SECTION HEADING

RADT 1130: Radiological Exposures I

Description

Radiological Exposures I provides the student with the knowledge of factors that govern and influence image quality. The course emphasis is on image quality through the discussion of factors that affect density, contrast, recorded detail, and distortion. Complex mathematical problems reflect the effect of change in exposure factors and radiographic devices on image quality.

Credits

3

Prerequisite

MATH 1111

Corequisite

None

Topics to be Covered

1. Basic Physics concepts

2. Radiographic equipment

3. Properties of X-ray

4. Exposure factors

5. Application of Radiographic calculations

Learning Outcomes

1. Determine practical considerations in setting standards for acceptable image quality.

2. Analyze the relationships of factors that control and affect image exposure, contrast, detail, and distortion.

3. Assess radiographic density, contrast, detail, and distortion on radiographic images.

4. Recognize the types, functions and application of beam limiting devices and how they relate to image quality and patient exposure.

5. Recognize the types, functions, and limitations of grids.

6. Recognize the impact relationships of factors have on radiographic technique selection.

7. Identify a variety of image receptors.

8. Describe the benefits, limitations, and characteristics of a variety of image receptors.

Credit Details

Lecture: 2

Lab: 1

OJT: 0

MnTC Goal Area(s): None