramatics, Librarians for Music and Play-Writes, Dancers and Choreographers if needed, Electricians, Musicians (Orchestra, accompanists), Publicity Staff.
- (2) Posters (Publicity Staff)
- (3) Bulletin Boards - (Again the Publicity Staff might handle the Bulletin Boards.



**OCCUPATIONAL CLUSTER: Fine Arts and Humanities**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Music  
**SUGGESTED GRADE LEVEL :** 7,8,9  
**GENERAL OBJECTIVES :** (1) To develop the potential of the students who have exhibited talent in the Performing Arts.

- A. Musicians-Instrumental and Vocal
- B. Actors and Actresses
- C. Dancers and Choreography
- D. Directors--Musical and Dramatics

(2) To develop basic skills and techniques of the Artists listed in number one.

- A. Vocabulary--Terminology used in Show Business
- B. Performance--Musicianship, Poise-Stage
- C. Repertoire

(3) To develop skills in the areas associated with the Arts.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe a variety of careers that relate directly or indirectly to the production of a play.</p> <p>The students will demonstrate their knowledge of various fine arts careers by actually selecting, directing and performing a play that includes workers such as those listed in the vocabulary.</p>	<p>Actor                      Actress                      Ballet Dancer                      Choreographer                      Classical Dancer                      Dancer                      Musician                      Music Teacher                      Opera Singer                      Stage Manager</p>	<p>Students will attend a symphony concert.</p> <p>Attend the Lake Erie Opera Co. performance (Reduced rates to schools).</p> <p>Attend the Cleveland Institute of Music performances.</p> <p>Read them scripts and select a play. Student will perform the play selected.</p> <p>Attend Metropolitan Opera performances</p>	<p>The students will be familiar with the vocabulary used in the music world.</p> <p>The student will be able to relate music to Fine Arts and Humanities.</p> <p>Students will be more aware of jobs available in the city of Cleveland.</p> <p>The students will have a more positive attitude toward the world of work.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Films: "Design for Growing" "First World Festival of Negro Arts"	Actor Actress Dancer Director Musician Singer Singing Teacher	Contact: Director, Karamu House	Contact: The Lake Erie Opera Company The Cleveland Institute of Music Symphony Concert Severance Hall Metropolitan Opera Public Hall Play Productions Karamu Theaters	Pamphlets Brochures SRA Kits Popeye Career Comics DOT Chronicle Occupational Library Occupational Outlook Handbook

**EVALUATION:** Attainment of objective number one will be based on the ability of 80-85% of the students to write, in detail, or orally describe at least five careers that are related directly or indirectly to the production of a play. Teacher rating of play presented, produced and performed in class will be that at least eighty percent of the students participate in some stage of the production, and that this same percentage of students effectively portray (in the play) the area of Fine Arts and Humanities through music.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER: Manufacturing**  
**SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA: Music**

**SUGGESTED GRADE LEVEL : 7,8,9**

**GENERAL OBJECTIVES :** (1) To help students develop a knowledge of the various occupations in manufacturing that are related to music.

(2) To give the students an understanding of the requirements and skills necessary for jobs in manufacturing.

(3) To help the students develop an awareness of the various aspects of manufacturing and how music relates to them.

(4) To help students understand that music plays a vital role in certain manufacturing occupations.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list and describe jobs that are needed in the manufacturing of musical instruments.</p> <p>The students will be able to name materials used in making certain musical instruments.</p> <p>The students will be able to identify the parts of various musical instruments.</p> <p>The students will be able to name at least three companies that make musical instruments.</p>	<p>Assembler Automatic Machine Operator Bassoon Bell Spinner Buffer Mechanic Percussion Instruments Plater String Instruments Welder Woodwind Instruments</p>	<p>Students will do library research assignments on manufacturing jobs that require musical knowledge.</p> <p>Divide the class into four groups. Each group will do research on one section of the orchestra and how these instruments are made.</p>	<p>The students will be more aware of the skills and operations required in the making of musical instruments.</p> <p>The students will be more aware of the interrelations between the production, management, and service areas of business and industry.</p>

## OCCUPATIONAL CLUSTER: MANUFACTURING

## INSTRUCTIONAL AND RESOURCE MATERIALS

## SOUND SLIDES DEVELOPED BY DVEP

## FILMS, FILMSTRIPS, AND TAPES

## SPEAKERS

## FIELD TRIPS

## CAREER LIBRARY

Draftsman

Machinist

Mathematician

Metal Worker

Tool and Die Maker

Contact:

King Music Company  
33999 Curtis Blvd.  
East Lake, Ohio  
946-6100

Contact:

King Music Company  
33999 Curtis Blvd.  
East Lake, Ohio  
946-6100

Pamphlets  
Brochures  
SRA Kits  
Popeye Career  
Comics  
Chronicle Occupational Library  
DOT  
Occupational Outlook Handbook

**EVALUATION:** Successful attainment of objectives one through four will be based on the ability of at least 80-85% of the students to: (a) list, in writing, and describe at least eight jobs associated with the manufacture of musical instruments, and (b) correctly answer 75-80% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

## MANUFACTURING

### Additional Learning Experiences or Activities

**SUGGESTED SUBJECT AREA:** Music

**SUGGESTED GRADE LEVEL :** 7,8,9

1. Show slide pictures of people in factories manufacturing musical instruments.
2. Each student will prepare a list of jobs that are needed in the manufacturing of instruments.
3. Plan a field trip to local manufacturing company to see how instruments are made.
4. Each student will select one job in manufacturing of instruments and their parts and do research on the machines and skills needed to perform the job.

**OCCUPATIONAL CLUSTER: Marketing & Distribution  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Music

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help the students gain a knowledge of occupations in Marketing and Distribution that are related to music.

- (2) To acquaint students with the requirements necessary to perform these jobs.
- (3) To develop in detail the knowledge of the requirements necessary to perform these jobs.
- (4) To help the student develop music awareness and relate it to Marketing and Distribution
- (5) To broaden the occupational aspirations of youth in the high-poverty Model cities area schools.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list various careers that might be required in operating a music store or a record company.</p> <p>The students will be able to identify and describe the duties and educational requirements for the various Marketing and Distribution jobs listed in this Unit.</p>	<p>Advertising Copy-writer Buyer Cashier Clerk Manufacturers Marketing Resear-cher Salesman Salesman for Musical Goods Shipping Clerk Stock Clerk Warehouse Manager</p>	<p>Have students list jobs in Marketing and Distribution that a person with a musical background could fulfill.</p> <p>Show pictures of various musical instruments.</p> <p>Investigate making simple musical instruments from materials such as tin cans, cereal boxes, cigar boxes. (Maracas, Ukelele, etc.)</p>	<p>The students will be more aware of how Marketing and Distribution careers relate to music.</p> <p>The students will know more about the interrelations between the production, management, and service areas of business and industry.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: "Careers in Sales--The Joys of Selling"</p>	<p>Account Manager Marketing Research Statistical Analyst Tabulator</p>	<p>Contact: Metropolitan Cleveland Jobs Council  National Alliance of Businessmen 1375 Euclid Avenue 861-6100</p>	<p>Contact: Whitney Music Company 3570 Fulton Avenue Cleveland, Ohio 961-2962  Electronic Music Corp. 1230 East 286 Street Cleveland, Ohio 261-7110  Grossman Music Corp. 1278 W. 9th Street Cleveland, Ohio 696-1234</p>	<p>Brochures Pamphlets Popeye Career Comics SRA Kits DOT Chronicle Occupational Library Occupational Outlook Handbook</p>
<p><b>EVALUATION:</b> Successful attainment of objectives one and two will be based on the ability of 80-85% of the students to list, in writing, or orally identify and describe eight out of ten jobs listed in this Unit.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

**OCCUPATIONAL CLUSTER: BUSINESS OFFICE  
SPECIFIC JOB: RECEPTIONIST**

**SUGGESTED SUBJECT AREA:** Physical Education

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To help students understand how typing is related to the job of a receptionist.

(2) To help the students to acquire knowledge of the nature of the duties of a receptionist

(3) To introduce training other qualifications, and advancements to the student.

(4) To create self awareness of students' abilities.

(5) To understand goals, values, and aspirations, and how they relate to the choice of a career.

**SPECIFIC BEHAVIORAL OBJECTIVES**

The student will be able to list and describe the various duties of a receptionist.

Through class discussions, field trips and role playing, students will be able to sample the operations and skills involved in a career as a receptionist.

The students will be able to describe a variety of ways in which school subjects (physical education) can be applied in the working world.

**VOCABULARY**

Receptionist

**LEARNING EXPERIENCES OR ACTIVITIES**

Students will list and discuss personal characteristics, and duties of a receptionist.

Students will name the different places and types of offices that would employ a receptionist.

Show and discuss the film "Career in Business and Office Occupations"

Plan a trip to an office to observe how a secretary's job would differ from a receptionist's job.

Discuss how the employment outlook will increase or decrease within the next few years.

Post-Test

**DESIRED OUTCOMES**

The students will have a more positive attitude toward self, others, and the world of work.

The students will have a greater ability to perceive the relation between specific vocational activities and "real" occupations

The students will be aware of the many different establishments in Cleveland that employs receptionists.

The students will be aware of the duties and requirements for a job as a receptionist.



FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films: Careers In Business and Office Occupations</p>	<p>Personnel Staff</p>	<p>Contact: Metropolitan Cleveland Jobs Council - National Alliance of Businessmen</p>	<p>Contact: The National Alliance of Businessmen, Cleveland, Ohio</p>	<p>Pamphlets Brochures SRA Kits Popeye Career Comics DOT Occupational Outlook Handbook Chronicle Occupational Library</p>

**EVALUATION:** Attainment of behavioral objectives will be based on the ability of 80-85% of the students to be able to write detailed descriptions of the duties, requirements, training, etc., required by a receptionist. Teacher rating of post-test will be at least 80-85% of the students will correctly answer at least 80% of post-test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

PHYSICAL EDUCATION - BUSINESS AND OFFICE CLUSTER  
RECEPTIONIST  
POST TEST

1. List five things a receptionist might do while performing her duties.
2. Name three business establishments that might find it necessary to hire a receptionist.
3. List the minimum requirements required by employers who are considering a receptionist for employment purposes.
4. List three personal characteristics a receptionist should have.
5. The number of receptionists is expected to increase/decrease(choose one) very rapidly.

