

DOCUMENT RESUME

ED 094 249

CE 001 798

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TITLE An Instruction Guide for Teachers of Health Assistants.  
INSTITUTION Pennsylvania State Dept. of Education, Harrisburg. Bureau of Vocational, Technical, and Continuing Education.  
PUB DATE 74  
NOTE 35p.  
EDRS PRICE MF-\$0.75 HC-\$1.85 PLUS POSTAGE  
DESCRIPTORS \*Curriculum Guides; Employment Qualifications; \*Health Occupations Education; Health Personnel; Job Skills; \*Paramedical Occupations; \*Teaching Guides; \*Vocational Education  
IDENTIFIERS \*Health Assistants

ABSTRACT

The publication provides information to local vocational education administrators who are establishing health assistant programs and serves as a guide to those who will be planning and teaching the course, which covers 480 hours within a 1- or 2-year period for students who have completed the 10th grade. The course prepares students for entry level employment or serves as a base for secondary or postsecondary health occupations specialization. Included are specific course objectives, suggested instructional practices, tips in course planning, a two-page curriculum plan and seven-page course outline, a list of skills to be taught, a sample lesson plan and procedure sheet, and lists of equipment, supplies, and recommended materials. (AJ)

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# An Instruction Guide for Teachers of Health Assistants

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1974

CE 001 798

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## FOREWORD

This publication provides information to local vocational education administrators in establishing health assistant programs and serves as a guide to those who will be planning and teaching the course. A revision of the 1969 publication, this handbook includes instruction for home care of the ill.

We would like to thank Glenna C. Wimer, Highlands Senior High School, Natrona Heights, for providing a teacher's viewpoint and Mary F. Myers, consultant, Health Occupations Education, for assisting in updating the material.

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TITLE: Health Assistant

DEFINITION OF OCCUPATIONAL TITLE

The health assistant is an entry worker in a variety of health occupations. He or she serves as an assistant in many areas, always working under the supervision of a professional. The assistant performs simple tasks assigned by the nurse or other health facility workers, assists physicians and/or dentists in their offices and performs simple laboratory procedures. He or she might assist in the care of ill or convalescent persons in the home or handle clerical duties in health care facilities.

PURPOSE

This course is intended for vocational education pupils who may be:

- seeking employment as entry workers.
- preparing for curriculums specializing in one of the health occupations at the secondary level.
- pursuing a health career on a postsecondary level.

This course is intended to give the pupil an opportunity to:

- acquire knowledge and develop the necessary skills and attitudes for competent performance as an entry level worker.
- learn about health careers available and choose one as an occupation.

INSTRUCTION TIME

The pupil shall have completed the 10th grade. The recommended course of instruction is 480 hours within a one or two year period.

TRAINEE QUALIFICATIONS

Mental Ability

Since health assistants are associated with many health occupations, persons of various abilities can benefit from some phase of this program.

Physical Ability

Because of close contact with people and exposure to illness, good health is a must. This does not necessarily exclude individuals with certain physical handicaps. Pupils must be able to meet the specific requirements of the cooperating agencies.

### Special Considerations

The health assistant should have integrity, a genuine interest in people and a sense of personal pride. He or she should demonstrate a level of maturity acceptable to cooperating agencies.

All personnel work closely with people and are considered to be teachers of health. Therefore, cleanliness and good grooming are essential.

## STATEMENT OF EDUCATIONAL PHILOSOPHY

### Basic Philosophy of Vocational Education

The chief purpose of vocational education is to prepare students for gainful employment. It serves society by developing an individual's health, social, civic, cultural and economic interests, enabling him or her to become a responsible member of the community.

### Basic Philosophy of Health Occupations Education

Health occupations is a phase of vocational education. It is available under several general curriculums which benefit high school students; graduates who seek specialized training; dropouts; unemployed and underemployed; people with cultural and economic handicaps; adults who want to upgrade their skills and technical knowledge; and those who must learn new skills to earn a living.

It provides:

- instruction and experience for the development of communication and basic manipulative skills, safety, judgement, technical knowledge and related information.
- extended or supplemental instruction for people already employed in the health field.

### Basic Philosophy of Health Assistant's Education

The health assistant course is designed for high school juniors or seniors. It introduces them to the health occupations and to the responsibilities involved. The course provides learning experiences which will develop skills, knowledge and attitudes needed to perform effectively at the assistant level.



## SPECIFIC COURSE OBJECTIVES

### Objectives

At the conclusion of this course the pupil should:

- . perform those skills associated with the occupations available to the health assistant.
- . demonstrate ethical attitudes.
- . show an awareness of the basic needs of individuals.
- . work cooperatively with others.
- . practice good habits of personal health and grooming.
- . be familiar with various health careers and be prepared to choose one.
- . demonstrate good work habits.

