TISHK INTERNATIONAL UNIVERSITY
FACULTY OF APPLIED SCIENCE
Department of MEDICAL ANALYSIS,
-2022 Spring
Course Information for MA 106 ORGANIC CHEMISTRY

Course Name:	ORGANIC CHEMISTRY

Code	Regular Semester	Theoretical	Practical	Credits	ECTS
MA 106	2	2	2	3	5

Name of Lecturer(s)-Academic Title:	Faiq Hussain - Ph.D. Chemistry
Teaching Assistant:	Dr. Soma Majedi and Kovan Dilawer Issa
Course Language:	English
Course Type:	Main
Office Hours	4 Hours
Contact Email:	faiqhussain53@yahoo.com ,faiq.hussain@tiu.edu.iq Tel:07504472943
Teacher's academic profile:	Prof.Dr.
Course Objectives:	Knowledge about the organic chemistry to realize its importance in cells and preparing the students for the next years to know about the Carbon in the life cycle in all parts of the human body.
Course Description (Course overview):	Organic chemistry is another primary branch of the science of Chemistry. Organic Chemistry investigates and seeks to understand the structure, properties and reactions of organic compounds, which contain carbon in covalent bonding. Organic compounds constitute an essential component of the functioning of biological systems and comprise a significant fraction of substances found in biological systems. In order for students to have a better insight into biological systems, particularly those involved in medicine and analysis, it is necessary to study this subject and this course aims to do that.

COURSE CONTENT

Week	Hour	Date	Topic
1	2	27-31/3/2022	Introduction
2	2	3-7/4/2022	Atoms and Molecules (Structure and History)
3	2	10-14/4/2022	Chemical Bonds (Ionic and Covalent)
4	2	17-21/4/2022	Hydrogen Bonding and Polarity
5	2	24-28/4/2022	Hydrocarbons (Definition, properties, importance in life)
6	2	8-12/5/2022	Alkanes (Introduction, Properties, Uses, Nomenclature)
7	2	15-19/5/2022	Midterm Exam
8	2	22-26/5/2022	Alkenes (Introduction, Properties, Uses, Nomenclature)
9	2	29/5-2/6/2022	Alkynes (Introduction, Properties, Uses, Nomenclature)
10	2	5-9/6/2022	Aromatic Compounds (Introduction, Properties, Uses, Nomenclature)
11	2	12-16/6/2022	Alkyl Halides (Introduction, Properties, Uses, Nomenclature)
12	2	19-23/6/2022	Final Exam
13	2	26-30/6/2022	Final Exam

COURSE/STUDENT LEARNING OUTCOMES

1	Preparing students for the Biochemistry Subjects in the further education years
2	Identify, classify, organize, analyze, and draw structures of organic molecules
3	Draw organic structures consistent with the results of specific chemical tests

4	Demonstrate proficiency in organic chemical laboratory techniques. (Chemical tests, extraction, filtration, instrumental analysis, molecular model building

COURSE'S CONTRIBUTION TO PROGRAM OUTCOMES

(Blank : no contribution, I: Introduction, P: Profecient, A: Advanced)

	Program Learning Outcomes	**Cont.**
1	Evaluate clinical laboratory data by interpreting laboratory results and relating the data to various disease states.	A
2	apply principles of evidence-based medicine to determine clinical diagnoses.	I
3	apply the basic principles of gross and microscopic anatomy, physiology, biochemistry, immunology, microbiology/virology.	P
4	formulate and implement acceptable treatment modalities to various disease states.	I
5	use technology effectively in the delivery of instruction, assessment, and professional development.	P
6	exhibit essential employability qualities by demonstrating laboratory safety, analyzing laboratory results, and displaying professional conduct.	A
7	exhibit organizational skills, accountability, and ethical behavior.	A
8	apply skills needed in operating laboratory equipment for testing, assessing quality assurance for lab equipment, and adhering to standard safety practices in the laboratory environment.	I
9	apply problem-solving and decision-making skills.	P
10	apply and promote health policies and regulatory standards in the field career.	
11	develop research in the field of medical analysis using qualitative and quantitative methods.	

Prerequisites (Course Reading List and References):	Textbook: Organic Chemistry, 7th edition 2008, Authors: John McMurry Publisher: Brooks Cole, ISBN: 978-1-4080-2054-8
Student's obligation (Special Requirements):	A student has an obligation to exhibit honesty and to respect the ethical standards of the profession in carrying out his or her academic assignments.
Course Book/Textbook:	1. Practical Organic Chemistry by Mann 2. Practical Organic Chemistry by Vogel 3. Experiments in Organic Chemistry by Fieser
Other Course Materials/References:	Any other books or journals about organic chemistry
Teaching Methods (Forms of Teaching):	Lectures, Practical sessions, Exercises, Presentation, Assignments, , ,

COURSE EVALUATION CRITERIA

Method	**Quantity**	**Percentage (%)**
Participation	1	10
Homework	1	10
Midterm Exam	1	20
Laboratory	1	10
Practical Exam	1	10
Final Exam	1	40
Total		**100**

Examinations: True-False, Fill in the Blanks, Multiple Choices, Short Answers, Matching, , ,

Extra Notes:

ECTS (ALLOCATED BASED ON STUDENT) WORKLOAD

Activities	**Quantity**	**Workload Hours for 1 quantity***	**Total Workload**
Theoretical Hours	13	2	26
Practical Hours	13	2	13
Final Exam	1	1	1
Participation	1		0
Homework	1		0

Midterm Exam	1	0
Laboratory	1	0
Practical Exam	1	0
Total Workload		**40**
ECTS Credit (Total workload/25)		**1.6**

Peer review

Signature:	Signature:	Signature:
Name:	Name:	Name:
Lecturer	Head of Department	Dean