KEY

1. work on switchboard, type, sort mail, keep books, direct office traffic
2. hospital, beauty shop, office
3. high school
4. pleasant speaking voice, attractive personal appearance, punctuality
5. increase

**OCCUPATIONAL CLUSTER: FINE ARTS & HUMANITIES  
SPECIFIC JOB: DANCING**

**SUGGESTED SUBJECT AREA:** Physical Education

**SUGGESTED GRADE LEVEL :** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To enlighten students of the availability of jobs in regard to fine arts and humanities.
  - (2) To relate physical education with the occupations in the area of Fine Arts & Humanities.
  - (3) To encourage students to seek jobs in the area of Fine Arts & Humanities while enjoying the physical education program.
  - (4) To review the qualifications for jobs in the fine arts with special emphasis placed on physical fitness.
  - (5) To create self awareness of students aptitudes.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to describe a broad range of eventualities that can affect career and career planning.</p> <p>The students will be able to cite at least five factors that influence the selection of a career.</p> <p>The students will be able to list the duties, necessary training, employment outlook, etc., of careers discussed in this unit.</p> <p>The students will be able to describe the basic techniques involved in performing the jobs listed in this unit.</p>	<p>Actor</p> <p>Actress</p> <p>Dancers (tap, ballet modern, creative)</p> <p>Music Teacher</p> <p>Musician</p>	<p>Students will list and discuss qualifications, employment outlook, earning and working conditions in the area of Fine Arts and Humanities</p> <p>Students will make oral reports on the artist of his or her choice.</p> <p>Students will bring in pictures and newspaper clippings of their favorite dances and make a bulletin board.</p> <p>Post test</p>	<p>The students will be aware of various community resources leading to jobs in the area of Fine Arts &amp; Humanities</p> <p>The students will have a greater knowledge of the requirements and operation involved in the area of fine arts &amp; humanities.</p> <p>The students will have a more positive attitude toward self others, and the world of work</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>Lets Dance</p> <p>Modern Dance Composition</p>	<p>Actor</p> <p>Actress</p> <p>Dancer</p> <p>Musician</p>	<p>Contact:</p> <p>The BEA Fried - Carol Landis Academy of Dance 5929 May field Rd. Cleveland, Ohio</p> <p>Karamu House</p>	<p>Contact:</p> <p>BEA Fried-Carol Landis Academy of Dance 5929 Mayfield R. Cleveland, Ohio</p> <p>Attend a Professional Dance Recital if one is booked in the area.</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>People and Choices Career Folios</p> <p>DOT</p> <p>Occupational Out- look Handbook</p> <p>Chronicle Occupa- tional Library</p>

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of 80-85% of the students to (a) write in detail or orally identify and describe the duties, techniques, training, etc., of all jobs listed in this unit. (b) write or orally cite at least three out of five factors that influence one's selection of a career. Teacher evaluation of post test will be based on the ability of 75-80% of the students to correctly answer at least 80-85% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

**OCCUPATIONAL CLUSTER- FINE ARTS & HUMANITIES  
SPECIFIC JOB- DANCING**

**Additional Learning Experiences or Activities**

Students will present a talent show displaying his or her talent in the field of their choice.

Discuss and demonstrate the seven basic dancing positions and how to lead and follow the patterns of a typical dance step

Show the class some of the techniques necessary for preparing the body for modern dance movements.

Describe the basic techniques of singing, such as good posture and controlled breathing. Emphasize the jobs requiring a good singing voice.

Invite a professional dancer to speak to the class.

Post-test

PHYSICAL EDUCATION - FINE ARTS & HUMANITIES

POST TEST

GRADE LEVEL: 7, 8, 9

Match column A with column B

- |  |                       |
|--|-----------------------|
| 1. Creating a dance to fit one's mood            | A. actor              |
| 2. Teach people to sing                          | B. dancer             |
| 3. A female that portrays other characters       | C. Musician           |
| 4. teaches people to dance                       | D. singing teacher    |
| 5. A male that portrays other people's character | E. creative dancing   |
| 6. sings for a living                            | F. dancing instructor |
| 7. plays some type of instrument                 | G. dance director     |
| 8. dances for a living                           | H. actress            |
| 9. dancing is usually a phase of their course    | I. singer             |
| 10. Trains dancer in new production              | J. physical education |

KEY

1. E
2. D
3. H
4. F
5. A
6. I
7. C
8. B
9. J
10. G

**OCCUPATIONAL CLUSTER: PERSONAL SERVICE  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Physical Education

**SUGGESTED GRADE LEVEL:** 7, 8, 9

- GENERAL OBJECTIVES :**
- (1) To acquaint the students with the list of jobs available in the Personal Services cluster.
  - (2) To relate physical Education to personal services occupations.
  - (3) To review the qualifications needed to obtain a job in the field of Personal Services
  - (4) To acquaint students with community resources leading to jobs.
  - (5) To create self-awareness of students' abilities.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to list the duties and qualifications for occupations listed in this unit.</p> <p>The students will be able to list ways in which Personal Service Careers are related to Physical Education.</p>	<p>Babysitter Barber Beautician Building Custodian Companion Cosmetologist Domestic Worker Government Laundress Life Guard Valet</p>	<p>Have students make their own list of jobs in the area of personal service. Each student will choose one job and go to the library and research the qualifications, training needed, employment trends, salary trends, etc.</p> <p>Students will present oral reports on materials researched in the library--discussion will follow.</p> <p>The teacher will attempt to relate physical education to the Personal Service Cluster through a lecture.</p> <p>Students will plan a recreational activity for each personal service job listed. Post-Test</p>	<p>The student will have a more positive attitude toward self, others, and the world of work.</p> <p>The students will be more aware of personal service jobs available in their community</p> <p>The students will have some knowledge of the requirements and operations involved in the occupations listed in this unit.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Films:</p> <p>Filmstrips:</p> <p>Careers in Personal Service</p>		<p>Contact:</p> <p>Metropolitan Cleveland Jobs Council 1375 Euclid Avenue</p>	<p>Contact:</p> <p>Community Swimming Pool YWCA - YMCA</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career comics</p>

EVALUATION: Successful attainment of objectives (1) and (2) will be based on the ability of 80-85% of the students to write in detail or orally describe the duties, requirements, etc., of at least eight of the jobs listed in this unit, and write or discuss three ways in which personal service careers are related to physical education. Teacher rating of post-test objectives will be that 80-85% of the students correctly answer 75-80% of post-test items.

SUGGESTIONS FOR IMPROVEMENT OF UNIT:

ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:



PERSONAL SERVICE OCCUPATIONS - PHYSICAL EDUCATION

POST TEST

GRADE LEVEL: 7, 8, 9

1. List five jobs available in the Personal Service occupational cluster.
2. Why does an individual need to be physically fit to occupy positions in personal service?
3. Which of the following can be used in a recreation center;
  - a. barber
  - \*b. babysitter
  - \*c. arts and craft teacher
  - \*d. dance instructor
  - \*e. policeman
  - f. beautician
  - g. companion
  - h. governess
  - i. valet
  - j. laundress
  - \*k. custodian
  - l. fireman
  - \*m. maid

\*Ones that can be used.

OCCUPATIONAL CLUSTER: Public Service  
 SPECIFIC JOB: Recreation

SUGGESTED SUBJECT AREA: Physical Education  
 SUGGESTED GRADE LEVEL: 7,8,9

- GENERAL OBJECTIVES :
- (1) To acquaint the students with the various jobs classified under Public Service.
  - (2) To create a desire for employment in the area of Public Service.
  - (3) To relate Public Service jobs to one phase of physical education.
  - (4) To review the qualifications needed to obtain a job in the Public Service Field.
  - (5) To create self-awareness of students' abilities.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to identify different types of physical work demanded by jobs discussed in this Unit and to assess his present level of skill development.</p> <p>Through role-playing various jobs would be performed in a recreation center, the students will sample the operations and skills required in the public service occupations listed in this Unit.</p> <p>The students will be able to portray the increasing importance of leisure-time activities and expanding opportunities for related careers.</p>	<p>Checkroom attendant                      Cook                      Director of Recreation                      Janitor                      Maintenance Man                      Play attendant                      Play director                      Physical director                      Receptionist                      Ticket Takers                      Waitress</p>	<p>Students will make a list of various jobs available in the area of Public Service with emphasis placed on recreation.</p> <p>The students will discuss the importance of good physical and mental health in Recreation jobs.</p> <p>Students will listen to tapes which will give a brief description of duties, qualifications, work study experiences, etc. of jobs in the area of recreation.                      Post test</p>	<p>The students will have a greater knowledge of the requirements and operations involved in various recreation careers.</p> <p>The students will be aware of the relationship between public service jobs and physical education.</p> <p>The students will be more aware of jobs available in the city of Cleveland.</p> <p>The students will have a more positive attitude toward the world of work.</p>

**PUBLIC SERVICE - Recreation**

**INSTRUCTIONAL AND RESOURCE MATERIALS**

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVER	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
Filmstrips: "Park and Recreation Assistant" "Careers in Public Service"	Public Safety Aide	Contact: Addison YWCA  Metropolitan Cleveland Job Council 1375 Euclid Avenue	Contact: Addison YWCA	Pamphlets Brochures SRA Kits Popeye Career Comics DOT Occupational Outlook Handbook Chronicle Occupational Library

**EVALUATION:** Successful attainment of objectives in this unit will be based on the ability of at least 80-85% of the students to write, in detail, or orally discuss the duties, requirements, etc. of jobs listed in this unit.  
 Teacher evaluation of post test will that at least 75-80% of the students correctly answer 80-85% of the post test items.

**SUGGESTIONS FOR IMPROVEMENT OF UNIT:**

**ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:**

## PHYSICAL EDUCATION - PUBLIC SERVICE(RECREATION)

### STUDY SHEET

#### Duties of a Recreation Worker

1. Recreation workers help people to enjoy and use their leisure time constructively by organizing individual and group activities, and by administering physical, social, and cultural programs for all age groups at camps, playgrounds, community centers, and hospitals.
2. They operate recreational facilities and study the recreational needs of individuals and communities.
3. Recreation workers employed by local government and voluntary agencies direct activities at neighborhood playgrounds and indoor recreation centers.
4. They provide instructions in the arts and crafts and in sports such as tennis and basketball.
5. They may supervise recreational activities at correctional institutions, and work closely with social workers in organizing programs of recreation for the young and the aged at community centers and social welfare agencies.
6. Recreation workers in industry plan the recreation programs for company employers and organize bowling leagues, softball teams, and similar activities. Sometimes they plan fund drives and company social functions.
7. Hospital recreation workers plan recreation programs for the ill and the handicapped in hospitals, convalescent homes, and other institutions. Working under medical directions, they organize and direct sports, dramatics, and arts and crafts for persons suffering from mental problems and physical disabilities.
8. School recreation workers organize the leisure-time activities of school-age children during school days, weekends, and vacation periods.

## PHYSICAL EDUCATION - PUBLIC SERVICE(RECREATION)

### I. Additional learning experiences or activities

Students will discuss the duties, employment outlook, fringe benefits etc., of jobs listed in this unit.

Visit a local YWCA to observe their recreational program in action.

Using the gym, set up a recreation center. Appoint a student to act as Director of Recreation. The student in turn will select a physical director, a play director, a recreation instructor, and a playground attendant. Each person will role-play his job title.

Show and discuss the filmstrip, "Park and Recreation Assistant".

### II. Post Test

Which of the following sentences apply to a recreation worker:

1. Organizes arts and crafts for persons suffering from mental problems and physical disabilities.
2. Enforces rules and regulations of the building (acts in an administrative capacity).
3. Does the hiring for the company.
4. Plans company picnics from time to time.
5. Plans social programs for the handicapped.
6. Helps people enjoy their leisure time constructively.
7. Cleans the building.
8. Organizes bowling leagues, softball teams, and similar activities.
9. On some occasions, may organize fund raising projects.
10. Plans meals for the staff.