### Suggested Activities to Achieve Objectives

Activities used in achieving these objectives are:

1. Lectures (including guests)
2. Demonstrations, classroom discussions, role playing
3. Supervised practice and clinical experience
4. Use of procedure sheets
5. Use of textbooks, workbooks and reference materials (including charts, graphs, etc.)
6. Audio-visual aids (films, film strips, anatomical models, etc.)
7. Conferences, symposiums and seminars
8. Student reports
9. Supervised study
10. Problem-solving in hypothetical situations
11. Assignment of more advanced pupils to assist others need: help
12. Assignment of housekeeping duties (care of equipment and supplies)

## INSTRUCTIONAL PRACTICES

### Teaching Methods

In teaching the course you will want to consider using these techniques. Remember that you will be working with people of many different backgrounds, and so with a wide range of abilities. Flexibility is the key in applying the following:

- Lectures--you do the talking while students take notes and absorb ideas. This is especially useful when you're introducing new concepts or summarizing what's already been covered. Lengthy lectures can become tedious or boring, so they shouldn't be longer than 50 minutes. Opportunities for student participation should be provided at intervals.
- Group Discussions--a good way to get feedback and gauge the effectiveness of a lecture. They get students more involved in a back and forth flow of ideas, questions, contradictions, etc. While you may guide the discussion, its ultimate success depends on the students' own contributions--on getting them to think instead of just absorb.
- Skill Development--learning by doing. It's reality centered teaching in the classroom. You demonstrate specific procedures (washing a patient, collecting specimens, answering a patient's call) in a simulated clinical situation, then help students master them through repeated practice. As they develop these skills to a safe level of competency, they also learn to communicate with patients, team workers and co-workers in other areas of the health field.
- Supervised Clinical Practice--allows students to apply theory in real-life situations. To differentiate from the usual cooperative education, the school must understand that this is an extension of the school laboratory. By contractual agreement the school arranges for the students to practice--in a clinical setting--under the direct responsibility and supervision of the teacher employed by the school.
- Independent Study--students progress at their own rates. This encourages more diversity in their research and, at the same time, teaches them to function independently, without the direct supervision of a teacher.

### Class Size

Enrollment should not exceed 20 pupils. In clinical practice the desirable number is 15 per teacher.

## Facilities

These recommendations are for a single independent instructional unit. Facilities can be shared when other health occupations courses and facilities are provided in the total program. An area of 2,000 square feet is required for a complete class-laboratory. If a practical nursing suite is available, 1,800 square feet is sufficient.

Facilities should include:

- a theory-lecture area centrally located to permit observation of demonstrations in all other instruction areas. The area should include arm chairs or 30" x 60" library tables and chairs, or a combination of both to accommodate at least 20 pupils, teacher desk, chair, file cabinet, wardrobe, chalkboard and bulletin board.
- a hospital ward unit with two to four hospital beds--each with bedside table and chair--and counter work space with sink and storage. (In schools where practical nursing is taught, one bed unit for demonstration purposes is sufficient. The skills laboratory of a practical nursing suite is used for practice.)
- a typical patient unit as in a home.
- a dressing room adjoining the hospital ward unit.
- a secretarial area with two to four typewriter tables, chairs and typewriters.
- a dental operatory area with instrument cabinet, x-ray unit and functioning darkroom.
- a laboratory practice area with a chemical sink.
- a medical examination area with examining table.
- a storage room for visual aids, stretcher, wheelchair, linens and supplies.
- a reference/study area.

## TIPS IN COURSE PLANNING

1. Integrate the major divisions of the course for continuity of content, skills and theory.
2. Avoid placing too much stress on business office practice. (Typing is not taught.)
3. Include experience in a hospital, convalescent home, medical or dental office. It's required as part of the course. (Work with approved agencies and list assignments to avoid exploitation of pupils. Written agreements between the school and agencies are required. Problems of liability, malpractice, insurance and transportation are the responsibility of the local school district.)
4. Avoid using terminology which might imply peculiar teaching content in occupations regulated by law. (Nursing, dental hygiene, etc.)
5. Include lay advisory committees--they're required. Get in touch with related professional groups and associations and ask each to choose a representative. At least one member of the committee should be a recent graduate.
6. Make sure pupils who might continue in health careers have a year of chemistry. (Adjustments may be necessary to teach chemistry as part of the health assistant course.)
7. Consider using dentists, physicians, pathologists, dental hygienists, etc, to help in teaching. (Make sure their material isn't too technical.)
8. Consider the value of requiring pupils to wear a uniform or special protection such as a smock. Some sort of special dress with proper identification will be necessary for the clinical experience phase.
9. Obtain permission of the parent or guardian whenever a pupil's skin is punctured in procedure practice. This is required.
10. Make sure you know the difference between planned supervised experience--a required part of the course--and cooperative education which is optional.
11. Consider level of ability in planning clinical experience or when recommending placements.

