

# CLINICAL PERFORMANCE OBJECTIVES

## CLINICAL COMPETENCY

### CLINICAL PERFORMANCE CRITERIA

1. Evaluation of Requisition: Student was able to:
  - a. Identify procedures to be performed
  - b. Recall the patient's age, name, and history
  - c. Identify mode of transportation to the clinical area
  - d. Pronounce the patient's name (within reasonable limits)
  - e. Identify any self or patient precautions
2. Physical Facilities Readiness: Student was able to:
  - a. Provide clean table
  - b. Exhibit orderly cabinets and storage space
  - c. Have appropriate size image receptor
  - d. Have emesis basins and drugs ready
  - e. Locate syringes and needles as necessary
  - f. Turn machine "on" and be prepared for exposures
  - g. Turn tube in position necessary for the exam
  - h. Find and resupply linens if appropriate
3. Patient and Student Relationship: Student was able to:
  - a. Select the correct patient
  - b. Assist patient to radiographic room
  - c. Assist patient to radiographic table
  - d. Keep patient clothed and/or draped for modesty
  - e. Talk with patient in a concerned, professional manner
  - f. Give proper instructions for moving and breathing
  - g. Have patient gowned properly
  - h. Follow proper isolation procedure when appropriate
4. Positioning Skills: Student was able to:
  - a. Position the patient correctly on table (head at the appropriate end, prone or supine)
  - b. Align part to be demonstrated to the center of image receptor
  - c. Center CR to the center of IR
  - d. Oblique patient correctly if required
  - e. Angle the CR to center of IR
  - f. Remove unwanted anatomical parts from the radiographic area
5. Equipment Manipulation: Student was able to:
  - a. Turn tube from horizontal to vertical (and vice versa)
  - b. Move the Bucky tray/detector and utilize locks
  - c. Identify and utilize tube locks
  - d. Insert and remove image receptor from Bucky tray
  - e. Select factors at control panel
  - f. Use a technique chart
  - g. Measure the patient
  - h. Identify the film with "R", "L", and other appropriate markers
  - i. Fill syringes using aseptic technique
  - j. Direct mobile unit
  - k. Operate controls for mobile unit
  - l. Select proper image receptor size

- m. Adapt for technique changes in SID, grid ratio, collimation, etc.
- 6. Radiation Protection: Student was able to:
  - a. Cone or collimate to part
  - b. Use gonad shields, if appropriate
  - c. Demonstrate utilization of lead apron and gloves, if appropriate
  - d. Produce the film badge as required by the institution
  - e. Select proper exposure factors
  - f. Adjust exposure technique for motion, when appropriate

#### IMAGE EVALUATION CRITERIA

- 7. Anatomical Part(s):
  - a. Part is shown in proper perspective
  - b. No motion is present
- 8. Proper Alignment:
  - a. Image receptor centered
  - b. Part centered
  - c. Tube centered correctly
  - d. Patient oblique or rotated correctly
- 9. Radiographic Technique:
  - a. Chart was used correctly (proper contrast and density)
  - b. Compensation of factors for pathology
  - c. Correct exposure used to produce image
- 10. Film Identification and Markers:
  - a. "R", "L", in correct location
  - b. Minute or hour markers visible
  - c. Patient information and date can be identified

#### CLINICAL ORIENTATION

- 1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising personnel.
- 2. The student will follow the dress code of the department and practice good personal hygiene.
- 3. The student will identify by name the location and basic function of all radiographic rooms and related radiology areas.
- 4. The student will identify the location of linen, urinals, bedpans, emesis basins, aprons, gloves, shields, oxygen, suction, technique charts, and other related supplies.
- 5. The student will identify all parts of a requisition and perform the necessary paperwork associated with a radiographic examination.
- 6. The student will manipulate the x-ray equipment to include:
  - a. Turn x-ray machine on and off
  - b. Manipulate the x-ray tube and table
  - c. Center and lock the tube to table and upright Bucky
  - d. Load, move, lock and unload image receptor into Bucky tray
  - e. Set basic controls and make exposure
- 7. The student will identify all image receptor sizes.
- 8. The student will properly place identifying markers on image receptor.
- 9. The student will locate and properly identify patients for radiographic examinations and demonstrate proper methods of assisting patients on and off the x-ray table.