#### KEY

- 1
- 4
- 6
- 8
- 9

**OCCUPATIONAL CLUSTER: Recreation & Hospitality  
SPECIFIC JOB:**

**SUGGESTED SUBJECT AREA:** Physical Education

**SUGGESTED GRADE LEVEL :** 7,8,9

**GENERAL OBJECTIVES :** (1) To correlate physical education with the Hospitality and Recreation Cluster.

(2) To inform the students of the qualifications required to obtain a job in the field of Hospitality and Recreation.

(3) To foster interest in an effort to motivate the students to seek jobs in the Hospitality and Recreation Cluster.

(4) To create an awareness that a strong background in physical education is essential in the field of Hospitality and Recreation.

SPECIFIC BEHAVIORAL OBJECTIVES	VOCABULARY	LEARNING EXPERIENCES OR ACTIVITIES	DESIRED OUTCOMES
<p>The students will be able to portray the increasing importance of leisure time activities and expanding opportunities for related careers.</p> <p>The students will be able to list three different ways in which physical education is related to Hospitality and Recreation jobs.</p> <p>The students will be able to list and characterize a wide range of careers in the area of Hospitality and Recreation. The student will also be able to name and describe the facilities offered by at least three recreation centers in the Cleveland community</p>	<p>Camp Counselor Life Guard Park Ranger Playground Instructor Physical Education Teacher YMCA/YWCA Director</p>	<p>The students will discuss the duties and qualifications of jobs listed in this Unit.</p> <p>Each student will select one of the jobs listed and act out the role in class. In acting out the roles, students will discuss what the job entails.</p> <p>Show and discuss filmstrips relating to recreation jobs. Post Test</p>	<p>The students will have a greater knowledge of Hospitality and Recreation jobs available in the Cleveland community.</p> <p>The students will have more positive attitudes toward self, others and the world of work.</p> <p>The students will be aware of the duties and requirements of individuals working in jobs discussed in this Unit.</p>

FILMS, FILMSTRIPS, AND TAPES	SOUND SLIDES DEVELOPED BY DVEP	SPEAKERS	FIELD TRIPS	CAREER LIBRARY
<p>Filmstrips:</p> <p>"Learning How to Swim"</p> <p>"How to Do Rescue Breathing"</p> <p>"Physical Fitness for Boys and Girls"</p> <p>"Safety on the Playground"</p>	<p>Tapes:</p> <p>Park Director</p> <p>Recreation Worker</p>	<p>Contact:</p> <p>Director of the Addison YWCA</p> <p>Cuyahoga Community College</p>	<p>Contact:</p> <p>Thurgood Marshall Recreation Center</p> <p>Addison YWCA</p>	<p>Pamphlets</p> <p>Brochures</p> <p>SRA Kits</p> <p>Popeye Career Comics</p> <p>DOT</p> <p>Occupational Outlook</p> <p>Chronicle Occupational Library</p>
<p><b>EVALUATION:</b> Successful attainment of objectives in this Unit will be based on the ability of 80-85% of the students to list three different ways in which physical education is related to Hospitality and Recreation jobs. At least 80-85% of the students will be able to write, in detail, or orally list and characterize at least seven out of ten jobs in the area of Hospitality and Recreation. Teacher rating of post test will be that at least 75-80% of the students correctly answer 80-85% of the post test items.</p> <p><b>SUGGESTIONS FOR IMPROVEMENT OF UNIT:</b></p> <p><b>ADDITIONAL INSTRUCTIONAL AND RESOURCE MATERIALS:</b></p>				

## RECREATION AND HOSPITALITY

### Additional Learning Experiences or Activities

**SUGGESTED SUBJECT AREA:** Physical Education

**SUGGESTED GRADE LEVEL :** 7,8,9

1. The class will list and discuss the various recreation centers available to students in their neighborhood (Thurgood Marshall Recreation Center, Addison YMCA, Addison's Intramural Program, etc.)
2. Invite speaker from neighborhood recreation center.
3. Visit a neighborhood recreation center to observe individuals on the job.



PHYSICAL EDUCATION - HOSPITALITY AND RECREATION

POST TEST

Essay

1. What are some of the duties of hospital recreation workers?
2. Should recreation workers possess leadership skills? Explain.
3. List five jobs that may be classified as a recreation type job.
4. What specifically do recreation workers do?
5. List three qualifications necessary for one interested in becoming a lifeguard.

TRUE OR FALSE

1. You must have a Bachelor of Science degree to become a recreational worker.
2. Because of increased leisure time by Americans, there will be a decrease in employment for recreation workers.
3. Good health, emotional maturity, and a warm personality are essential qualities for recreation workers.
4. Opportunities for advancement to administrative positions in the field of recreation often are limited for persons who have no graduate school training.
5. Recreation workers help people enjoy and use their leisure time constructively.

A P P E N D I X

DEVELOPMENTAL VOCATIONAL EDUCATION

Quincy-Woodhill Building  
229-5310

Available Materials

Audio Visual Equipment

- 4 34 MM Cameras
- 3 Cassette Recorders
- 2 16 MM Projectors
- 3 Overhead Projectors
- 18 Sound-slide Projectors
- 1 Sound Filmstrip Projector

16 MM Films

- |                                     |  |
|-------------------------------------|--|
| Careers in Transportation           | Careers in Skilled Services (Sales)      |
| Money in the Hand and Out           | Careers in Personal Services             |
| Horizons Unlimited (Health Careers) | Careers in Industry                      |
| Building a House                    | Careers in Business & Office Occupations |
| The Joys of Selling                 | The City                                 |
| Seaport                             | Our City Government                      |
| Careers in Machine Trades           | Trucks in Our Neighborhood               |
| Careers in Building Trades          | Dairy: Farm to Door                      |
| Careers in Communication            | Postman: Rain or Shine                   |

Filmstrips

- |                         |                             |
|-------------------------|-----------------------------|
| Who Are You?            | Television                  |
| How Do You Get There?   | The Newspaper               |
| What Do You Like To Do? | The Telephone               |
| What is A Job?          | Books                       |
| What Good Is School     | Communicating Ideas         |
| Motion Pictures         | Communicating Without Words |
| Radio                   |                             |

Filmstrips Cont.

Conservation For Today's America (Series With Sound)

- (a) Land Conservation Today
- (b) Water Conservation Today
- (c) Urban Conservation Today
- (d) Wildlife Conservation Today
- (e) Mineral Conservation Today
- (f) Forest Conservation Today
- (g) Soil Conservation Today

Sound-Slides

Airport	Bus
Railroad	Radio
Post Office	Television
Police Department	Ships
Fire Department	Home Economics
Newspaper	

Posters

- Business and Office
- Manufacturing
- Fine Arts & Humanities
- Marine Science
- Marketing & Distribution
- Environmental Control
- Hospitality and Recreation
- Agri-Business & Natural Resources
- Communication
- Transportation - Ships
- Manufacturing - Apparel
- Health Services

RICHARD'S ROSEN PRESS  
Careers in Depth Series Cont.

Journalism  
Landscape Architecture  
Law Enforcement  
Librarian  
Marines  
Marketing  
Medical Assisting  
Medical Technology  
Merchant Marine  
Meteorology  
Minister  
Model  
Museums  
Music  
NASA  
Naval Architecture  
Navy  
Nuclear Energy Fields  
Nun  
Nursery Industry  
Nursing  
Occupation Therapy  
Oceanography  
Optician  
Optometry

Own Business  
Personnel Work  
Physics  
Pilot  
Pharmacy  
Photography  
Physician  
Printing  
Public Relations  
Rabbi  
Radiologic Technology  
Railroading  
Real Estate  
Retailing  
School Psychology  
Secretary  
Shorthand Reporter  
Social Work  
Television  
Temporary Office Worker  
Traffic Management  
Translating and Interpreting

JULIAN MESSNER SERIES

Your Career in Advertising  
Your Career in Aerospace Industry  
Beauty As A Career  
Careers in Biological Science  
Your Career in Chemistry  
Your Career in Civil Service  
Your Career in Computer Programming  
Disease Detectives  
Engineers Unlimited  
Guide To Professional Careers  
Fashion as a Career  
Your Career in Film Making  
Your Career in Foreign Service  
Careers in the Health Field  
Careers for Home Economists  
Careers in Horticultural Sciences  
Careers in Hotel Management  
Your Career in Interior Design  
Your Career in Journalism  
Your Career in Law Enforcement  
Careers in the Legal Profession  
Careers in the Library World

Your Career in Medicine  
Your Career in Nursing  
Your Career in Oceanology  
On The Job Training  
Your Career in Parks & Recreation  
Your Career in Public Relations  
Your Career in Selling  
Skyblazers  
Social Service  
Stagestruck (Theatre)  
Your Career in Teaching  
The Teen-Age Diet Book  
Your Career in Transportation  
Your Career in the World of Travel  
Your Career in TV and Radio  
What About Teen-Age Marriage?  
You and Today's Troubled World  
Your Career-If You're Not Going to College  
Your College Education-How to Pay for It  
Your Handicap-Don't let it Handicap You  
Your Personality and You

SRA Book Series

- I. Our working world- Families at work (text and records)  
Our working world - Cities at work  
Our working world - Neighbors at work
- II. Educational filmstrips and records
  - A. Conservation for today's america  
(4 records and 4 filmstrips)
- III. Career Opportunities  
New York Life Insurance Company  
Box 51, Madison Square Station  
New York, N.Y. 10010 1958  
(a series of articles designed to help guide young  
people to a better future)

Career Development Resource Materials

1. Occupational Exploration Kit  
Science Research Assoc. (Sr. High)  
259 W. Erie St.  
\$99.50 (approx price)
2. Language Development Kit
3. Work (Widening Occupational) Kit

Note: (The above are available at the Visual Aid Center and the Cleveland Public Library)

Popeye Career Comics  
King Features  
235 E. 45th St.  
N.Y. N.Y. 10017

Occupational Library, Chronicle, Moravia, N.Y.  
Based on D.O.T.  
DVEP Office

People and Choices Career Folios (Bernard C. Watson professor and Chairman  
Urban Educ. Temple University)  
Division of Urban Education  
a program to acquaint pre-high school students with career possibilities  
Harcourt Brace Jovanovich, Inc. N.Y.

## Sound Filmstrips

Guidance Association of Pleasantville, N.Y.

### I People who help others

Filmstrips:

- A. Physical Therapist
- B. Day care worker
- C. Community Organizer
- D. People who help others

### II People who work in science

Filmstrips:

- A. People who work in science
- B. Recording Engineer
- C. Laboratory Technician
- D. Ocean Life Scientist

### III People who make things

Filmstrips:

- A. People who make things
- B. Aircraft assembler
- C. Chef
- D. Model builder

### IV People who create art

- A. People who create art
- B. Puppeteer
- C. Musician
- D. Designer

### V People who influence others

Filmstrips:

- A. People who influence others
- B. Model (homemaking)
- C. Creative director (art)
- D. County agent (horticulture)

### VI People who organize facts

- A. People who organize facts
- B. Bakery fore-woman
- C. Automotive researcher
- D. TV sports editor



ADDITIONAL MATERIALS AVAILABLE IN THE  
DEVELOPMENTAL VOCATIONAL EDUCATION OFFICE

I. Posters:

1. They set their sights on careers at sea.
2. Leisure and restaurants
3. Where people work
4. Trades and industrial
5. Home economics
6. Business education - General

II. Tapes (the world of work)

1. On the job (20tapes)
2. Getting a job (20 tapes)
3. Cross - Vocational skills and information (20 tapes)

III. Games

1. Travel Connection
2. Transportation
3. Riddle your way

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

VISUAL AIDS LIST

Careers in the Building Trades. 26 Minutes

Easy-to-follow language and lively action demonstrate some of the tasks carried on in the various trades practiced by the largest group of skilled workers in the nation.