12. Curriculum Plan  
Health Assistant

Hours		Major Division	Subject	Knowledge, Abilities, Understanding
Total	Subtotal			
40	5	Personal and Vocational Relationships	Orientation	Health assisting Physical facilities Course of study How to study
	15		Personal Hygiene	Grooming Personal cleanliness Mental, emotional and physical health Body mechanics
	5		Health Careers	History and trends Disciplines Career opportunities
	5		Ethics	Code of ethics Legal limitations Certification, registration, licensure
	5		Community Resources	Health and social organizations Available health facilities Interaction of community agencies
	5		Interpersonal Relationships	Self actualization Peer relationships Work relationships Community obligations Vocational youth organizations Communications

Curriculum Plan (Continued)

Hours		Major Division	Subject	Knowledge, Abilities, Understanding
Total	Subtotal			
80	20	Basic Biological and Physical Sciences	Body Structure and Function	Terminology Normal human body Body in disease
	20		Study of Microorganisms	Basic principles of microbiology Communicable diseases Community health
	20		Nutrition	Basic principles of nutrition Normal diet Modifications of diet
	20		Pharmacology	Drug classifications Use and misuse of drugs Legal aspects Dosage terminology
240		Skills for the Health Assistant	Basic Procedures for Bedside Care	Institutional Home
			Office Assisting Technicians	Medical Dental
			Medical Laboratory	Simple procedures
40		First Aid	First Aid	Principles of emergency care for the health assistant
80		Clinical Experience		Practice under the teacher's supervision in appropriate facilities



13. Course Outline  
Health Assistant

Major Division	Subject	Objectives	Suggested Content
Personal and Vocational Relationships	Orientation	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be familiar with course objectives, content and facilities.</li> <li>understand evaluation procedures.</li> <li>use good study habits.</li> </ul>	<p>General orientation to program and policies Physical layout of facilities</p> <p>Rules and regulations of school and classroom</p>
	Personal Hygiene	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>demonstrate good grooming and personal hygiene.</li> <li>be aware of hereditary and environmental factors affecting mental and physical health.</li> <li>apply principles of normal body alignment.</li> </ul>	<p>Grooming Care of skin, teeth, hair, nails</p> <p>Effect of heredity and environment on health Preservation of health</p> <p>Body mechanics Good posture</p>
	Health Careers	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be able to describe changes in the care of people and the trends in health care delivery systems.</li> <li>be aware of the opportunities in the health field.</li> </ul>	<p>History and trends Descriptions of various occupations</p> <p>Qualifications Career mobility</p>



Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
	Ethics	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>demonstrate standards of conduct established by the health professions.</li> <li>practice within the legal limits of the occupation.</li> <li>be aware of certification, registration and licensure and their effect upon employment.</li> </ul>	<p>Definition and discussion of ethics</p> <p>Legal limitations and liabilities</p> <p>Governmental agencies and national organizations responsible for certification and licensure</p>
	Community Re-sources	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be familiar with local agencies and know how to contact them.</li> <li>be familiar with the kinds of assistance provided by community agencies.</li> </ul>	<p>Government and health</p> <p>Local voluntary agencies</p> <p>Proprietary agencies</p> <p>Interagency referrals</p>
	Interpersonal Relationships	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>have an understanding of the basic needs of individuals and groups.</li> <li>demonstrate good work habits.</li> </ul>	<p>Human growth and development</p> <p>Effects of illness upon individual needs</p> <p>Human behavior</p>





Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
		<p>work cooperatively with others.</p> <p>participate in vocational youth activities.</p> <p>know how to apply for a job, prepare for and be interviewed and resign from a job.</p>	<p>Social awareness Communication skills Respect for individual rights and differences</p> <p>Civic responsibilities</p> <p>Letters of application and resignation Job interviews</p>
Basic Biological and Physical Sciences	Body Structure and Function	<p>The pupil will:</p> <p>know the structure and function of the human body.</p> <p>be able to relate normal body functions to abnormal conditions.</p> <p>be able to apply this knowledge on the job.</p> <p>understand and use proper terminology.</p>	<p>Structural units of the body and how they relate to each other</p> <p>Normal body functions</p> <p>Effect of disease upon normal function</p> <p>Common conditions of illness</p> <p>Terminology</p>
	Study of Micro-organisms	<p>The pupil will:</p> <p>understand the role of micro-organisms in daily living.</p>	<p>Basic principles of bacteriology</p> <p>Public sanitation</p>



Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
		<p>understand the role of pathogenic organisms.</p> <p>understand the role of the community in preventing disease.</p>	<p>Selected communicable diseases and their control                      Prevention and control of venereal diseases                      Various types of pediculi</p>
	Nutrition	<p>The pupil will:</p> <p>understand the importance of proper nutrition.</p> <p>know how to meet normal nutritional needs in illness.</p>	<p>Basic food groups                      Essential nutrients</p> <p>Nutritional deficiency diseases                      Diet modifications for various reasons</p>
	Pharmacology	<p>The pupil will:</p> <p>understand the action of drugs according to group classification.</p> <p>be aware of the various routes for administration of medications.</p> <p>know methods of measuring doses.</p>	<p>Broad classifications and usages of drugs</p> <p>Routes for administering medicines</p> <p>Forms in which medications are available                      Precautions in handling and storing</p>

Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
		<p>understand abbreviations and terminology associated with medications.</p> <p>be aware of governmental regulations and control.</p>	<p>Prescriptions and following orders</p> <p>Drug laws</p> <p>Measuring medications</p> <p>Administration of medicines in the home</p> <p>Administration of medicines in medical and dental offices</p> <p>Drug problems</p>
<p>Skills for the Health Assistant</p>	<p>Basic Procedures for Bedside Care</p>	<p>The pupil will:</p> <p>perform selected tasks to assist the nursing staff in patient care.</p> <p>perform selected tasks to facilitate home nursing care.</p>	<p>Tasks not requiring the knowledge and judgement of the nurse:</p> <ul style="list-style-type: none"> <li>housekeeping skills</li> <li>personal care</li> <li>care of equipment and supplies</li> <li>observing, recording and reporting</li> <li>transporting a patient</li> <li>vital signs</li> <li>comfort and safety measures</li> <li>assisting with special tests</li> <li>intake and output</li> </ul> <p>Adapting to the home situation</p> <p>Adapting to different age groups</p>

Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
	Office Assisting Technics	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be able to carry out limited responsibilities while assisting the dentist or physician in the office.</li> <li>understand the role of the assistant in management of the office.</li> </ul>	<ul style="list-style-type: none"> <li>Medical office skills</li> <li>Dental office skills</li> <li>Office management skills</li> </ul>
	Medical Laboratory	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be able to perform simple laboratory technics used in physicians' offices and medical laboratories.</li> <li>be able to care for selected equipment used in laboratory procedures.</li> </ul>	<ul style="list-style-type: none"> <li>Collecting and examining specimens</li> <li>Recording and reporting results</li> <li>Care of specimens</li> <li>Care of equipment</li> </ul>
First Aid	First Aid	<p>The pupil will:</p> <ul style="list-style-type: none"> <li>practice safety precautions.</li> <li>recognize emergency situations and function accordingly.</li> </ul>	<ul style="list-style-type: none"> <li>Causes and prevention of common accidents</li> <li>Common emergencies</li> <li>Emergency care</li> <li>Legal limitations</li> <li>Calling for assistance</li> <li>Handling accident victims</li> </ul>



Course Outline (Continued)

Major Division	Subject	Objectives	Suggested Content
Clinical Experience		<p>The pupil will:</p> <ul style="list-style-type: none"> <li>be able to apply theory to actual situations.</li> </ul>	<ul style="list-style-type: none"> <li>Experience in:               <ul style="list-style-type: none"> <li>hospitals</li> <li>nursing homes</li> <li>clinics</li> <li>medical and dental offices</li> </ul> </li> </ul>

SUGGESTED SKILLS TO BE TAUGHT

Basic Procedures for Bedside Care:

Admitting a patient  
Answering the patient's call  
Applying binders  
Applying clean moist compresses  
Assisting the patient into a wheelchair  
Assisting the patient to dangle the legs  
Assisting with care of the deceased  
Assisting with messenger service  
Assisting with physical therapy  
Assisting with recreational activities  
Bathing the patient  
Bowel and bladder training  
Caring for the drainage of the patient  
Caring for flowers  
Caring for the incontinent patient  
Caring for the patient's dentures  
Caring for the patient's hair including shampoos  
Caring for rubber goods  
Charting  
Cleaning a unit (concurrent and terminal)  
Cleaning and caring for instruments and equipment  
Cleaning and filling water pitchers  
Collecting specimens  
Developing skills in communications  
Discharging the patient  
Filling and applying hot water bottles and ice caps  
Getting a patient out of bed  
Giving a cleansing enema  
Giving and removing a bedpan and urinal  
Giving back care  
Giving morning, afternoon and evening care  
Giving the patient oral hygiene  
Handling of certain sterile supplies  
Hand washing techniques  
Home ostomy care  
Making a bed  
Measuring and recording height and weight  
Measuring and recording intake and output  
Moving a patient to a stretcher  
Moving and turning a patient in bed  
Observing the patient and reporting to the proper authority  
Preparing the patient for examinations  
Retention catheter care  
Serving meals and feeding patients  
Shaving a male  
Sterile technic  
Taking a blood pressure  
Taking and recording temperature, pulse and respiration  
Using body supports and restraints

