

**J. Sargeant Reynolds Community College  
Course Content Summary**

**Course Prefix and Number:** CHM 241    **Credits:** 3

**Course Title:** Organic Chemistry I

**Course Description:**

Introduces fundamental chemistry of carbon compounds, including structures, physical properties, syntheses and typical reactions. Emphasizes reaction mechanisms. Part I of II. Prerequisite: CHM 112 with grade C or higher. Lecture 3 hours. Total contact 3 hours per week. 3 credits

**General Course Objectives:**

- Predict and explain patterns in structure, geometry, bonding, hybridization, formal charge, stability, acidity, basicity, and polarity of organic molecules.
- Describe the trends in solubility, melting points, boiling points and other physical properties of organic molecules based on intermolecular forces and presence of specific functional groups.
- Classify organic molecules by their functional groups and provide correct IUPAC names for alkanes, alkenes, alkynes, alkyl halides, and other optional functional groups,