10. The student will practice radiation safety for the patient and personnel.
11. The student will learn appropriate ways of communicating with the patient and explaining the radiographic procedures.
12. The student will observe and assist with each radiographic procedure assigned to the room under the supervision of a registered radiologic technologist.
13. The student will not discuss or reveal any patient information except to authorized personnel.
14. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
15. The student will observe and perform in outside rotations as assigned by the supervising technologist.

**\*The first full week is dedicated to Student Classroom Orientation.** Topics discussed include, but are not limited to: proper patient communication, ethics, basic radiation protection & safety and aspects of professionalism. These areas are thoroughly discussed before students come in contact with patients or are exposed to patient care in any department. Students are also required to pass a written examination and participate in role play.

**\*The second full week is dedicated to Student Clinical Orientation.** Topics discussed and hands-on experience include, but are not limited to: patient transport, aseptic technique, following directions, verbal/non-verbal communication, patient identification, requisition, DR, CR, radiation protection, extensions/door codes/overhead codes, digital room, fluoroscopic room, specials room, C-arm, portable, monthly check list, and orientation evaluation.

### **COMPUTERIZED TOMOGRAPHY**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will observe and assist with all CT procedures performed during their clinical rotation.
4. The student will master the following CT procedures and perform a competency.
  - a. Head CT
  - b. Abdomen CT
  - c. Chest CT
5. The student will be able to bring the system up and down in an orderly fashion.
6. The student will assist the technologist to position and care for the patient during the scan procedure.
7. The student will be able to operate the operator's display console to include:
  - a. Initiating scans
  - b. Perform scout scans
  - c. Prescribing and performing axial slices
  - d. Terminating and sending to PACS

8. The student will be able to operate the systems display console to include:
  - a. Displaying patient scans
  - b. Making hard copies of patient scans
  - c. Setting the window and level controls
  - d. Identifying anatomy and pathologies
9. The student will assist the technologist in IV injections and the administration of oral contrast medias, determining the proper dosage and obtaining relevant allergy histories.
10. The student will practice radiation protection for the patient and personnel.
11. The student will assist the technologist in maintaining the necessary supplies and the cleanliness.
12. The student will not discuss or reveal any patient information except to authorized personnel.
13. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
14. The student will observe and perform in outside rotations as assigned by the supervising technologist.

### **EVENING/WEEKEND**

1. The student will report to the assigned area on time prepared for his/her duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the radiographic department in a clean state of readiness including:
  - a. Clean radiographic tables and rooms
  - b. Clean counters and work areas
  - c. Clean aprons and gloves properly stored
  - d. Wheelchairs and stretchers cleaned and neatly stored
  - e. Dressing rooms cleared of daily linen
4. The student will maintain the radiographic equipment as follows:
  - a. Shut down rooms not in use (including circuit breakers)
  - b. Shut off lights not needed
  - c. Set machines at the lowest settings when in standby
  - d. Indication of the location of the portables at the QC area
5. The student will assist the registered technologist in performing office procedures as follows:
  - a. Locate patient's medical record & visit numbers in Meditech system
  - b. Take completed requisitions to a taken and put under to be read
  - c. Schedule exams
  - d. Type schedule of radiographic exams for the following day
  - e. Perform functions of VRad system
6. The student will work on a 1:1 basis with the technologist in performance of emergency, surgical and portable radiographic procedures.
7. The student will independently perform radiographic exams in areas of successful clinical competency under indirect supervision of the registered technologist.
8. The student will gain extremity experience on evening and weekend hours when normal clinic hours at other facilities are not an option for patients.

9. The student will observe, assist and then demonstrate correct positioning skills for radiographic exams completed in the didactic sessions requested on inpatients, outpatients, and/or emergency department patients to include:

<b>Procedure</b>	<b>Estimated Date of Discussion</b>
a. Chest/abdomen	Start of program - Sept. 30
b. Upper/lower extremities	October 1 - November 30
c. Head/spine	January 1 - March 15
d. Contrast procedures	Start of program: introduction March 16 - June 15
e. Portables	Start of program - throughout
f. Emergency procedures	Start of program - throughout
g. Surgical procedures	Start of program - throughout
h. Trauma procedures	Start of program - throughout