## Suggested Skills to be Taught (Continued)

### Office Management Skills:

- Answering the telephone
- Filing necessary records
- Handling insurance claims
- Handling mail
- Keeping doctor's accounts
- Keeping records
  - 1. patient histories
  - 2. inventories
- Making appointments
- Office housekeeping
- Ordering supplies
- Receiving the patient
- Typing office correspondence

In teaching these consider the previous business skills of the student.

### Medical Office Skills:

- Assisting with physical examination
- Assisting with special examinations
- Assisting with venipuncture
- Autoclaving equipment, instruments and supplies
- Boiling equipment, instruments and supplies
- Cleaning and care of equipment, instruments and supplies
- Chemical sterilization
- Examining the patient's blood for cholesterol, hemoglobin, sugar, etc.
- Examining the patient's urine for albumin, blood, specific gravity
- Obtaining a capillary blood sample
- Taking and recording blood pressure
- Taking and recording temperature, pulse and respiration

### Dental Office Skills:

- Applying fluorides
- Care and cleaning of the dental unit
- Care of dental instruments
- Charting the teeth
- Developing the dental x-ray
- Identification of dental instruments
- Mounting, labeling and filing dental x-rays
- Passing and receiving instruments
- Preparing basic set-up
- Preparing restorative materials
- Preparing the dental chair and seating the patient
- Proper use of dental chair
- Removing intraoral film and film packet and placing on film hanger
- Use of the autoclave
- Use of the sterilizer (boiling)
- Use of chemicals for sterilization

## Suggested Skills to be Taught (Continued)

### Medical Laboratory Skills:

Culturing a throat

Examining blood for:

1. hemoglobin
2. sugar
3. cholesterol
4. blood urea nitrogen
5. uric acid
6. hematocrit
7. white blood cells

Examining stool for occult blood

Examining urine for:

1. albumin
2. blood
3. sugar
4. acetone
5. specific gravity

Growing organisms on agar

Viewing organisms under microscope

### Emergency Care Skills:

Applying direct pressure

Applying pressure for hemorrhage

Bandaging

Care of burns

Care of the unconscious

Care of person in shock

Giving artificial respiration

Splinting

Transporting the person.

Use of litter

Some skills are identified in more than one unit of instruction. Repetition can be avoided by referring and supplementing where necessary.



Lesson Plan (Sample)

Major Division: Basic Biological and Physical Sciences  
 Subject: Body Structure and Function  
 Lesson: The Heart

Time	Objectives	Content	Activities	Evaluation
1 hour	<p>The student will:</p> <ul style="list-style-type: none"> <li>know the structure and the function of the heart.</li> <li>be able to compare the normal and abnormal heart.</li> <li>be aware of measures used to prevent heart disease.</li> <li>be able to use medical terminology related to the heart.</li> </ul>	<p>Introduction:</p> <ol style="list-style-type: none"> <li>1. In order for blood to circulate throughout the body, a propelling mechanism is essential.</li> <li>2. The heart is a pump. Its muscular layer, through contractions at intervals, forces blood through the blood vessels.</li> <li>3. The vital functions of the heart and the increasing incidence of heart disease are important to everyone.</li> <li>4. Today we'll study the heart and some of its common diseases.</li> </ol> <p>Body:</p> <ol style="list-style-type: none"> <li>1. Structure of the heart                             <ol style="list-style-type: none"> <li>a. Composed of three layers: endocardium, myocardium, pericardium</li> <li>b. Two sides separated by: a septum creating two pumps</li> </ol> </li> </ol>	<p>Discuss reference:</p> <p>Memmler, Ruth                      Lundeen and Ruth Rada. <u>The Human Body in Health and Disease.</u>                      Philadelphia: J. B. Lippincott Co., 1970, Chapter 12.</p> <p>Show and examine:                      heart diagrams or charts.                      heart model or torso.</p>	<p>In a written test, the student will be able to:</p> <ul style="list-style-type: none"> <li>identify gross anatomy of the heart.</li> <li>describe the basic physiology of the heart.</li> <li>list and describe briefly several disorders of the heart.</li> <li>select measures useful in the diagnosis and prevention of heart diseases.</li> </ul>



Lesson Plan (Continued)