Careers in Business and Office Occupations. 25 Minutes

Helps youngsters develop an understanding of what is required in office occupations. A number of these occupations were unknown only a few years ago.

Careers in Communications. 30 Minutes

What do workers in this essential area do? The film gives a close-up look at various opportunities available and some of the skills and talents required.

Careers in Industry. 26 Minutes

Ranges over some of the many opportunities American industry provides with a closer look at some specific occupations. It also emphasizes importance and satisfactions of jobs in this area.

Careers in Machine Trades. 29 Minutes

Portrays some of the skilled trades involving use of powerdriven machinery. The program relates the occupation to young people's own interests and future.

Careers in Personal Services. 29 Minutes

Looks at the jobs of those, from firemen and policemen to beauticians and barbers, who want to work with people. It demonstrates their role in making life safer and pleasanter.

Careers in Sales--"The Joys of Selling". 26 Minutes

Every industry, business, and community employs sales people. So, the variety and opportunities are limitless. The film explores some of the directions young people with a bent for selling can follow.

Careers in Skilled Services. 25 Minutes

The people who install, maintain, and repair automobiles and machinery in homes, offices, and factories keep the nation running. The program shows some of the talents and skills used in a wide field with a shortage of trained personnel.

Careers in Transportation. 24 Minutes

These workers help move passengers and goods over highways, railways, airways, and seaways across continents and oceans, or inside cities and communities.

How Do You Get There. 26 Minutes

Here are the tips youngsters need on how to start looking for a job-- newspaper ads, employment agencies, etc; how to apply and how to approach an interview. There is also information on technical courses at two-year colleges, apprenticeships, and on-the-job training.

Airplanes Work for Us. 11 Minutes

Depicts some of the common and uncommon uses of aircraft, pointing out that in addition to the carrying of passengers and freight, airplanes and helicopters are used for fire patrol, rescue work, weather patrol, construction of power lines and crop dusting. Describes air to ground communication and shows many auxiliary jobs other than the actual piloting of aircraft.

Building a House. 11 Minutes

Shows the main stages in building a house and pointing out the importance of each workman's special skill in following the architect's plans.

The City. 11 Minutes

Features a complex modern city with private homes, apartments, office buildings, schools, stores, and factories. Pictures the major transportation facilities, the huge suburban sprawl, the city's elected governmental body, and the city departments such as the fire and police departments.

Dairy Farm to Door. 11 Minutes

Presents the story of milk production and processing showing views of the dairy farm, the creamery, the distribution of processed milk and other dairy products to the home and market.

Exploring the Ocean. 11 Minutes

Uses drawings, diagrams, animation, and photographs of the ocean floor to reveal the wealth of the ocean in minerals as well as in plant and

animal life. Shows the work of oceanographers and describes the part played by the water cycle in depositing minerals in the ocean.

Industry. (filmstrip)

Discusses the growth and importance of industry in New England and describes various industries such as shoes, textiles, hardware, paper hats, silverware, firearms, electronics and others.

Money in The Bank and Out. 15 Minutes

Explains how a bank helps the community by keeping money in circulation and explains such procedures and terminology as deposits, checks, interest, loans, and money flow.

Our City Government. 10 Minutes

Views the urban community and its government. Considers how a city government provides services and makes and enforces laws. Discusses the functions of the city council, mayor or city manager, and courts.

Postman: Rain or Shine. 11 Minutes

Follows a letter from the time it is mailed in Kansas until it is delivered in California, describing the role of trains, trucks, planes, and the postman. Shows the use of automation in the post office.

Seaport. 16 Minutes

Gives an insight into the seaport area of a large city and such activities as loading and unloading of cargo, hiring of seamen, varied types of work and workers, and making a ship seaworthy for another trip.

Transportation. (filmstrip)

Illustrates the different types of transportation needed, including railroads, airlines, buses, automobiles, boats, and pipelines.

Trucks in our Neighborhood. 12 Minutes

Shows many kinds of trucks and how they work to help the neighborhood.

Communication: Books. (filmstrip)

Explains how a book is published and distributed and shows the role that libraries play.

Communication: Communicating Ideas. (filmstrip)

Points out that men in all societies have ways of communicating with each other and emphasizes that our modern society works because we have easy, rapid, and reconizable systems of communication.

Communication: Communicating Without Words. (filmstrip)

Illustrates some of the ways in which we communicate without words, including gestures, pictures, sounds, touch, signs and symbols, odors and appearance.

Communication: Motion Pictures. (filmstrip)

Explains how motion pictures are produced and discusses the motion picture as a particular type of communication.

Communication: Radio. (filmstrip)

Explains the importance of radio to people, businesses, and city agencies.

Communication: Television. (filmstrip)

Explains how television programs are produced and why television is important to people.

Communication: The Newspaper. (filmstrip)

Explains why newspapers are important and how they are produced.

Communication: The Telephone. (filmstrip)

Explains how the telephone establishes a network of communication that ties us in a city, across the country, and around the world.

Conservation for Today's America. (filmstrip)

Contains: soil, forest, water, wildlife, mineral, urban, and land conservation today.

## STUDENT TOURS OF OFFICES

Attached is a list of companies which will accommodate students for tours of offices. When making arrangements in writing or by phone, it would be helpful if you would include the following information:

1. Make sure the date and time of the tour is accurate.
2. Ask your contact to furnish you with orientation information on the company so you can conduct an orientation session on the company before the tour. This information could include: brief company history; product or services; production processes; annual sales; payroll, profit, dividends, and taxes; employment of men and women in the plant and offices; product use and markets etc.
3. Give the person who is arranging the tour as much advance notice as possible. Two weeks notice is not uncommon.
4. Give the number of students who will be on the tour and the name or names of the teachers or other supervisory persons who will accompany the students. Remember most companies have a limit on the number of people they can accommodate.
5. Get the consent of your principal and the parents of the students.
6. Remind your students to ask pertinent questions and have one or more students react by making favorable comments to the company representatives at the end of the tour.
7. Have students write "thank you" letters.



Company and  
AddressPerson to ContactSpecial Information

Eaton Corp.  
100 Ericview Plaza  
Cleveland, Ohio 44114

Mr. Leonard C. Jarvis  
Office Services Manager  
523-5356

The Standard Oil Co.  
Midland Building  
Cleveland, Ohio 44115

Mr. Andrew Molnor  
Employment Director  
575-5948

National Acme Corp.  
East 131 St. & Coit Rd.  
Cleveland, Ohio

Mr. Walter Eandlow  
Training Director  
268-4200 Ext. 460

The East Ohio Gas C.  
East Ninth & Superior  
Cleveland, Ohio 44113

Mrs. Marilyn Mize  
Public Relations Dept.  
522-2949

The Plain Dealer  
1801 Superior Avenue  
Cleveland, Ohio 44114

Miss Genevieve Mohlor  
Promotion Dept.  
523-4245

The Penn. Mutual Life Ins. Co.  
33 Public Square Building  
Cleveland, Ohio 44113

Dorothy York  
Office Manager  
861-7780

New York Life Ins. Co.  
55 Public Square  
Cleveland, Ohio 44113

Miss Frances Shinn  
Office Manager  
969-2610

Sears Roebuck and Co.  
8501 Carnegie Avenue  
Cleveland, Ohio 44106

Mr. Earl D. Ellis  
Director of Urban Affairs  
795-2233 Ext. 346

The Buckeye Union Ins. Co.  
Rockefeller Building  
614 Superior, West  
Cleveland, Ohio

Miss Christina Greive  
861-660

Tour hours. 10 a.m. to 2 p.m. Tour  
includes three key departments:  
Energy Control Center, Customer  
Information and Data Processing

Tour includes: City Room, Company  
Room, Engraving Department, Stereo-  
type Department, Press Room and wire  
Library

Company and  
Address

Glidden Durkee Div.  
Union Commerce Building  
East Ninth & Euclid  
Cleveland, Ohio

Federal Reserve Bank  
P.O. Box 6387  
Cleveland, Ohio 44101

The Cleveland Press  
901 Lakeside Avenue  
Cleveland, Ohio 44114

The Warner & Swasey Co.  
5701 Carnegie Avenue  
Cleveland, Ohio 44103

Travelers Ins. Co.  
1801 East Ninth St.  
Investment Plaza  
Cleveland, Ohio 44116

Harshaw Chemical Co.  
1945 E. 97 St.  
Cleveland, Ohio 44106

Ford Motor Co.  
P.O. Box 9868  
Cleveland, Ohio 44101

The Geo. Worthington Co.  
P.O. Box 6028  
Cleveland, Ohio 44101

Person To Contact

Miss Norma Thompson  
Employment Supervision  
771-5121

William Idsardi  
Public Information Director

Mr. Glen Rynearson  
623-1111 Ext. 630

John Krisiko  
Training Coordinator  
431-5580 Ext. 304

Marilyn Walton  
Personnel Assistant  
241-4646 Ext. 302

Miss Doris Smith  
Manager of Research  
Administration

Mr. Richard A. Weiss  
Supervisor of Personnel  
433-7000 Ext. 473

Betty Urban  
241-1600 Ext. 226

Special Information

Tours scheduled at 9:30 a.m.  
and 1:30 p.m. No more than  
25 persons

Tours scheduled at 9:30 a.m.  
and 1:30 p.m. Size of group:  
minimum-10, Maximum-25.  
Length of tour - 45 minutes.