10. The student will choose alternate methods of moving and positioning emergency room and trauma patients for radiographs.
11. The student will demonstrate the proper methods of patient immobilization when obtaining radiographs of emergency room patients who are unconscious or otherwise unable to cooperate due to alcohol, drugs, violence, etc.
12. The student will demonstrate proficiency in working under pressure when the time factor is of extreme essence and adapt to emergency situations in an organized manner.
13. The student will evaluate completed radiographs for:
- Anatomy demonstrated
  - Radiographic technique
  - Film identification
  - Proper positioning and centering
  - Evidence of radiation protection
14. The student will practice radiation safety for the patient and personnel.
15. The student will not discuss or reveal any patient information except to authorized personnel.
16. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
17. The student will observe and perform in outside rotations as assigned by the supervising technologist.
18. The student will become marketable and meet the expectations of rural health organizations of this region by having experience and knowledge of evening and weekend rotations.
19. The student will become employable by meeting the expectations of employers of rural health organizations.

## **FLUOROSCOPY**

- The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
- The student will follow the dress code of the department and practice good personal hygiene.
- The student will maintain the radiographic room in a clean state of readiness including, but not limited to:
  - Clean, alcoholed linen table

- b. Clean, dust-free equipment
  - c. Needles, syringes, alcohol preps, gauze and band aids
  - d. Emesis basins
  - e. Contrast media
  - f. Barium cups & straws
  - g. Enema bags, tips, K-Y jelly
  - h. Kleenex tissues
  - i. IV poles
  - j. Gloves
4. The student will be able to operate and manipulate the equipment effectively to include:
    - a. Manipulating the equipment in all directions
    - b. Preparing the equipment for fluoroscopy
    - c. Preparing the equipment for radiography
    - d. Raising and lowering the table
    - e. Installing and positioning all lead shields
    - f. Centering the x-ray tube to the table or chest stand
    - g. Setting exposure factors on the control panel
    - h. Setting the control panel for fluoroscopy and radiography
  5. The student will communicate in a manner appropriate for age, emotional and physical condition of the patient and explain the radiographic procedure to the patient.
  6. The student will perform and/or assist with each radiographic procedure assigned to the fluoroscopy room under the supervision of a registered technologist.
  7. The student will independently perform radiographic exams in areas of successful clinical competency under indirect supervision of a registered technologist.
  8. The student will prepare and administer barium to the patient.
  9. The student will properly insert enema tips.
  10. The student will introduce the patient to the radiologist.
  11. The student will demonstrate correct positioning skills for
    - a. IVP
    - b. BE Air/Reg
    - c. SBFT
    - d. UGI Air/Reg
    - e. Esophogram
    - f. Radiography procedures
  12. The student will evaluate completed radiographs for:
    - a. Anatomy demonstrated
    - b. Radiographic techniques
    - c. Film identification
    - d. Proper positioning and centering
    - e. Evidence of radiation protection
  13. The student will practice radiation safety for the patient and personnel.
  14. The student will not discuss or reveal any patient information except to authorized personnel.
  15. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
  16. The student will observe and perform in outside rotation as assigned by the supervising technologist.

**GENERAL ROOM**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the radiographic room in a clean state of readiness, including, but not limited to:
  - a. Cleaned and alcoholed radiographic table
  - b. Clean, dust-free equipment
  - c. Positioning aids available in a neat, orderly location
  - d. Aprons and gloves clean and properly stored
4. The student will keep the radiographic room well stocked with the following supplies:
  - a. Linen
  - b. Tape and markers
  - c. Needles, syringes, alcohol, gauze, band aids
  - d. Emesis basins
  - e. Contrast media
  - f. Kleenex tissues
5. The student will maintain the outpatient dressing rooms with clean hospital gowns and robes and discard used linens.
6. The student will be able to operate and manipulate the equipment effectively to include:
  - a. Manipulating the equipment in all directions
  - b. Moving the x-ray tube to 44" and 72" SID
  - c. Centering the x-ray tube
  - d. Setting up the pig-o-stat for pediatric radiography
  - e. Setting exposure factors on the control panel
  - f. Inserting and removing the proper sized image receptor and grid in the upright chest stand
  - g. Changing cones to accommodate the appropriate image receptor size
7. The student will communicate in a manner appropriate for the age, emotional, and physical condition of the patient explaining the radiographic exam.
8. The student will perform and/or assist with each radiographic procedure assigned to the radiographic room under the supervision of a registered technologist.
9. The student will independently perform radiographic exams in areas of successful clinical competency under indirect supervision of a registered technologist.
10. The student will demonstrate correct positioning skills for radiographic examinations completed in the didactic sessions to include:
  - a. Chest
  - b. Abdomen
  - c. Upper Extremities
  - d. Lower Extremities
  - e. Spine
  - f. Skull
  - g. Sinuses
  - h. Facial Bones
11. The student will practice radiation safety for the patient and personnel.
12. The student will evaluate completed radiographs for:
  - a. Anatomy demonstrated
  - b. Radiographic technique
  - c. Film identification
  - d. Proper positioning and centering