Time	Objectives	Content	Activities	Evaluation
		<ul style="list-style-type: none"> <li>c. Four chambers: left atrium, left ventricle, right atrium, right ventricle</li> <li>d. Four valves: tricuspid, pulmonary, mitral, aortic</li> </ul> <p>2. Physiology of heart</p> <ul style="list-style-type: none"> <li>a. Complete cycle: contraction (systole) and rest (diastole)</li> <li>b. Heart beat: controlled by nerves</li> <li>c. Heart sounds and murmurs</li> </ul> <p>3. Heart disorders</p> <ul style="list-style-type: none"> <li>a. According to layer of heart walls: endocarditis, myocarditis, pericarditis</li> <li>b. Congenital</li> <li>c. Rheumatic fever and its effect upon the heart</li> <li>d. Coronary</li> <li>e. Degenerative</li> </ul>		



## PROCEDURE SHEET (Sample)

Major Division: Skills for the Health Assistant

Subject: Medical Laboratory

Procedure: Collection of a capillary blood sample

Objective: The student should be able to perform a finger puncture for the sample

### Equipment Needed:

- . Sterile lancet
- . 70% alcohol
- . Sterile dry cotton balls
- . Micropipets
- . Tubes containing appropriate diluent
- . Appropriate glass slides and covers
- . Wax or lead pencil for identifying samples collected

### Procedure:

- | <u>Steps</u>  | <u>Things to Remember</u>   |
|---|---|
| 1. Assemble equipment.  | 1. Place the articles on a tray if they are to be carried to the patient.   |
| 2. Explain the procedure to the patient.  |   |
| 3. Select the patient's finger.   | 2. Finger should be warm. Do not use ring finger if rings are tight; avoid use of thumb and forefinger if they are heavily calloused. |
| 4. Clean the finger with alcohol sponge and let dry.  | 3. Avoid contaminating the area by blowing on it or touching it.  |
| 5. Grasp the finger at the middle joint by using the thumb and forefinger.                        | 4. Hold lancet at a right angle to striations of the patient's finger.  |
| 6. Hold the lancet firmly. Puncture should be made with a deep stroke (3 to 4 mm. in depth).      |   |
| 7. Wipe first drop of blood away with a dry cotton ball.  |   |
| 8. Use gentle pressure to form a round drop of blood.   | 5. If the finger is squeezed too tightly the blood will be diluted with tissue fluid.   |
| 9. Use a micropipet to aspirate blood and expel it into tubes containing the appropriate diluent. | 6. Use a fresh drop of blood for each test.   |

Procedure Sheet (Continued)

10. For microscopic studies collect a drop of blood on each of the required slides.

11. Wipe finger dry.

12. Place specimens in proper place.

After Care of Equipment:

1. Discard disposable items.

2. Clean remaining equipment and return to proper place.

7. Specimens from adults are collected in the following order:

- a. Hemoglobin
- b. W.B.C.
- c. R.B.C.
- d. Differential count

8. In infants the site of collection is the heel or toe. Specimens are collected in reverse order from that listed (in #7) above.

9. Label specimens legibly and accurately.

1. Be sure that lancet is sheathed before discarding.

## EQUIPMENT AND SUPPLIES

### Major Equipment

Use the following list as a guide for equipment needed in this course.

#### Dental Area:

- Conventional handpiece
- Dental chair unit and light
- Processing tank for darkroom
- X-ray unit with long cone and lead screen

#### Home Unit Area:

- Chair
- Double bed
- Dresser
- Stand

#### Medical Examination Area:

- Autoclave
- Centrifuge
- Demonstration table
- Examination table and doctor's stool
- Instrument and treatment cabinet
- Instrument boiler
- Mayo stand
- Mobile screens
- Ophthalmoscope and otoscope combination
- Proctoscope
- Refrigerator (counter or counter top type)

#### Medical Laboratory Area:

- Incubator
- Microscope

#### Office Management Area:

- File cabinets
- Typewriters and tables

#### Patient Unit Area:

- Bedside stand
- Gatch bed (hi - low)
- Home bed unit
- Intravenous pole
- Manikin
- Overbed table
- Straight chair
- Stretcher
- Wheelchair

### Supplies for Patient Care Unit

Bath basins	Hot water bottle
Bath blankets	Ice cap
Bath towels	Ice collar
Bed pads	Incontinent pads (disposable)
Bed pan	Lubricating jelly
Bed spreads	Medicine cups
Binders	Pillows
Bucket	Pillow cases
Call bell	Pitchers
Carafe set	Rectal tubes
Catheters	Sheets
Denture cup	Specimen cups
Drainage bags	Sphygmomanometer
Drainage tubes	Step stool
Draw sheets	Stethoscopes
Emesis basin	Tes-tape
Enema equipment	Thermal blankets
Feeding trays and accessories	Thermometers
Flexi-straws	bath
Graduate pitchers	oral
Hand towels	rectal
Hamper and hamper bag	Wash cloths
Hot plate	Urinal