Tours scheduled at: 9:30 a.m. to  
11:00 a.m. Tour includes:  
orientation, plant offices,  
maximum - 10

Tour includes: Computer  
center, office publicity,  
Magnetic Card Typewriter

Will accommodate 10-15 students

Company and  
Address

Allstate Insurance  
75 Executive Parkway  
Hudson, Ohio 44236

Addressograph-Multigraph  
1200 Rabbit Road  
Euclid, Ohio 44117

Person To Contact

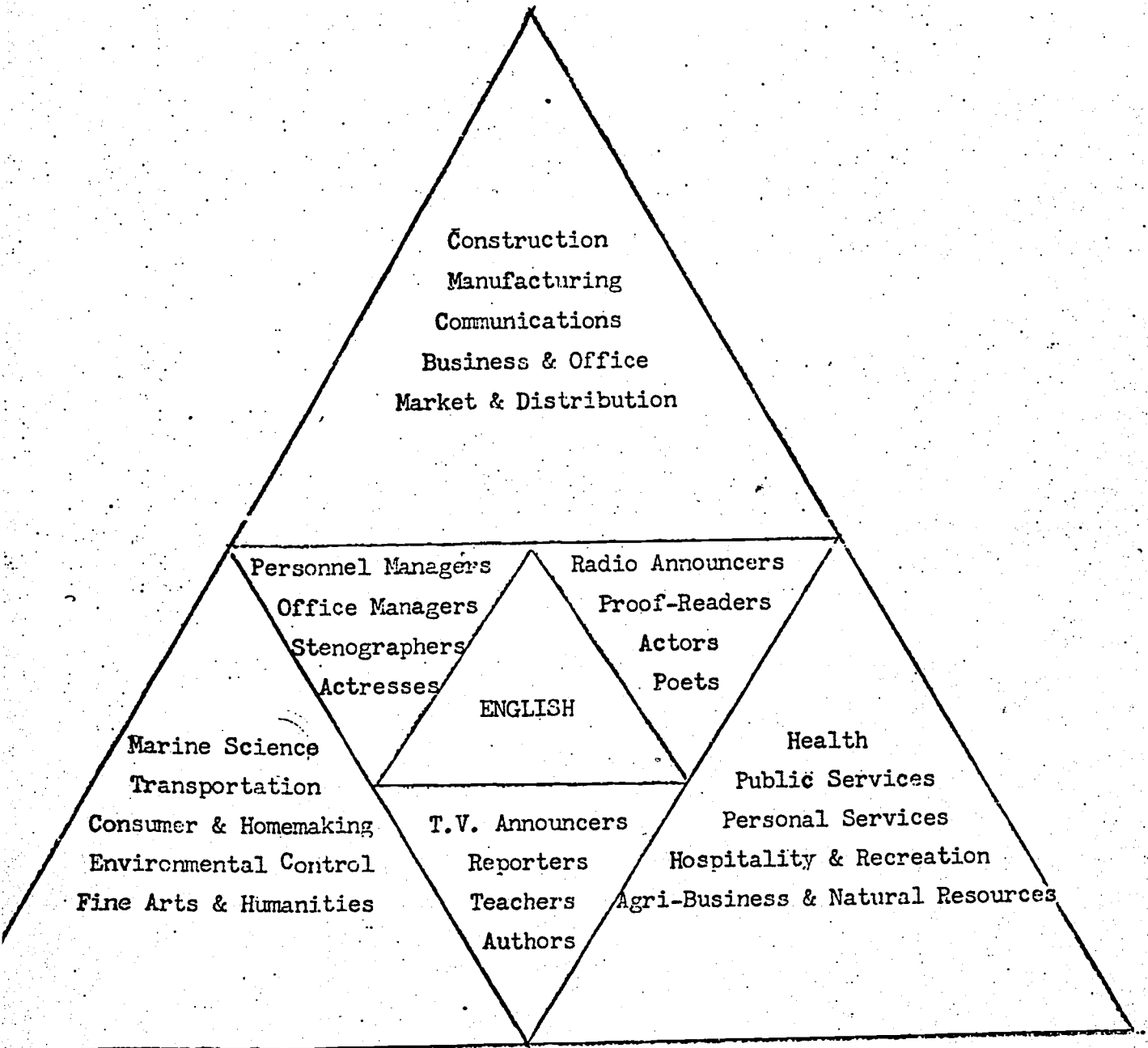
Jane Van Alren  
Personnel Manager  
656-6120

J.W. Fulton  
731-8000 Ext. 418

Special Information

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

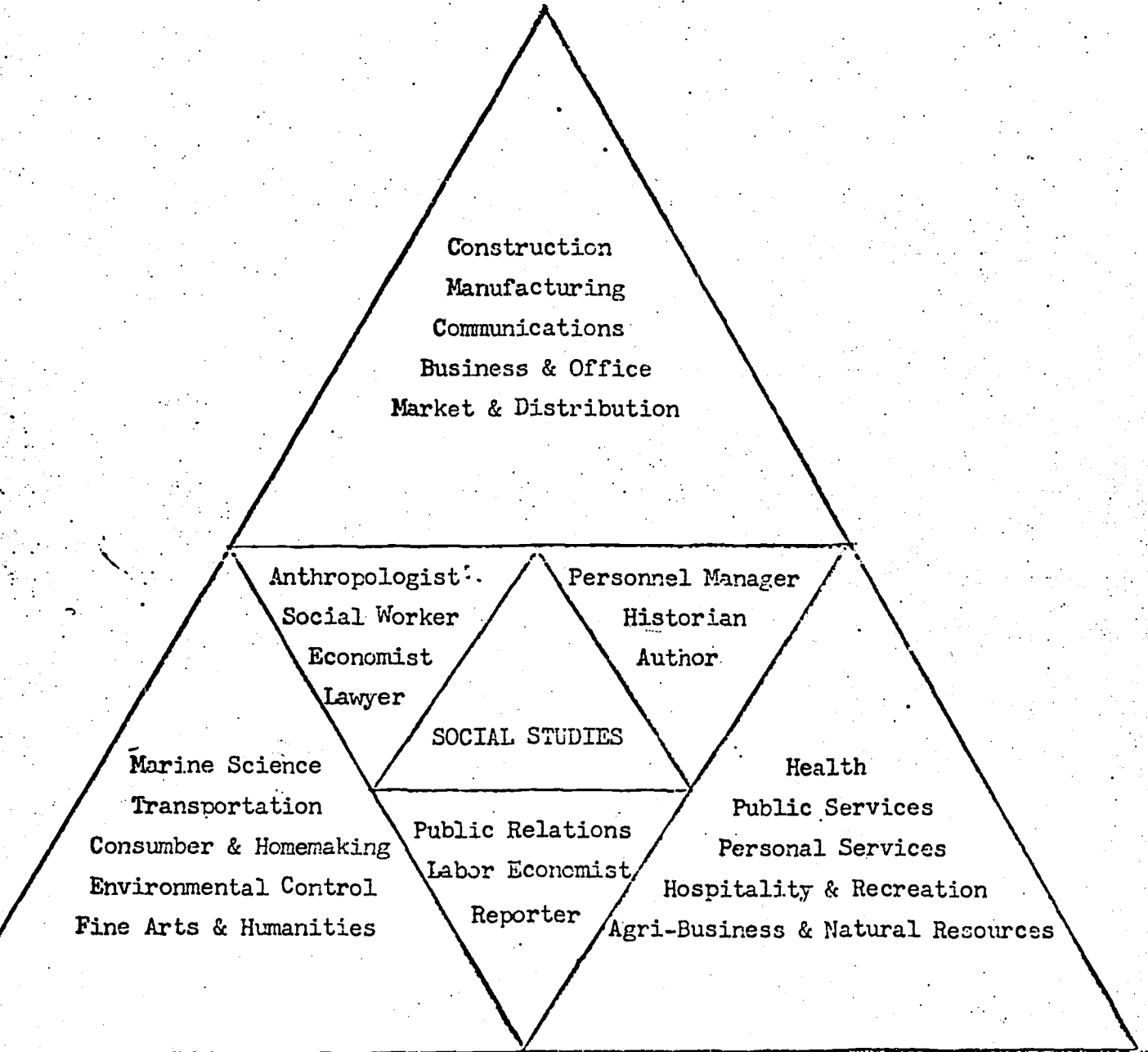
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OCCUPATIONS RELATED TO ENGLISH

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

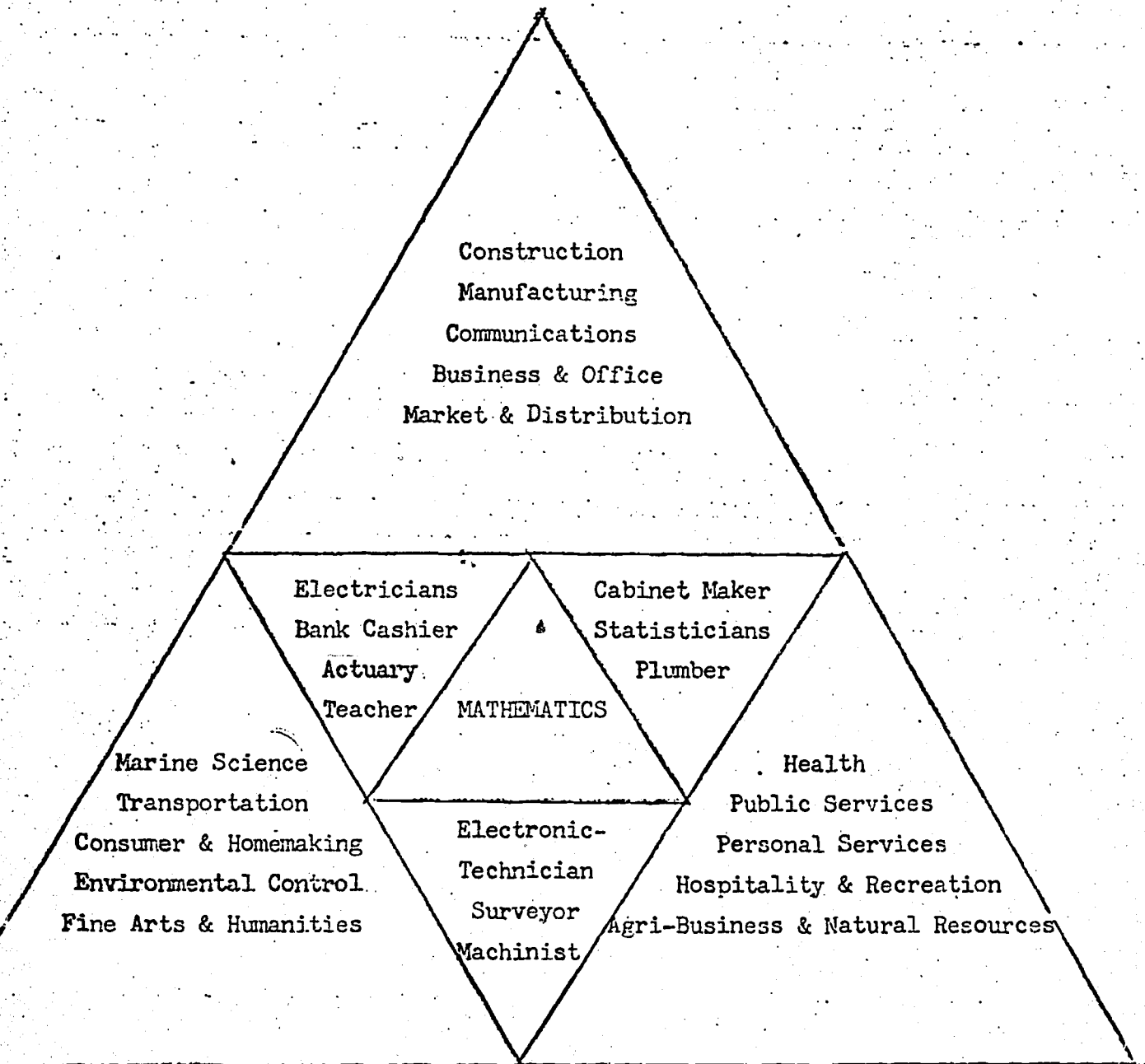
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OCCUPATIONS RELATED TO SOCIAL STUDIES

