

R T 473: ADVANCED CLINICAL EXPERIENCE: MAMMOGRAPHY NONCREDIT

Foothill College Course Outline of Record

Heading	Value
Effective Term:	Summer 2026
Units:	0
Hours:	8 lecture, 160 laboratory per quarter (168 total per quarter) This is a 5 week course - 32 hours clinical laboratory per week, with 2 hours lecture per week for the first 4 weeks.
Prerequisite:	Current ARRT and CRT certification as a Radiologic Technologist or current student in the Foothill College Radiologic Technology program; R T 65 or equivalent.
Degree & Credit Status:	Non-Degree-Applicable Non-Credit Course
Foothill GE:	Non-GE
Transferable:	None
Grade Type:	Non-Credit Course (Receives no Grade)
Repeatability:	Unlimited Repeatability

Student Learning Outcomes

- Critique and distinguish relevant radiographic anatomy and pathology related to mammography
- Demonstrate proper equipment manipulation and assist in the performance of mammographic procedures, applying appropriate patient care and radiation protection in the clinical setting

Description

Designed as a practicum in a radiographic mammography department. Practical experience is implemented to expose the student to the principles of mammography with emphasis on mastery of the knowledge, insight, and skills required to perform mammographic procedures.

Course Objectives

The student will be able to:

1. Discuss workflow and protocols within the mammography department.
2. Explain the role of the mammographer with regard to patient care and communication.
3. Apply principles and operate mammographic equipment with supervision.
4. Perform screening mammography exams on a diverse population of patients.
5. Assist in the performance of diagnostic and interventional mammographic procedures.

6. Perform required quality control tests per state and federal guidelines.
7. Identify anatomy as seen on mammographic images.
8. List diseases and conditions commonly seen on mammographic images.

Course Content

1. Introduction to mammography
 - a. Introduction to department workflow/protocols
 - b. Introduction to hospital staff
2. Patient preparation/education
 - a. Patient care and communication
 - b. Solicit and record patient history
 - c. Knowledge of ACR guidelines
3. Mammographic procedures
 - a. Equipment selection
 - i. 2-D
 - ii. Tomosynthesis
 - b. Select exposure factors
 - c. Specify projections as per departmental protocols
 - d. Evaluate images for diagnostic quality
4. Quality control
 - a. Evaluation and recording of QC tests
 - b. Participate in the performance of QC tests
5. Diagnostic/interventional procedures
 - a. Needle localization/SAVI placement
 - b. Breast MRI
 - c. Breast ultrasound
 - d. Stereotactic procedures
 - e. Implant imaging
 - f. Ductography
 - g. New procedures
6. Radiographic critique
 - a. Observe Radiologist interpretation of at least 10 examinations
 - b. Evaluate image technique
 - c. Evaluate breast structures and composition
 - d. Identify pathology

Lab Content

Radiologic Technology clinical practice:

1. Instrumentation and quality assurance
2. Anatomy and physiology
3. Pathology
4. Mammographic technique
5. Image evaluation
6. Positioning
7. Diagnostic/interventional procedures
8. Patient education and assessment in a clinical setting

Special Facilities and/or Equipment

1. Rotation to a clinical affiliate with mammographic equipment.
2. Computer with internet access and an email address.

Method(s) of Evaluation

Methods of Evaluation may include but are not limited to the following:

Clinical evaluation

Completion of competency checklist

Method(s) of Instruction

Methods of Instruction may include but are not limited to the following:

Demonstration

Discussion

Clinical practice

Representative Text(s) and Other Materials

Peart, Olive. Mammography & Breast Imaging Prep, 3rd ed.. 2022.

Peart, Olive. LANGE Q&A: Mammography Examination, 5th ed.. 2022.

Types and/or Examples of Required Reading, Writing, and Outside of Class Assignments

Reading assignments to prepare for the California State Mammography exam and/or the ARRT mammography exam.

Discipline(s)

Radiological Technology