- e. Evidence of radiation protection
- 13. The student will not discuss or reveal any patient information except to authorized personnel.
- 14. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
- 15. The student will observe and perform in outside rotation as assigned by the supervising technologist.

### **MAGNETIC RESONANCE IMAGING**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will observe and assist with all MRI procedures performed during their clinical rotation.
4. The student will be able to bring the system up and down in an orderly fashion.
5. The student will assist the technologist to position and care for the patient during the procedure.
6. The student will be able to operate the operator's display console to include:
  - a. Initiating scans
  - b. Perform scout scans
  - c. Prescribing and performing axial slices
  - d. Terminating and sending to PACS
7. The student will be able to operate the systems display console to include:
  - a. Displaying patient scans
  - b. Making hard copies of patient scans
  - c. Setting the window and level controls
  - d. Identifying anatomy and pathologies
8. The student will assist the technologist in IV injections, determining the proper dosage and obtaining relevant allergy histories.
9. The student will practice safety for the patient and personnel. The area where the MR scanner is housed is divided into four safety zones.
  - a. Zone 1: All areas accessible to the general public including the corridors outside the MRI Suite, patient consult rooms, dressing rooms and radiology waiting rooms where participants are greeted and screened before entering the scanner room.
  - b. Zone 2: Areas between Zone 1 and Zone 3 or the area between the general public access area and the restricted area. This area includes the control counsel room and equipment room.
  - c. Zone 3: Areas where access is strictly restricted. The area in which serious injury or death can result to unscreened personnel or ferromagnetic objects or equipment.
  - d. Zone 4: Area in which the MRI scanner is located.
10. The student will assist the technologist in maintaining the necessary supplies and the cleanliness.
11. The student will not discuss or reveal any patient information except to authorized personnel.



12. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
13. The student will observe and perform in outside rotations as assigned by the supervising technologist.

### **MAMMOGRAPHY**

1. The student will observe and assist with mammography examinations on a rotational basis according to schedule of procedures.
2. The student will follow the dress code of the department and practice good personal hygiene
3. The student will assist the technologist in setting up the mammography equipment.
4. The student will assist the technologist in positioning the patient for the routine views as required by the radiologist for a complete examination.
5. The student and technologist will evaluate completed exams for:
  - a. Anatomy demonstrated
  - b. Technical factors
  - c. Proper positioning and centering
  - d. Pathology demonstrated
  - e. Properly hang mammo films
6. The student will respect the patient's right to privacy and confidentiality.
7. The student will assist the technologist in the cleanup of the mammography room, equipment, and supplies.
8. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
9. The student will identify all mammo image sizes.
10. The student will observe all quality assurance measurements.

### **NUCLEAR MEDICINE**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will observe and assist with all nuclear medicine scans performed during their clinical rotation.
4. The student will observe and assist the technologist in preparing the radionuclides for various types of nuclear medicine scans.
5. The student will observe and assist the technologist in the operation of the imaging equipment to include the:
  - a. Gamma camera
  - b. Computer console
  - c. Uptake probe
  - d. Radioisotope calibrator
6. The student will observe and assist the technologist in performing the basic procedures and positioning for nuclear medicine examinations to include:
  - a. Lung scan
  - b. Bone scan

- c. Cardiac
  - d. Biliary scan
  - e. Thyroid scan
7. The student will be able to properly operate imaging system for PACS workstation.
  8. The student will practice radiation protection for the patient and personnel.
  9. The student and technologist will evaluate completed exams for:
    - a. Anatomy demonstrated
    - b. Technical factor
    - c. Proper positioning
    - d. Pathology demonstrated
  10. The student will assist the technologist in maintaining the necessary supplies and cleanliness of the nuclear medicine section.
  11. The student will not discuss or reveal any patient information except to authorized personnel.
  12. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
  13. The student will observe and perform in outside rotations as assigned by the supervising technologist.
  14. The student will observe and assist in the daily, weekly, and monthly QA testing. (wipe/floods/etc.)