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

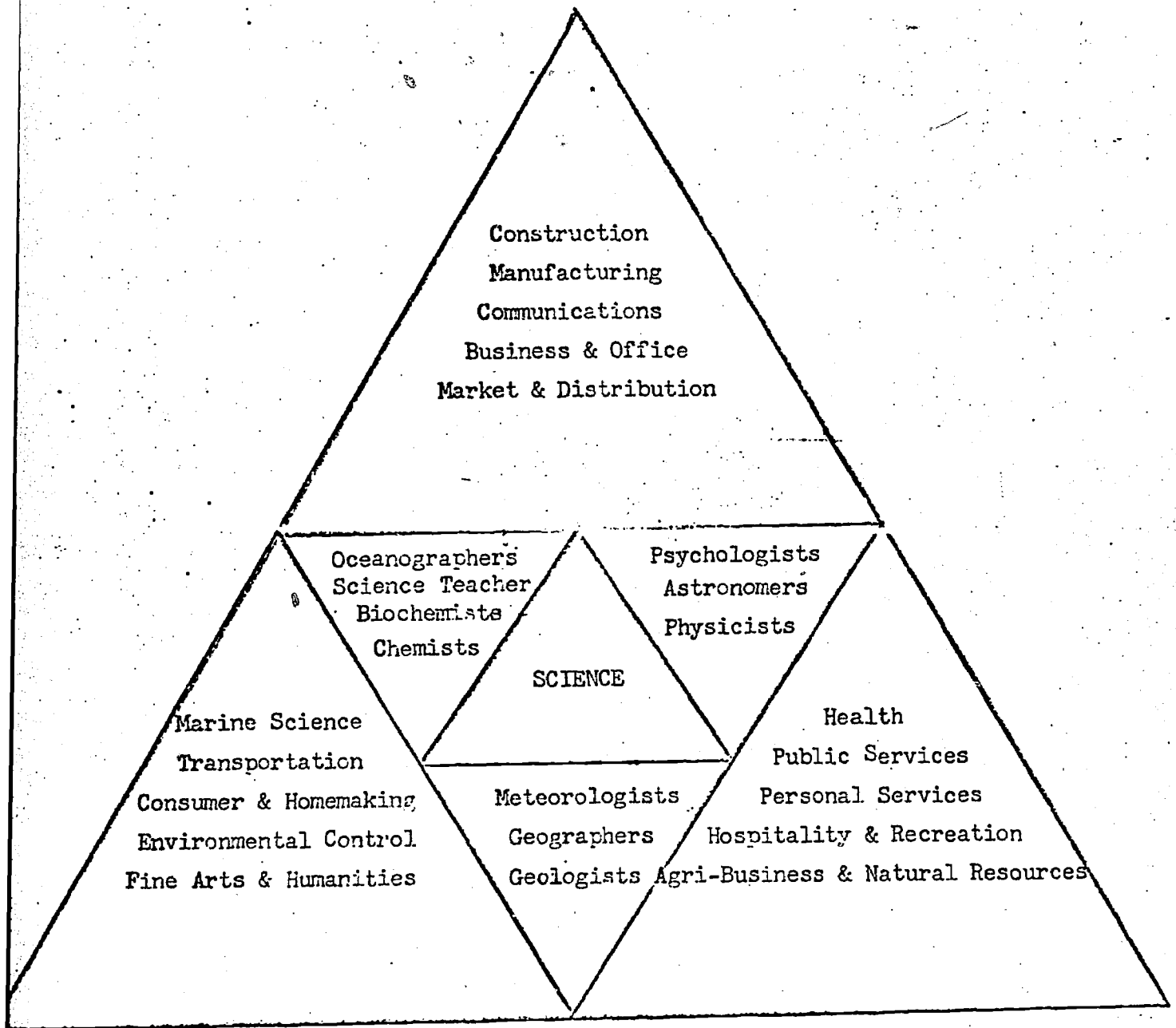
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OCCUPATIONS RELATED TO MATHEMATICS

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

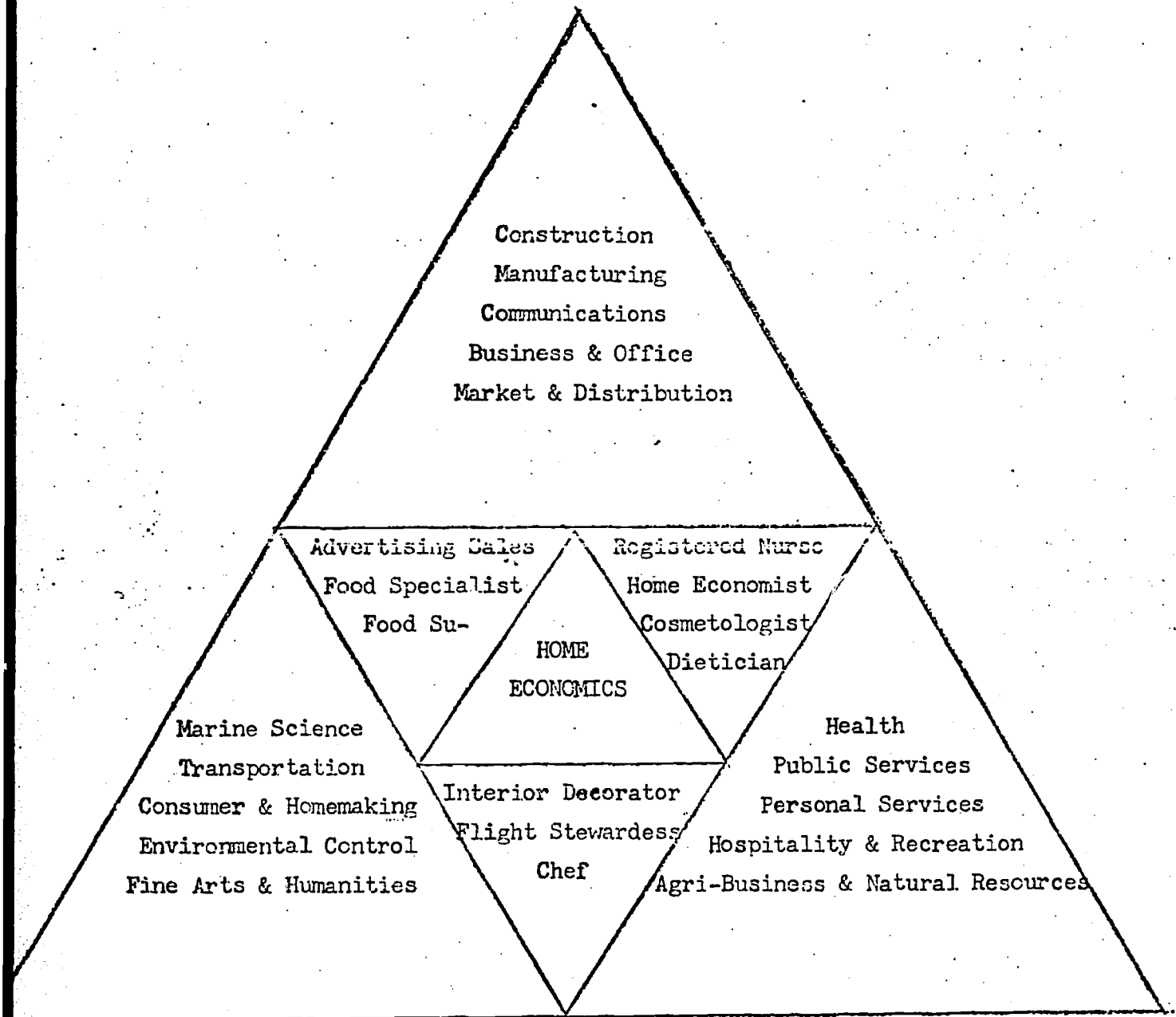
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OCCUPATIONS RELATED TO SCIENCE

