

	Monday	Tuesday	Wednesday	Thursday	Friday
Week 1 May 16-20	Exp. 1		Exp 2+3		
Week 2 May 23-27	Exp 4		Exp. 5		
Week 3 May 30-June 3	Memorial Day. YSU Closed		Exp. 6		
Week 4 June 6-10	Exp. 7		Exp 8		
Week 5 June 13-17	Exp. 9		Exp. 10		
Week 6 June 20-24	Juneteenth YSU Closed		Exp. 11		Exp. 12
Week 7 June 27-July 1	Expt. 13		Exp. 14		

List of Experiments:

Experiment	Exercise	Details
1	Finding Chemical Data and Molecular Modeling	Data Gathering: Use of online Molview or ChemSpider for finding reliable chemical data and compound properties from databases <i>Blackboard upload as PDF (10 pts)</i>
2	Lab Room Orientation and Syllabus Overview	Orientation: learn about the Rm 5037 Organic lab environment; assignment of equipment lockers <i>Safety Quiz (pass/fail)</i>
3	Measurement Prelab Reading	Lab Techniques: Safe transfer of organic liquids and solids, use of balance, glassware, pipettes, pipette pumps, vacuum filtration <i>Notebook upload as PDF (10 pts)</i>
4	Solubility & Miscibility Prelab Reading	Lab Techniques: Water bath for heating/evaporating of liquids, gravity filtration for removing impurities from organic solutions <i>Notebook upload as PDF (10 pts)</i>
5	Recrystallization Prelab Reading	Lab Techniques: Choosing an appropriate organic solvent for crystallizing, purifying solids from hot solvent, filtration & m.pt. <i>Notebook upload as PDF (10 pts)</i>
6	Stereochemistry Prelab Reading	Structure: Drawing and comparing stereoisomers in ChemDraw; conformational analysis of isomeric molecules using Chem3D <i>Blackboard upload as PDF (10 pts)</i>

7	Extraction & TLC <i>Prelab Reading</i>	Lab Techniques: Use of separatory funnel, washing and drying of organic solutions, evaporation, Thin Layer Chromatography <i>Notebook upload (10 pts)</i>
8	Distillation <i>Prelab Reading</i>	Lab Techniques: Separation and purification of organic liquids by their boiling point; identification of unknowns in a mixture <i>Notebook upload (10 pts)</i>
9	Substitution Week 1 <i>Prelab Reading</i>	Synthesis: Preparation of an organic halide from an alcohol via a substitution pathway; reaction is run twice to improve yield <i>Report due after following lab</i>
10	Substitution Week 2 <i>No Prelab</i>	Synthesis: Use of distillation to purify liquid substitution product from previous week; repeated on both samples to improve yield <i>Full Report upload (25 pts)</i>
11	Elimination Week 1 <i>Prelab Reading</i>	Synthesis: Conversion of alcohol into alkene via acid-catalyzed elimination; application of Le Chatelier's principle in synthesis <i>Report due after following lab</i>
12	Elimination Week 2 <i>No Prelab</i>	Synthesis: Use of distillation to purify liquid substitution product from previous week; tests on product sample to prove an alkene <i>Full Report upload (25 pts)</i>
13	Addition <i>Prelab Reading</i>	Synthesis: Preparation of a halogenated organic product through electrophilic addition of bromine to an electron-deficient alkene <i>Notebook upload (10 pts)</i>
14	Lab Final <i>Blackboard (10 pts)</i>	Overall: You will be tested on lab basics; what did you do, how did you do it, and why?