## **NURSING**

1. The student will report to the medical or surgical floor on time prepared for his/her duties and will not leave without informing the supervising nurse.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will observe and assist the supervising nurse in the use, cleanliness and upkeep of equipment.
4. The student will assist the supervising nurse in answering room calls and meeting the patient's needs.
5. The student will **observe** the supervising nurse in, giving IV's, shots and other medications.
6. The student will be able to locate any patient room.
7. The student will observe and make appropriate decisions in terms of comfort, warmth, privacy and safety of the patient.
8. Using proper body mechanics, the student will assist and transport the patient if needed.
9. The student will identify color codes for isolation procedures and comply with procedures as outlined by nursing services.
10. The student will observe and assist the supervising nurse in performing patient charting and record keeping.
11. The student will communicate with the patient using appropriate facial and body language and appropriate tone of voice.
12. The student will not discuss or reveal any patient information except to authorized personnel.
13. The student will follow the directions of the supervising nurse, seeking explanations and asking relevant questions at appropriate times.
14. The student will observe and assist in all duties assigned by the supervising nurse.

15. The student will practice courteous, respectful interpersonal relationships with the nursing staff.
16. The student will gain an understanding of the duties and responsibilities of the nursing staff.
17. The student will gain an understanding of working with patients and how to be empathetic and meet their needs.
18. The student will gain an understanding of meeting the needs of anxious family members.
19. The student will observe Dr.'s rounds when possible.
20. The student will learn how to use Care Notes to be able to provide valuable information to the patient and family.

### **OFFICE PROCEDURES**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising personnel.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the office/reception area in a neat orderly manner.
4. The student will process a patient's exam request.
5. The student will be able to file and locate patient records on Meditech and iSite.
6. The student will utilize the hospital's telephone in a courteous and professional manner.
7. The student will make a CD and fill out the release form.
8. The student will scan documents and import CD's.

### **PATIENT TRANSPORT**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising personnel.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will locate any department or patient room in the hospital.
4. The student will bring the correct patient and/or equipment to the Radiology Department.
5. The student will protect the privacy of the patient by keeping the hospital gown closed and using cover sheets.
6. The student will observe the patient and make appropriate decisions in terms of comfort, warmth, privacy, and safety of the patient.
7. Using proper body mechanics, the student will assist and transport the patient in and out of a wheelchair, on and off a gurney and on to and off the radiographic table.
8. The student will recognize when a patient is in isolation and comply with procedures as outlined by nursing services.
9. The student will care for catheters, IV's, tubes, etc., without dislodging or causing discomfort to the patient.
10. The student will communicate with the patient using appropriate facial and body language and appropriate tone of voice.
11. The student will practice courteous, respectful, interpersonal relationships with departmental and hospital staff.

12. The student is required to use hand-washing technique (gel-in gel-out) before and after each patient contact.

### **PORTABLE**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the portable unit in a clean state of readiness including the following:
  - a. Alcohol off the unit weekly
  - b. Charge the unit when necessary
  - c. Properly storing aprons on the unit
  - d. Indicating the location of the unit at the quality control area
4. The student will be able to operate and manipulate the portable unit effectively to include:
  - a. Moving the unit from one location to another
  - b. Releasing and securing all lock mechanisms
  - c. Manipulating the x-ray tube in all directions
  - d. Locking the x-ray tube in a 44" and 72" SID
  - e. Setting exposure factors on the control panel
  - f. Selection image receptor size for body part to be examined
5. The student will communicate with the patient in a manner appropriate for age, emotional, and physical condition of the patient.
6. The student will introduce themselves to the patient explaining the radiographic exam to be performed.
7. The student will independently perform portable radiographic exams in areas of successful clinical competency under direct supervision of a registered technologist.
8. The student will perform and/or assist with each radiographic procedure assigned to the portable rotation under the direct supervision of a registered technologist.
9. The student will demonstrate correct positioning skills for radiographic exams completed in the didactic sessions to include:
  - a. Chest
  - b. Abdomen
  - c. Extremities
  - d. Skull
  - e. Spine
10. The student will practice radiation safety for the patient and personnel.
11. The student will be able to evaluate completed radiographs for:
  - a. Anatomy demonstrated
  - b. Radiographic technique
  - c. Film identification
  - d. Proper positioning and centering
  - e. Evidence of radiation protection
12. The student will not discuss or reveal any patient information except to authorized personnel.