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

PHASE II- III

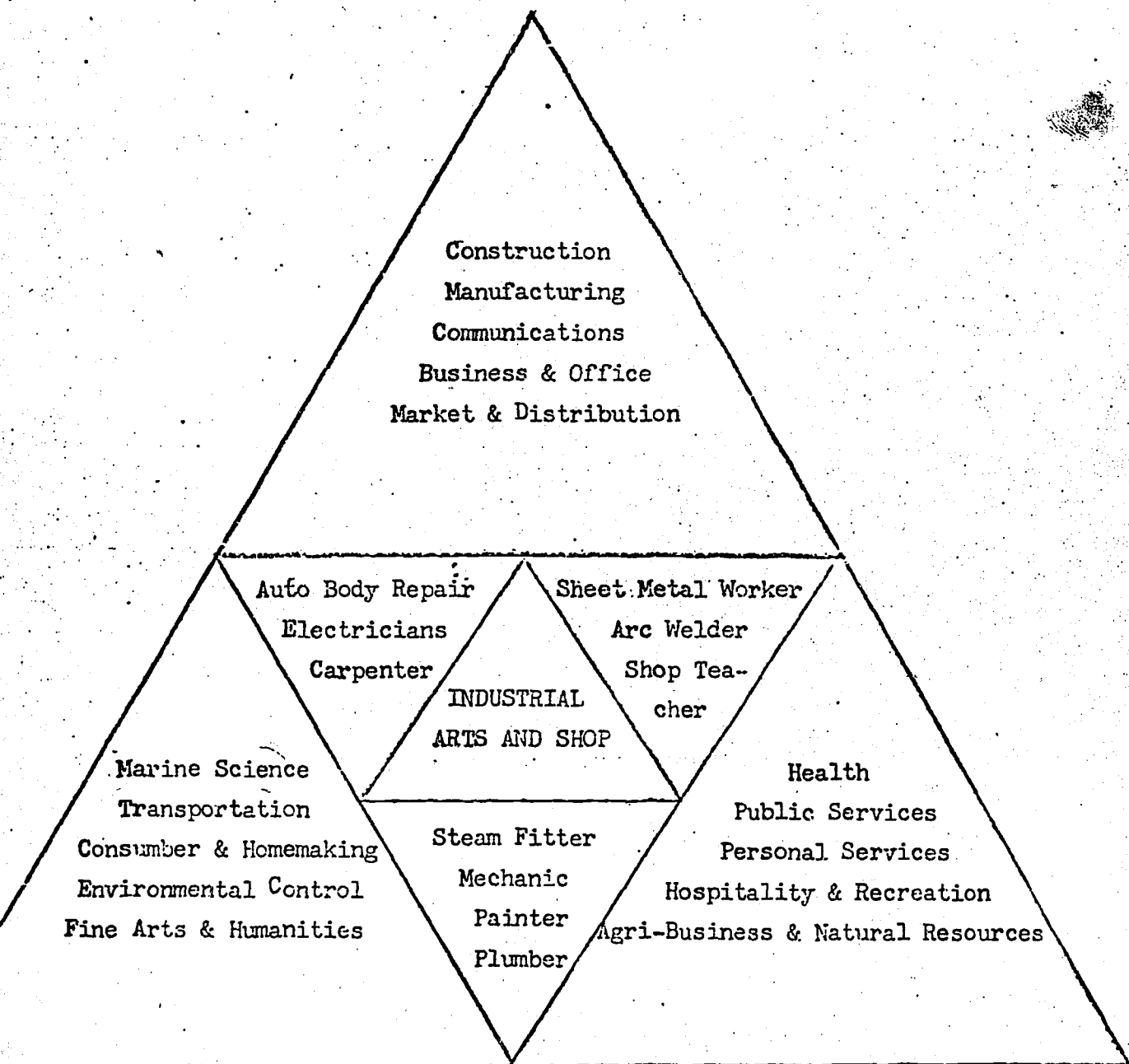


OCCUPATIONS RELATED TO HOME ECONOMICS



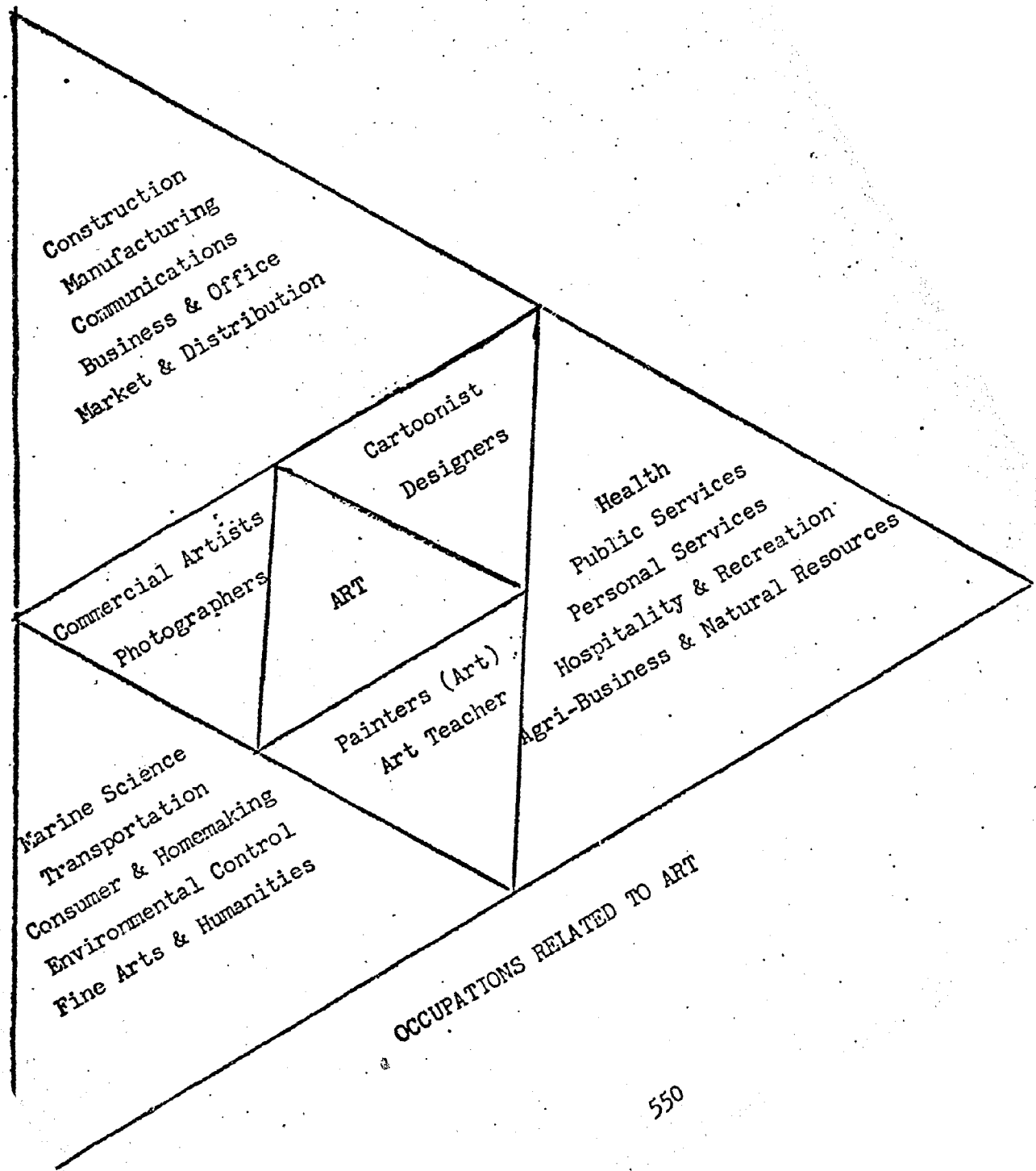
DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

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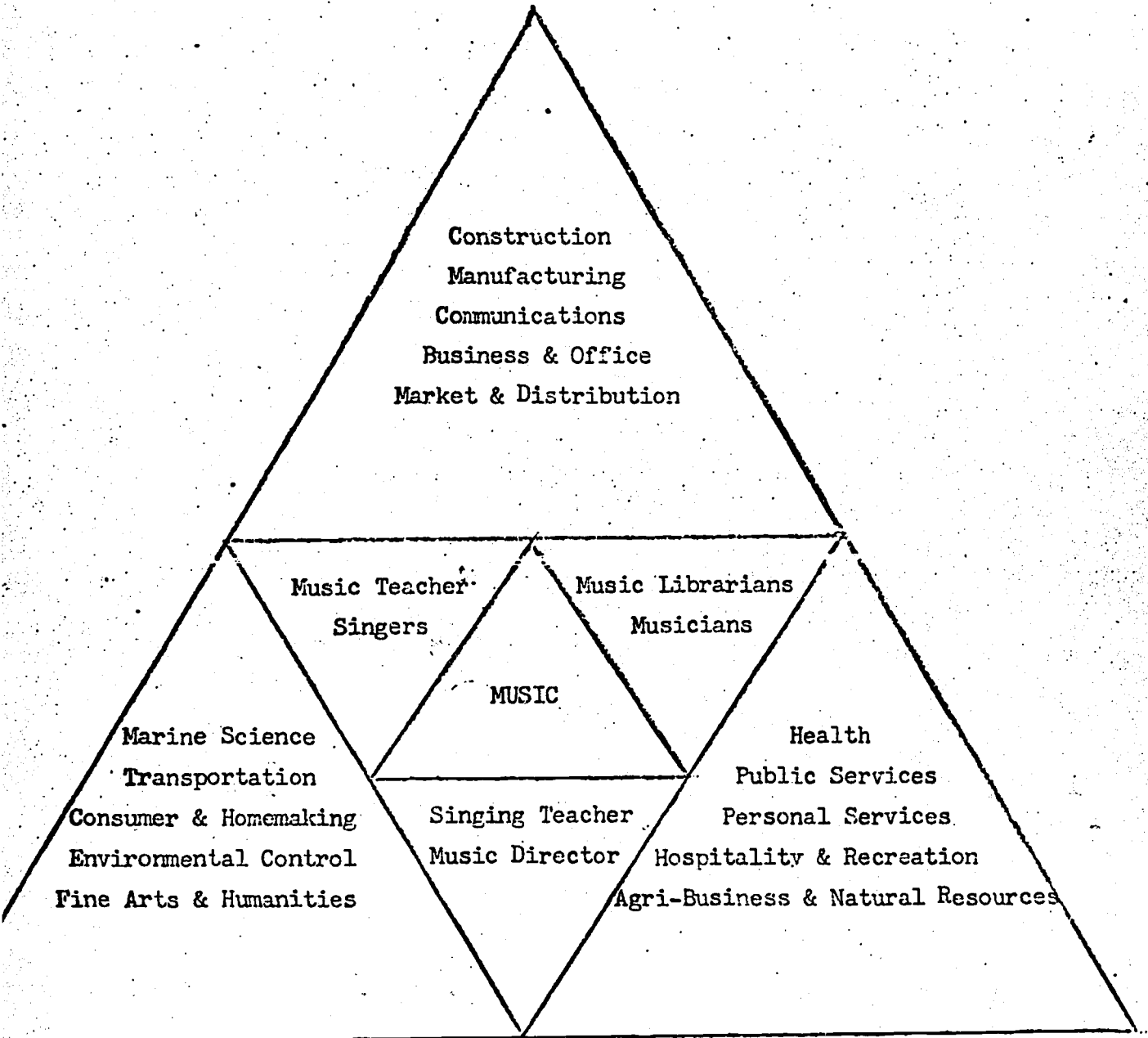
OCCUPATIONS RELATED TO INDUSTRIAL ARTS AND SHOP

DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM  
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DEVELOPMENTAL VOCATIONAL EDUCATION PROGRAM

