BASIC CHEMISTRY I

Course Name	Code	Term	Theory (hours/week)	Application (hours/week)	Laboratory (hours/week)	ECTS
BASIC CHEMISTRY I	BDB105	1.Autumn	2	0	2	4
Prerequisites	None					
Language of Instruction	Turkish					
Course Type	Compulsory					
Learning and Teaching Techniques of The Course	Lecture, Question-answer, Display, Application					
Instructor(s)	Prof. Mehmet SÖNMEZ					
Goal	It is to develop the ability to comprehend the basic knowledge of the problem, problem solving and correct thinking.					
Learning Outcomes	1. To be able to use dialing factors to bring numerical results together with correct units 2. To be able to balance chemical reactions and make calculations about chemical reactions 3. To be able to learn the properties and measurement of the material 4. To be able to understand chemical bonds 5. To be able to learn atomic electronic structure and atomic theory of atoms 6. To be able to relation between element and atomic numbers, periodic table position and physical / chemical properties of elements 7. To be able to convert different units of concentration to each other; be able to prepare solution at known concentration and calculate the concentration of solutes and the amount of a substance in solution 8. To be able to determine the rate of chemical reactions from experimental and theoretical way and to be able to investigate the factors that affect this rate 9. To be able to know basic concepts and principles of the chemical 10. To be able to have knowledge about how experiment and theory are related by making simple experiments about topics learned in Basic Chemistry course					
References	1. General Chemistry: Principles and Modern Applications, Petrucci, Harwood, Herring Co., New York. Translation Editors: Tahsin Uyar, Serpil Aksoy; Palme Publishing.					

Course Outline Weekly:

WEEKS	TOPİCS
1. Week	Properties and measurement of the material Preliminary information about laboratory presentation and experimental studies
2. Week	Atoms and atomic theory Determination of the specific heat of a metal
3. Week	Chemical compounds Determination of the molecular weight of a volatile liquid
4. Week	Chemical reactions Solution preparation,
5. Week	Introduction to aqueous solution reactions pH detection
6. Week	Aqueous solution reactions Strong acid strong base titration
7. Week	**MIDTERM EXAM**
8. Week	Gases and simple gas laws Salt in cheese
9. Week	Gases and simple gas laws Vitamin C in fruit juice
10. Week	Thermochemistry Determination of lactic acid in milk
11. Week	Atomic electron structure Soap making
12. Week	Periodic table and some atomic properties
13. Week	Periodic table and some atomic properties
14. Week	Chemical bonding and bonding theories Liquids, solids and intermolecular forces
15. Week	Chemical bonding and bonding theories Liquids, solids and intermolecular forces

Student Work Load Table

Activities	**Number**	**Duration**	**Total Work Load**
Course Duration	14	2	28
Laboratory	14	2	28
Practice			
Field Study			
Study Time Of Outside Of Class (Pre-Study, Practice, Etc.)	14	2	28
Presentations (Video shoot/Poster preparation/Oral presentation, Etc.)			
Seminars			
Project			
Case study			
Role playing, Dramatization			
Writing articles, Critique			
Time To Prepare For Midterm Exam	1	6	6
Final Exam Preparation Time	1	10	10
Total Work Load (hour) / 25(s)	**100 / 25=4**		
ECTS	**4**		

Evaluation System

Mid-Term Studies	**Number**	**Contribution**
Midterm exams	1	%25
Quiz		
Laboratory	1	%25
Practice		
Field Study		
Course Internship (If There Is)		
Homework's		
Presentation and Seminar		
Project		
Other evaluation methods		
Total Time To Activities For Midterm		50
Final works		
Final	1	%50
Homework		
Practice		
Laboratory		
Total Time To Activities For Midterm		50
Contribution Of Midterm Studies On Grades		%50
Contribution Of Final Exam On Grades		%50
Total		100

The relationship between learning outcomes and the program qualifications of the courses

Program Qualifications	Learning outcomes									
	L.O.1	L.O.2	L.O.3	L.O.4	L.O.5	L.O.6	L.O.7	L.O.8	L.O.9	L.O.10
1. To acquire information in the basic and social sciences as the Dietitian as he profession entails and make use of it for life.	3	3	3	3	3	3	3	3	3	3
2. To develop personalized diet and programme in accordance with the principles of adequate and balanced nutrition.										
3. To improve and develop the food and nutrition plans and policy for the development of individuals with the energy and nutrient element requirements with scientific method detection, health protection										
4. To determine and evaluate individual, the community and the patient's nutritional status by applying up-to-date information gained in the field of nutrition and dietetics. She/he can use the knowledge to raise the level of community health and the quality of life.										
5. Assess the nutritional status of the patients, evaluate the clinical symptoms, plan and apply individualized medical nutrition therapy for the patients.										
6. The student can understand the basic values and culture of the society he/she is living in and gain the skill to transform him/herself in a positive way										
7. Dietitian can improve products, make laboratory practice on elements affecting analysis and quality of nutrition, review and evaluate them regarding the legal regulations										
8. The student embraces the concepts with regard to biological systems that form the basis of human health, Anatomy, Physiology, and the sustainability of them.										
9. The student can participate in Nutrition and Dietetics practices individually and/or within a team, use, apply, discuss and share scientific and evidence based knowledge in nutrition and dietetics practice with team and team members, develop and demonstrate effective skills using oral, print, visual methods in communicating and expressing thoughts and ideas, communicate with all stakeholders within ethical principles. Develop and demonstrate effective communications skills using oral, print, visual, electronic and mass media methods										
10. Dietitian has knowledge to develop food and nutrition plans and policies for protection of health, in order to improvement and development by using methods for determining the nutritional status.										

Contribution to the level of proficiency: 1. Lowest, 2. Low / Medium, 3. Average, 4. High, 5. Excellent