13. The student will follow the directions of the supervising technologist, seeking explanations and asking relevant questions at appropriate times.
14. The student will observe and perform in outside rotations as assigned by the supervising technologist.

### **QUALITY CONTROL**

1. The student will report to the assigned area on time prepared for his/her duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will control the flow of patient activities within the department to include:
  - a. Transporting patients to and from the department with reasonable waiting periods
  - b. Dismissing outpatients
  - c. Assigning examinations to radiographic rooms and personnel
  - d. Communicating with the patient and providing explanations for delays etc.
  - e. Maintaining a knowledge of the status of each patient in the department
4. The student will assess radiographic procedures to determine the need for additional radiographs or to repeat radiographs.
5. The student will evaluate radiographs for:
  - a. Anatomy demonstrated
  - b. Radiographic technique
  - c. Proper positioning and centering
  - d. Film identification
  - e. Evidence of radiation protection
  - f. Pathology demonstrated
  - g. Completeness of the exam
6. The student will make decisions controlling the department personnel to provide for break periods, continuous smooth flow, and adequate department coverage.
7. The student will communicate with attending physician, radiologist, and nursing staff regarding the patient and/or examinations.
8. The student will not discuss or reveal any patient information except to authorized personnel.
9. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
10. The student will observe and perform in outside rotations as assigned by the supervising technologist.

### **RADIATION THERAPY**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.

3. The student will identify by name the location and basic function of all radiation treatment rooms and related areas.
4. The student will assist the technologist in maintaining the necessary supplies and cleanliness of the treatment areas.
5. The student will observe and assist the technologist in the operation of the radiation treatment equipment.
6. The student will observe and learn appropriate ways of communicating with the patient, explaining the radiation therapy procedures, and completion of paperwork and documentation.
7. The student will observe and assist with all radiation therapy procedures performed during their clinical rotation under the supervision of a registered therapy technologist.
8. The student will practice radiation safety for the patient and personnel.
9. The student will not discuss or reveal any patient information except to authorized personnel.
10. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.

### **SURGERY/C-ARM**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will practice good personal hygiene, follow the dress code of the department when on portables & the dress code of surgery when in OR.
3. The student will change into appropriate surgical clothing to prevent contamination of the surgical area.
4. The student will maintain the radiographic equipment in a clean state of readiness including the following:
  - a. Clean, dust-free equipment
  - b. Aprons and gloves properly stored
  - c. Charging the unit when necessary
  - d. Indicating the location of the portables at quality control
5. The student will be able to operate and manipulate all radiographic equipment effectively to include:
  - a. Manipulating the portable unit in all directions
  - b. Setting exposure factors on the control panels of the portable and urology units
  - c. Reset an error message on control panel in Urology
6. The student will communicate with the patient in a manner appropriate for the age, emotional and physical condition of the patient.
7. The student will independently perform portable and surgical radiographic exams in areas of successful clinical competency under the direct supervision of a registered technologist.
8. The student will perform surgical radiography utilizing sterile procedures to prevent contaminating the surgical field.
9. The student will perform and/or assist with each radiographic procedure assigned to the surgery/portable rotation under the direct supervision of a registered technologist.
10. The student will demonstrate correct positioning skills for all surgical radiographic exams to include:
  - a. Cholangiography
  - b. Retrograde
  - c. Cystogram
  - f. Chest
  - g. Abdomen
  - h. Angiogram

- d. Urethrogram
  - e. Closed/open reduction
  - i. Skull
  - j. Spine
11. The student will evaluate completed radiographs for:
    - a. Anatomy demonstrated
    - b. Radiographic technique
    - c. Film identification
    - d. Proper positioning and centering
    - e. Evidence of radiation protection
  12. The student will practice radiation safety for the patient and personnel.
  13. The student will not discuss or reveal any patient information except to authorized personnel.
  14. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
  15. The student will observe and perform in outside rotations as assigned by the supervising technologist.