### Office Management Supplies

Appointment book	Medical office practice set
Appointment cards	Patient case histories
Carbon paper	Pencils
Emergency phone listings	Pens
Envelopes	Rubber bands
Erasers	Ruler
File cards	Sample case histories
File folders	Sample inventory forms
Index cards	Scotch tape
Insurance forms (medicare, etc.)	Statement forms
Labels	Stapler and staples
Ledger sheets	Typewriter ribbon

### Medical Laboratory Supplies

Agar plates	Petri dishes
Cover glasses	R.B.C. diluting fluid
Counting chamber	Sensitivity discs
Culture media	Staining rack and solutions
Glass slides	Test tube rack and test tubes
Immersion oil	W.B.C. pipettes
Lens paper	Wire loop
Litmus paper	Wright's stain

## Dental Office Supplies

Alcohol  
Amalgamator  
Amalgam carrier  
Amalgam plugger  
Amalgams  
Apron x-ray protector  
Articulator  
Autoclave  
Basins (assorted sizes)  
Bracket table covers  
Cartridge syringe  
Chip syringe  
Coarse pumice  
Cotton pliers  
Cotton roll holders  
Cotton rolls  
Cutting instruments  
    burs  
    chisels  
    disks  
    excavators  
    gingival margin trimmer  
    lancet or scalpel  
    scalers  
Dappen dishes  
Dental cement  
Dental floss or tape  
Dental napkins  
Dental sponges  
Explorers  
Film hangers  
Film holder  
Glass mixing slab  
Headrest covers (dental chair)  
Indelible pencil  
Instrument sharpener  
Instrument transfer forcep  
Interval timer  
Measuring device  
Mercury  
Mercury dispenser

Mortar and pestle  
Mouth mirrors  
Mouth model  
Neck chain  
Needles  
    hypodermic  
    regular bevel  
Noncutting instruments  
    carvers  
    burnishers  
    plastic instruments  
Paper cups  
Paper mixing pad  
Pellet dispenser  
Plastic mixing bowl  
Polishing instruments  
Radiation film badges  
Retractors  
Rubber dam equipment  
    clamp  
    forceps  
    punch  
Saliva ejector tip (disposable)  
Spatulas  
    cement  
    wax  
Sterilizer  
    instrument boiling  
    instrument cold  
Sterilizing solutions  
Syringe holder  
Syringes  
    anesthetic  
    irrigation  
Tank thermometer  
Tooth brush  
Tooth model  
Topical applicators  
X-ray developer  
X-ray film  
X-ray mounts

## Medical Office Supplies

Abdominal pads	Kleenex
Acetic acid	Medicine cups
Airway	Medicine droppers
Alcohol	Patient drapes (disposable)
Ames lab stix	Patient gowns (disposable)
Ammonia inhalants	Percussion hammer
Anatomical charts	Pick-up forceps with container
Assorted adhesive tape	Pipette shaker
Assorted gauze bandages	Reagents
Autoclave tape	Rubber gloves
Band-aids	Scales
Capillary tubes	Slings
Centrifuge	Specimen cups
Chlorophenyl with anti-rust	Speculums
Cold sterilizer	anal
Cotton applicators	nasal
Cotton balls	vaginal
Critoseal	Splints
Disposable syringes	Step-on cans with liners
Distilled water	Sterile gauze squares
Elastic bandages	Sterile lancets
Examining light (goose neck)	Surgical masks
Eye cup	Tape measure
Flash light	Tourniquet
Flash light batteries	Tincture of merthiolate
Foot stool	Tongue blades
Glove powder	Treatment trays
Glove wrappers	Unimeter
Hand brushes	Zephiran
Instrument wrappers	
Instruments	
bandage scissors	
clip remover	
curved hemostat	
probe	
thumb forceps	
straight hemostat	
surgical scissors	
suture scissors	



EDUCATIONAL MATERIALS

Educational materials such as reference books, visual aids, pamphlets and program standards are available from the following agencies and publishing companies:

American Dental Association  
Bureau of Audio-Visual Service  
211 E. Chicago Ave.  
Chicago, Ill. 60611

