

Introduction to the course: Professional Biochemistry Semester: The second academic year 2020-2021

School: Health Department: Biochemistry

- * Course Name and Number: Biochemistry
- * Field and Degree: Occupational Health
- * Day and time:
- * Venue: School of Health
- * Number and type of unit (theoretical / practical): 1 theoretical unit
- * Prerequisite courses: No prerequisite
- * Name of the person in charge of the course (course instructor): Dr. Haqqani
- * Phone and contact days: 08412235745
- * Email address: haghani.bio@gmail.com

* Office address: Biochemistry Department

Lesson Objective: Understanding the chemical structure and chemical reactions of vital molecules in the body

* Specific or partial objectives of the lesson: The specific objective is better to be written behaviorally (behavioral objective has the audience, behavioral verb, degree and criteria and conditions of performance)

- 1- The student should know the classification and chemical structure of important carbohydrates in the body.
- 2- The student should know the classification and chemical structure of important body lipids.
- 3- The student should learn the structure of amino acids, proteins and enzymes.
4. The student should describe the chemical structure of organic bases and different types of nucleic acids.
5. The student should describe the categories and disorders related to the decrease and increase of vitamins.

6. The student should have an overview of the metabolism of carbohydrates, lipids, proteins and nucleic acids.

* Student duties: (Student homework during the semester)

1- Permanent and timely presence in the classroom

2- Necessary preparation to answer the oral questions rose from the previous sessions

3- Necessary preparation to answer the quizzes during the semester

* Main resources of the course Main resources: (By observing the principles of source writing and giving an address for their preparation, including library, bookstore, Internet ...)

1- Biochemistry for the nurse

2- Harper Biochemistry

* Teaching method + teaching aids used: lecture, question and answer, PowerPoint, whiteboard

* Methods and time of assessment and evaluation of the student and the bar related to each value B:

Method	Score	Date	Time
Quiz	Each quiz is 0.5 points out of the total score	After the end of each season	Half an hour of class time
Mid-term	About 20% of the total score considering the number of quizzes	After finishing teaching the first three topics	Extra special session
The end of the semester	About 80% of the total score considering the number of quizzes	Date set by the faculty	According to the set time

* In case of excessive justified absence, introduction to training and removal of the lesson

Lesson rules and expectations from students:

Schedule for presenting the general biochemistry curriculum for the first semester of the academic year 2020-2021

Raw	Time	Title	Lecturer	Necessary preparation of students before the start of the class
1	10-12	introduction, classification, visomeric naming of monosaccharides and polysaccharides	Dr. Haqqani	-----
2	10-12	Fatty acids, glycerol lipids, phospholipids and sphingolipids	Dr. Haqqani	Read the contents of the previous topics
3	10-12	Chemical structure of amino acids, proteins	Dr. Haqqani	Read the contents of the previous topics
4	10-12	Chemical structure of organic bases, nucleotides and different types of RNA and DNA	Dr. Haqqani	Read the contents of the previous topics
5	10-12	Fat-soluble vitamins, water-soluble vitamins	Dr. Haqqani	Read the contents of the previous topics
6	10-12	Digestion and absorption of carbohydrates and glycolysis and glycogen metabolism	Dr. Haqqani	Read the contents of the previous topics
7	10-12	Krebs cycle and oxidative phosphorylation	Dr. Haqqani	Read the contents of the previous topics
8	10-12	Digestion and absorption of lipids	Dr. Haqqani	Read the contents of the previous topics
9	10-12	Digestion, absorption and catabolism of proteins and nucleic acids	Dr. Haqqani	Read the contents of the previous topics