## **ULTRASOUND**

1. The student will report to the assigned area on time prepared for their duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will observe and assist with all ultrasound examinations performed during their clinical rotation.
4. The student will observe and assist the technologist in the operation of the imaging equipment to include:
  - a. Diagnostic ultrasound unit
  - b. Various ultrasound probes
  - c. Matrix camera
5. The student will observe and assist the technologist in performing basic ultrasound procedures and positions to include:
  - a. Gallbladder
  - b. Abdomen
  - c. Aorta
  - d. OB/GYN
  - e. Renal
6. The student will assist the technologist in maintaining the necessary supplies and cleanliness of the ultrasound section.
7. The student and technologist will evaluate completed exams for:
  - a. Anatomy demonstrated
  - b. Technical factors
  - c. Proper positioning
  - d. Pathology demonstrated
8. The student will assist in paperwork and worksheet analysis of the images prior to radiologist interpretation.
9. The student will not discuss or reveal any patient information except to authorized personnel.
10. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.
11. The student will observe and perform in outside rotations as assigned by the supervising technologist.

## **VERMILLION MEDICAL CLINIC**

1. The student will report to the VMC Radiology Department on time and prepared for his/her duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the radiology department in a clean state of readiness.
4. The student will keep the radiology department supplies well stocked.
5. The student will be able to operate and manipulate the equipment effectively to include:
  - a. Moving equipment in all directions
  - b. Locking x-ray tube in at proper SID
  - c. Centering the x-ray tube to the table or upright Bucky
  - d. Setting up pig-o-stat and other positioning aides
  - e. Setting exposure factors on the control panel
  - f. Inserting and removing proper sized cassettes
6. The student will assist the registered technologist in performing patient charting and record keeping.
7. The student will communicate in a manner appropriate for the age, emotional and physical condition of the patient explaining the radiographic exam.
8. The student will perform and/or assist with each radiographic procedure assigned by the supervising technologist.
9. The student will independently perform radiographic exams in areas of successful clinical competency under indirect supervision of a registered technologist.
10. The student will demonstrate correct positioning skills for the following examinations:
  - a. Chest and Abdomen
  - b. Extremities
  - c. Head and Spine
  - d. GI tract
  - e. Skull
  - f. Sinuses/Facial bones
11. The student will select proper exposure factors to produce high quality radiographs.
12. The student will evaluate completed radiographs for:
  - a. Anatomy demonstrated
  - b. Radiographic technique
  - c. Positioning and centering
  - d. Radiation protection
  - e. Image identification
13. The student will practice radiation safety for all patients and personnel.
14. The student will not discuss any patient information except to authorized personnel.
15. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.

## **YANKTON MEDICAL CLINIC, P.C.**



1. The student will report to the YMC Radiology Department on time and prepared for his/her duties and will not leave without informing the supervising technologist.
2. The student will follow the dress code of the department and practice good personal hygiene.
3. The student will maintain the radiology department in a clean state of readiness.
4. The student will keep the radiology department supplies well stocked.
5. The student will be able to operate and manipulate the equipment effectively to include:
  - a. Moving equipment in all directions
  - b. Locking x-ray tube in at proper SID
  - c. Centering the x-ray tube to the table or upright Bucky
  - d. Setting up pig-o-stat and other positioning aides
  - e. Setting exposure factors on the control panel
  - f. Inserting and removing proper sized image receptor
6. The student will assist the registered technologist in performing patient charting and record keeping.
7. The student will communicate in a manner appropriate for the age, emotional and physical condition of the patient explaining the radiographic exam.
8. The student will perform and/or assist with each radiographic procedure assigned by the supervising technologist.
9. The student will independently perform radiographic exams in areas of successful clinical competency under indirect supervision of a registered technologist.
10. The student will demonstrate correct positioning skills for the following examinations:
  - a. Chest and Abdomen
  - b. Extremities
  - c. Head and Spine
  - d. GI tract
  - e. Skull
  - f. Sinuses/Facial bones
11. The student will select proper exposure factors to produce high quality radiographs.
12. The student will evaluate completed radiographs for:
  - a. Anatomy demonstrated
  - b. Radiographic technique
  - c. Positioning and centering
  - d. Radiation protection
  - e. Film identification
13. The student will practice radiation safety for all patients and personnel.
14. The student will not discuss any patient information except to authorized personnel.
15. The student will follow the directions of the supervising technologist seeking explanations and asking relevant questions at appropriate times.