

Study Programme :BSc in Biology				
Level: Bachelor				
Course Title: Chemistry				
Status: Required				
ECTS: 8				
Requirements: -				
Learning objectives: The aim of course is to familiarize with the general principles of chemistry that will form the base for understanding courses at higher years of studies such as: biochemistry, molecular biology, physiology, etc.				
Learning outcomes: Mastered the basic theoretical and practical knowledge of chemistry that will enable them comprehension and easier integration in lab work.				
Syllabus <i>Theoretical instruction</i> Chemistry as a fundamental discipline, Basic chemical laws and the structure of matter; Disperse systems; Chemical reactions; Chemical kinetics; Chemical equilibrium; Thermochemistry; The basic classes of inorganic compounds; Electrolytes; Hydrolysis of buffers systems; Reactions of oxidoreduction; Colligative properties of solutions; Solubility equilibrium and coordination complex; Bioelements; Introduction to Organic Chemistry; The basic classes of organic compounds; Hydrocarbons and halogen derivatives of hydrocarbons; Organic compounds with oxygen (alcohols, phenols, aldehydes and ketones, organic acids, substituted organic acids, functional derivatives of organic acids); Biomolecules (carbohydrates, lipids, amino acids and proteins, heterocyclic compounds). <i>Practical instruction</i> Practical course follows the theoretical				
Weekly teaching load				Other:
Lectures: 4	Exercises:	Other forms of teaching: 4	Student research:	