American Medical Association  
535 N. Dearborn St.  
Chicago, Ill. 60610

ANA-NLN Film Service  
10 Columbus Circle  
New York, N. Y. 10019

Appleton-Century-Crofts  
440 Park Ave., S.  
New York, N. Y. 10016

Associated Press  
50 Rockefeller Plaza  
New York, N. Y. 10020

Beacon Press  
25 Beacon St.  
Boston, Mass. 02108

Charles A. Bennett Company, Inc.  
809 W. Detweiller Drive  
Peoria, Ill. 61614

Robert J. Brady Company  
130 Q St., N.E.  
Washington, D. C. 20002

Canfield Press  
Harper and Row  
Scranton, Pa. 18512

Thomas Y. Crowell Company  
201 Park Ave., S.  
New York, N. Y. 10003

F. A. Davis Company  
1915 Arch St.  
Philadelphia, Pa. 19103

Delmar Publishing  
P.O. Box 5087, Mountainview Ave.  
Albany, N. Y. 12205

Department of Public Welfare  
Office of Mental Health  
Harrisburg, Pa. 17120  
Attention: Educational Material  
Specialist

Dickenson Publishing Company, Inc.  
Ralston Park  
Belmont, Calif. 94002

Doubleday and Company, Inc.  
501 Franklin Ave.  
Garden City, N. Y. 11530

Film Library, Media Section  
Division of Public Health Education  
Department of Health  
P.O. Box 90  
Harrisburg, Pa. 17120

Halls of Ivy Press  
13050 Raymer St.  
North Hollywood, Calif. 91605

Harcourt, Brace and Jovanovich, Inc.  
757 Third Ave.  
New York, N. Y. 10022

Harper and Row Publishers, Inc.  
10 E. 53rd St.  
New York, N. Y. 10022

Health and Welfare Division  
Metropolitan Life Insurance Company  
One Madison Ave.  
New York, N. Y. 13402

Alfred A. Knopf, Inc.  
Order Department, 457 Hahn Road  
Westminster, Md. 21157

Lea and Febiger  
600 S. Washington Sq.  
Philadelphia, Pa. 19106

J. B. Lippincott Company  
East Washington Sq.  
Philadelphia, Pa. 19105

Educational Materials (Continued)

Little, Brown and Company  
34 Beacon St.  
Boston, Mass. 02106

Local Resources:

American Cancer Society  
American Heart Association  
American Red Cross  
Bell Telephone Company  
Intermediate Unit Instructional  
Materials Service  
March of Dimes  
Muscular Dystrophy Association  
Tuberculosis and Health Society

MacMillan Publishing Company, Inc.  
Riverside, N. J. 08075

McGraw-Hill Book Company  
1221 Avenue of the Americas  
New York, N. Y. 10017

David McKay Company, Inc.  
750 Third Ave.  
New York, N. Y. 10017

Methodist Publishing House  
201 8th Ave., S.  
Nashville, Tenn. 37203

Modern Talking Picture Service, Inc.  
1234 Spruce St.  
Philadelphia, Pa. 19107

C. V. Mosby Company  
11830 Westline Industrial Drive  
St. Louis, Mo. 63141

Peace Corps  
Office of Public Affairs  
#337 Matomic Building  
Washington, D. C. 20502

Pennsylvania Association for  
the Blind  
2843 N. Front St.  
Harrisburg, Pa. 17110

Prentice Hall, Inc.  
Englewood Cliffs, N. J. 07632

Rand McNally and Company  
Customer Service Department, Box 7600  
Chicago, Ill. 60680

Random House, Inc.  
Order Department, 457 Hahn Road  
Westminster, Md. 21157

The H. M. Rowe Company  
624 N. Gilmore St.  
Baltimore, Md. 21217

Richards Rosen Press, Inc.  
29 E. 21st St.  
New York, N. Y. 10010

W. B. Saunders Company  
218 W. Washington Sq.  
Philadelphia, Pa. 19105

Simon and Schuster, Inc.  
630 5th Ave.  
New York, N. Y. 10020

Smith, Kline and French Laboratories  
1500 Spring Garden St.  
Philadelphia, Pa. 19101

South-Western Publishing Company  
5101 Madison Road  
Cincinnati, Ohio 45227

Springer Publishing Company, Inc.  
200 Park Ave., S.  
New York, N. Y. 10003

Superintendent of Documents  
U. S. Government Printing Office  
Washington, D. C. 20402

The Free Press  
MacMillan Publishing Company, Inc.  
Riverside, N. J. 08075

Charles C. Thomas Publishers  
301 E. Lawrence Ave.  
Springfield, Ill. 62703

Educational Materials (Continued)

U. S. Department of Health,  
Education and Welfare  
Public Health Service  
Audio-Visual Facility  
Chamblee, Ga. 30005

University of Chicago Press  
11030 S. Langley Ave.  
Chicago, Ill. 60628

University Press of Kentucky  
Lexington, Ky. 40506

Viking Press, Inc.  
625 Madison Ave.  
New York, N. Y. 10022

Vintage Books  
201 E. 50th St.  
New York, N. Y. 10022

Wadsworth Publishing Company, Inc.  
Belmont, Calif. 94002