Course Instructor:
Prof. Dr. Zeynep Petek ÇAKAR, Istanbul Technical University
(petek.cakar@sabanciuniv.edu, cakarp@itu.edu.tr)


Link for buying the book online:
https://www.homerbooks.com/urun/brock-biology-of-microorganisms

Course Content:
- The microbial world (microorganisms, microscopy, microscopic staining and history of microbiology) (Chapter 1 in textbook)
- Microbial cell structure and function (Chapter 2)
- Microbial metabolism (Chapter 3)
- Microbial growth and its control (Chapter 5)
- Viruses and their replication (Chapter 8)
- Microbial systems biology (Chapter 9)
- Genetics of bacteria and archaea (Chapter 11)
- Biotechnology and synthetic biology (Chapter 12)
- Microbial evolution and systematics (Chapter 13)
- Microbiology of the built environment (Chapter 22)
- Epidemiology (Chapter 29)

Objective:
The objective of the course is to introduce the basic principles and modern applications of microbiology

Major Learning Outcomes:
- Demonstrate knowledge of microbiology and its applications.
- Demonstrate knowledge of classical, molecular, and genomic methods to identify microorganisms isolated from natural environments.
- Ability to implement the microbiology knowledge and the aseptic principles in daily life.

Evaluation:
Term project 25%
Presentation of the Term Project 25%
Homeworks 15%
<table>
<thead>
<tr>
<th>Activity</th>
<th>Percentage</th>
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<tbody>
<tr>
<td>Attendance and active participation</td>
<td>15%</td>
</tr>
<tr>
<td>Laboratory (homeworks and lab reports total)</td>
<td>20%</td>
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