



Course Description

RTE2457 | Radiologic Technology 2 | 3.00 credits

This course is designed to increase the knowledge base of radiographic imaging principles presented in RTE 1613, RTE1418 and provide the student with the opportunity to complete quality assurance tests commonly done on diagnostic radiographic equipment. Additional factors that influence radiographic quality will be presented to include special imaging systems. Quality Management issues will be discussed throughout the course.

Course Competencies

Competency 1: The student will be able to describe quality control standards by:

1. Differentiating between quality assurance (QA) and quality control (QC)
2. Listing the benefits of a quality control management to the patient and to the department
3. Evaluating the results of standard QC tests
4. Discussing quality control (QC) for imaging equipment and accessories

Competency 2: The student will be able to discuss the image appearance and basic principles of operation for equipment used in various imaging modalities by:

1. Recognizing and comparing basic equipment used in various imaging modalities
2. Discussing fixed, fluoroscopy, and mobile equipment in terms of purpose, components, types, and applications
3. Explaining image-intensified, flat panel, and pulsed fluoroscopy
4. Indicating the purpose, construction, and application of fluoroscopic monitor
5. Describing the components of the various types of display monitors

Competency 3: The student will be able to demonstrate introductory knowledge of computed tomography by:

1. Describing the components of the CT imaging system
2. Describing commonly performed CT procedures
3. Discussing equipment and supplies necessary to complete commonly performed CT procedures
4. Explaining the functions of collimators in CT
5. Listing the CT computer data processing steps
6. Discussing general radiation safety and protection practices associated with examinations in CT

Learning Outcomes:

- Use quantitative analytical skills to evaluate and process numerical data
- Solve problems using critical and creative thinking and scientific reasoning
- Formulate strategies to locate, evaluate, and apply information