



Course Number Course Name	CHEM 311L PHYSICAL CHEMISTRY LAB
Credit Value (Breakdown of theory and lab credits)	1 Laboratory
Catalog Course Description	You will engage in laboratory experiences supportive of CHEM 311.
Student Learning Outcomes/Objectives /Competencies of the Course	Students in this class will be able to 1) understand the theories of chemical reaction rates 2) predict rate laws from mechanisms or data 3) understand the basic postulates in quantum mechanics and their application in chemical systems 4) perform quantum mechanical calculations for simple systems 5) compute molecular energies, speeds, collision rates and selected transport properties. At the successful completion of the course, you will demonstrate your mastery of the key concepts by successful completion of homework and exams.
College-Wide Student Learning Outcomes	<i>This lab will be assessed in conjunction with the associated lecture/theory course which is a co-requisite.</i>