



Course Number Course Name	RDPR 234L INTRODUCTION TO RADIOSCIENCE AND TECHNOLOGY
Credit Value (Breakdown of theory and lab credits)	4 Credits, (3 Theory, 1 Studio)
Catalog Course Description	Production, properties, interactions, dosimetry, detection and instrumentation of radiations from radioisotopes, radiation producing equipment, and nuclear reactors; phenomenon of radioactive materials from the viewpoint of nuclear stability, decay processes, and interaction with matter; devices and instrumentation for detection of radiation sources; applications of radiation and radioisotope techniques; radiation safety.
Student Learning Outcomes/Objectives /Competencies of the Course	<ol style="list-style-type: none"> 1. Understand the biophysical mechanisms of radiation damage on humans 2. Identify dose ranges for routine radiographic procedures 3. Literacy of basic methods and instruments for radiation monitoring, detection, and measurement 4. Implement appropriate radiation protection practices 5. List and describe the quantities and units of radiation 6. Discuss the use of radioisotopes and radioactive materials
College-Wide Student Learning Outcomes	<ol style="list-style-type: none"> 1. <i>Communication</i> <i>Communication will be assessed with assignment of class discussion of value of radioactive material in modern world.</i>