



Course Number Course Name	CHEM 302 ORGANIC CHEMISTRY II
Credit Value (Breakdown of theory and lab credits)	3 Theory
Catalog Course Description	The study of the compounds of carbon and the relationships among molecular structure, chemical reactivity, physical properties, and spectral features, approached by way of the functional group classification of organic compounds.
Student Learning Outcomes/Objectives /Competencies of the Course	<p>Course Objectives - <i>course content upon which a student's level of mastery will be assessed includes the ability to...</i></p> <ul style="list-style-type: none"> Analyze relationships among molecular structure, chemical reactivity, physical and spectral properties Understand chemical reactivity and reaction mechanisms relating to dienes, arenes, alcohols, ethers, amines, phenols, and carbonyl compounds, i.e. aldehydes, ketones, carboxylic acids and derivatives. Recognize and understand the structures, properties, functions and reactivity of both natural and synthetic macromolecules. Show how mechanisms are investigated including use of spectroscopy, kinetics, and stereochemistry Relate structures to spectral properties - interpreting IR, ^{13}C and ^1H NMR
College-Wide Student Learning Outcomes	<p>1. <i>Critical Thought</i> <i>Critical thought will be assessed by the students ability to apply concepts of Organic Chemistry to a randomly chosen homework assignment.</i></p>