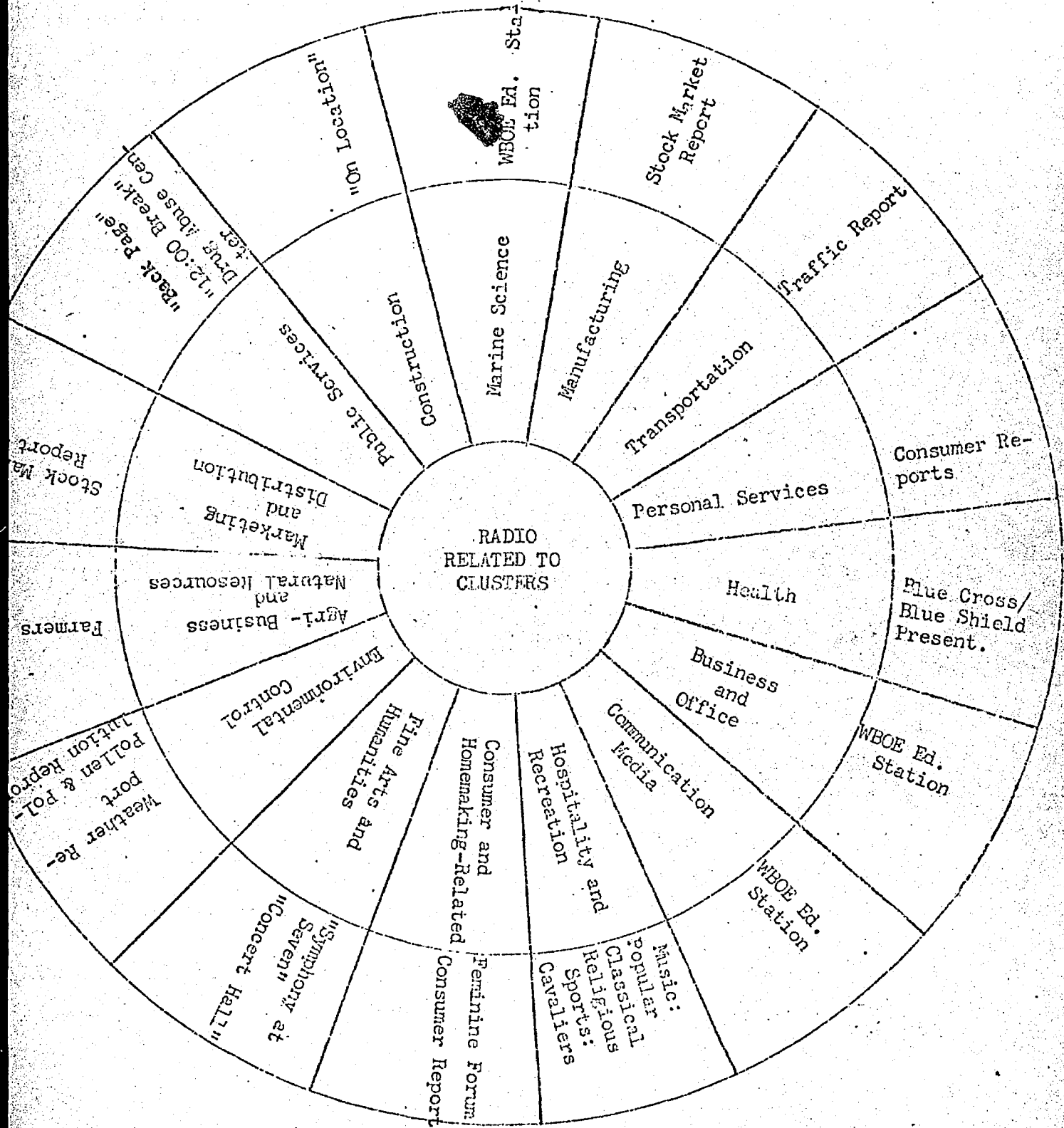
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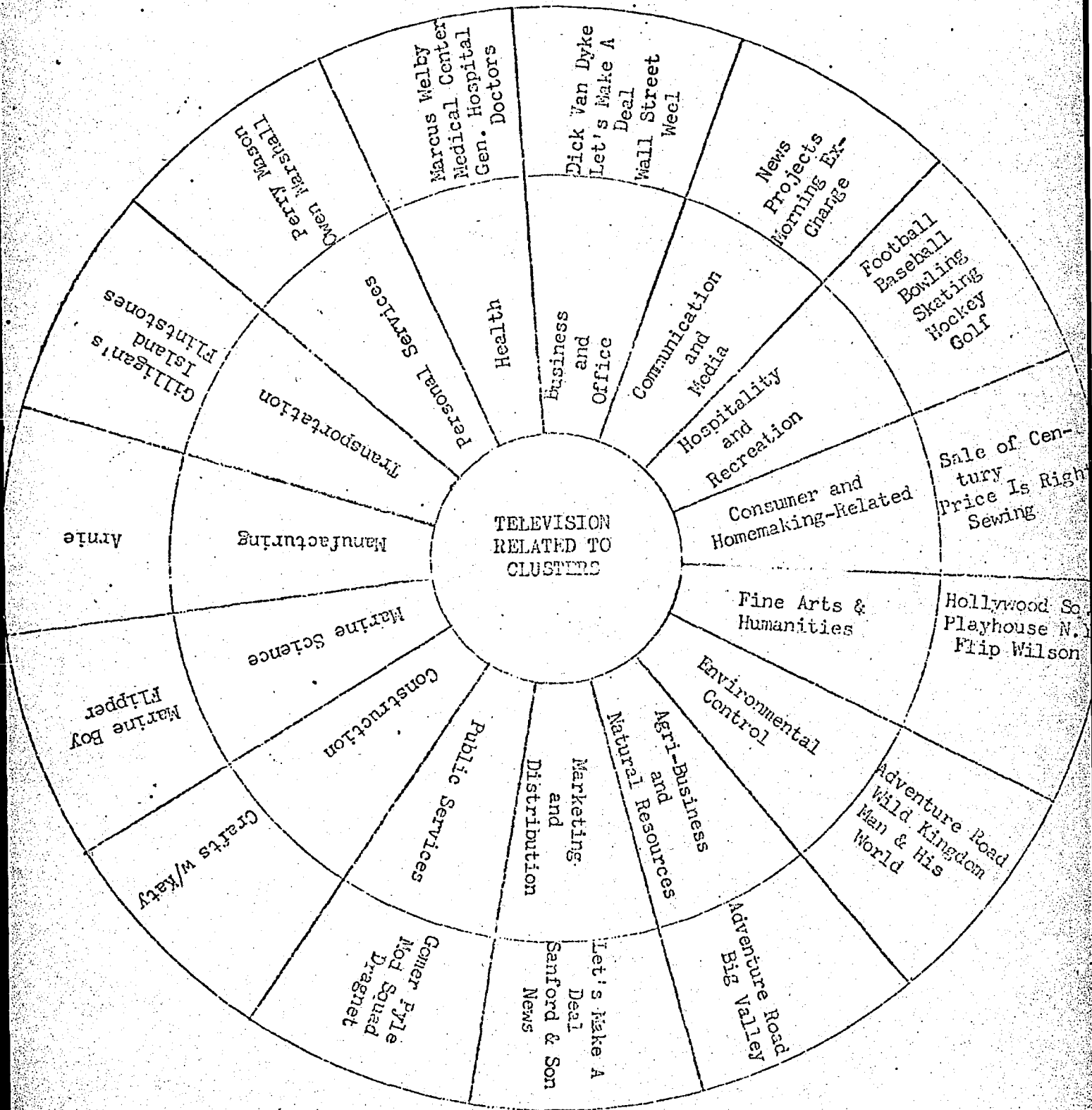
OCCUPATIONS RELATED TO MUSIC



RADIO PROGRAMS RELATED TO OCCUPATIONAL CLUSTERS



TELEVISION PROGRAMS RELATED TO OCCUPATIONAL CLUSTERS



## BIBLIOGRAPHY

Occupational Outlook Handbook  
U.S. Department of Labor  
Bureau of Labor Statistics  
Washington, D.C.

This handbook is a guide to employment opportunities in a broad range of occupations that covers all the principal areas of work. It brings together information of significant for those who are planning a career. Service as a basic tool in the vocational guidance process. We use this guide to gather comprehensive information on career opportunities.

Career Opportunities  
New York Life Insurance Company  
Career Information Service  
Box 51, Madison Square  
Station New York, N.Y. 10010

Soft back book composed of a series of articles designed to help guide young people to a better future. These books are easy reading material. They are used as a part of our careers library. We find it good in that our students can easily relate to it, each article is based on the experience of one who has distinguished himself in his respective field.

English On The Job  
Jerome Carlin  
Globe Book Company, Inc.  
New York 10 New York

This book capitalizes upon that interest by organizing the English activities around a core of vocational guidance. We use it because it not only improves the students' English expression, but it also helps them gain insight into some of the problems facing them. The students' learning proceeds simultaneously in two directions: A better understanding of his potentialities in the world of work, and a better command of the communication skills needed in all phases of everyday living.

The Story Steel  
United State Steel Corporation  
600 Grant Street  
Pittsburgh, Pa. 15219

A pamphlet style book which describes how steel is made. We use it to stress the importance of steel, it takes you from smelting of metals in prehistoric through the fascinating development of the iron making processes.

Careers In Depth  
Richards Rosen Press

This series covers all the careers in practical terms for the young man or woman who is interested in more than just a job. All books were written by prominent men and women who are successful in their chosen fields.

Handbooks Of Job Facts  
Scientific Research Associates

An occupational summary which helps to pinpoint the basic features and trends of a variety of significant occupations, contains concise summaries of basic data on 300 major occupations.

Industrial and Commercial Wiring  
Kennard C. Graham  
American Technical Society - Chicago, USA

This book has been rewritten to reflect the latest developments in the electrical field covering new techniques and materials, and incorporating the latest additions and changes in the National electrical code. It's especially good that it begins with basic lighting terms and principles. Study guide also accompany the book.

Electrical Construction Wiring  
Walter N. Alerick  
American Technical Society  
Chicago, Ill. 60637

This book includes the latest accepted changes in wiring, also the more traditional wiring procedures that are still recognized by the NEC. The text is very suitable for self study. Questions are found at the end of each chapter for personal check up, classroom discussion, or assignments. They are designed to reinforce the information given in the chapter and to aid in giving directions for the review of the material in the chapter.

Related Mathematics For Carpenters  
L.S. Chamberlain  
American Technical Society

This book deals with mathematics as it relates to a practical occupation. The authors teaching experience demonstrated that students found it easy to learn mathematics when the materials consisted of realistic problems such as one might encounter on a job.

Automotive Maintenance and Trouble Shooting  
Leslie F. Goings and Edward D. Spicer  
American Technical Society  
Chicago, 60637

This hard back book is based upon three main objectives (1) To show how to prevent most troubles, (2) to find out how to quickly and adequately locate the cause of any trouble, (3) once it is known what is wrong, to show how to restore the care to satisfactory operations.



The Epic of Steel  
United State Steel  
Public Relations  
100 Erieview Plaza  
Cleveland, Ohio 44114

This is a resource book used to get more detailed information about the steel industry.

Your Future In Daily Newspapers

This is easy to read material describing the jobs in the newspapers field. It is used as a part of our career library.

Hospitality Program

(Food Service & Lodging Ed.)  
Council on Hotel, Restaurant and  
Institutional Education (1970)  
1522 K. Street, N.W.  
Washington, D.C. 20005

This book is used to gain information in the area of good service and lodging. It explains the requirements one needs if he or she is interested in managing a large hotel or motel. It also explains how one might go about getting into the areas of food catering.

Health Careers

The Greater Cleveland Hospital Association  
1001 Huron Road  
Cleveland, Ohio 44115

This guide provides minimum basic entry information about allied health education programs in Northeast Ohio. We have used this booklet as a reference tool for seeking information about an approved health career program. It explains in detail the jobs available, the requirements, the grants available and suggested places for training.

Aim High Vocational Series

Richards Rosen Press, Inc.,  
New York, New York

— The Aim High Vocational Guidance series is for the young person who is looking for a job. All of the books are written by experts in the occupations who know what the jobs are about. The series covers occupational opportunities for young people and will help them to make decisions concerning them.

## A Guide To Professional Careers

Walter Duckat

Julian Messner, a division of Simon & Schuster Inc.  
New York, New York 10018

This book is as it said a guide to professional careers. Many careers are mentioned in this book for college bound students. The requirements, training, duties, salaries and future outlook for each career are clearly detailed, with helpful cross references to other closely related professional careers. The book is unique in that each career description includes questions to determine the reader's interest in and capabilities for the profession.

## How To Plan A House

G. Townsend & J. Dalzell

A multi purpose book written in a practical and authoritative manner. Designed to instruct the layman on house planning intelligently. The book is also written to be of value to builders, developers, apprentices and students wishing basic information on planning. The book provides an entire course in design in the residential field presenting plans, how plans are made, and factors involved in shopping plans.

## Machine Shop - Operations & Setups

Porter Lascoe, & Nelson

A text written by professionals in the field, with the purpose of providing basic training in conventional machine operations and information regarding the latest developments and machine tool business. The book also provides the student with innovations which will be useful in the future using illustrations and language basic to the trainee.

## Concrete Block Construction: For Home & Farm

J. Dalzell, Townsend

A guide written by professionals working in the field which carries the reader step by step through experience tested methods of erecting a structure designed to eliminate common errors in the use of concrete blocks, this book is filled with instruction valuable to the beginner as well as the mason inexperienced with the concrete block.

## Steel Square

Townsend

A "How to do it" book with detailed instructions and illustrations for the carpenters or helper on the use of the steel square. The book is compiled in such a way as to explain lines and angles in a simple and practical manner. answering questions from "what is a steel square" to "how to build a roof." A valuable book in any carpenter's handbook.