



AYDIN ADNAN MENDERES UNIVERSITY COURSE INFORMATION FORM

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|--|---|---|---------------------|--|---|----------------------------------|---|------------|---|
| Course Title | | Basic Biochemistry | | | | | | | |
| Course Code | | GT504 | | Couse Level | | Short Cycle (Associate's Degree) | | | |
| ECTS Credit | 2 | Workload | 45 (<i>Hours</i>) | Theory | 2 | Practice | 0 | Laboratory | 0 |
| Objectives of the Course | | This derste is aimed at understanding the biomolecules of the students and the tasks of these molecules. It is also intended to teach the processes of biochemical events occurring in the body and the basic metabolic events. | | | | | | | |
| Course Content | | Our course covers the structure and importance of water and water, the structures and functions of biomolecules such as proteins and building blocks, carbohydrates and building blocks, lipids, and nucleic acids. | | | | | | | |
| Work Placement | | N/A | | | | | | | |
| Planned Learning Activities and Teaching Methods | | | | Explanation (Presentation), Discussion | | | | | |
| Name of Lecturer(s) | | | | | | | | | |

Assessment Methods and Criteria

| Method | Quantity | Percentage (%) |
|---------------------|----------|----------------|
| Midterm Examination | 1 | 40 |
| Final Examination | 1 | 70 |

Recommended or Required Reading

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| 1 | Bukhari, H. Biochemistry. Nobel Publishing Distribution. 2010. Aktümsek, A., Nurullahoğlu, Ü.Z. Practical Biochemistry. Nobel Publishing Distribution. 2007 |
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| Week | Weekly Detailed Course Contents | |
|------|---------------------------------|--|
| 1 | Theoretical | Course Introduction and Basic Components of Living Organisms |
| 2 | Theoretical | Water and water structure |
| 3 | Theoretical | Structures of proteins and amino acids |
| 4 | Theoretical | Nucleic acids |
| 5 | Theoretical | Enzymes |
| 6 | Theoretical | Vitamins |
| 7 | Theoretical | Carbohydrates |
| 8 | Intermediate Exam | Midterm |
| 9 | Theoretical | Lipids |
| 10 | Theoretical | Functions of proteins in metabolism |
| 11 | Theoretical | Functions of enzymes in metabolism |
| 12 | Theoretical | Functions of vitamins in metabolism |
| 13 | Theoretical | Functions of carbohydrates in metabolism |
| 14 | Theoretical | Functions of lipids in metabolism |
| 15 | Theoretical | General lesson again |
| 16 | Final Exam | Final exam |

Workload Calculation

| Activity | Quantity | Preparation | Duration | Total Workload |
|---------------------------------------|----------|-------------|----------|----------------|
| Lecture - Theory | 15 | 0 | 2 | 30 |
| Midterm Examination | 1 | 5 | 0 | 5 |
| Final Examination | 1 | 10 | 0 | 10 |
| Total Workload (Hours) | | | | 45 |
| [Total Workload (Hours) / 25*] = ECTS | | | | 2 |

*25 hour workload is accepted as 1 ECTS

Learning Outcomes

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|---|---|
| 1 | Describe the structures of amino acids and proteins |
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|---|--|
| 2 | Describe the properties and structures of carbohydrates |
| 3 | Describe structures and properties of lipids |
| 4 | They will be able to describe the structures and properties of enzymes, vitamins and minerals. |
| 5 | Learning some basic components of human biochemistry |

Programme Outcomes (Organic Agriculture)

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|----|---|
| 1 | To have university life, to use computer technology and to have skills for raising of scientific data |
| 2 | To produce according to organic agriculture rules |
| 3 | To know and apply starter to organic agriculture, and to get product certification |
| 4 | To know genetic for organic vegetable and animal species |
| 5 | To know and apply organic production principle and regulations and protection of environment |
| 6 | Understand and apply production techniques for organic vegetable and animal |
| 7 | To understand control methods for diseases and pests in organic agriculture |
| 8 | Having knowledge of quality control, preserving and marketing of organic products |
| 9 | To having knowledge equipments and methods for new agricultural technologies |
| 10 | To have knowledge of professional ethics and responsibility |
| 11 | Ability to work in team and individual |
| 12 | To communicate orally and in writing |
| 13 | To have adopt life-long learning importance and to have follow professional developments |

Contribution of Learning Outcomes to Programme Outcomes 1:Very Low, 2:Low, 3:Medium, 4:High, 5:Very High

| | L1 | L2 | L3 | L4 | L5 |
|----|----|----|----|----|----|
| P4 | 3 | 3 | 3 | 3 | 3 |
| P8 | 3 | 3 | 3 | 3 | 3 |

