

Republic of Iraq
Ministry of Higher
Education and Scientific
Research
Supervision and Scientific
Evaluation Apparatus



University: Shatt Al-Arab University
College: College of Engineering
Department: Civil Engineering
Stage: 1st stage
Lecturer name: Feras Abbas Lefta
Academic title: Assist. Lecturer

Course Weekly Outline

Name	Feras Abbas Lefta				
E-mail address	feras.abbass@sa-uc.edu.iq				
Course name	Engineering Mechanics -1-				
Course objective	<ol style="list-style-type: none"> 1. To introduce the basic principles of forces and motions and how they affect objects. 2. To develop the ability to solve engineering problems using basic concepts of mechanics. 3. To introduce the basic concepts of structural analysis and design of structural elements. 4. To improve the ability to think critically and analytically. 5. To train students to use modern tools and techniques in solving engineering problems. 				
Course description	<ol style="list-style-type: none"> 1- To understand the general principles of engineering mechanics. 2- To understand and solve engineering problems. 				
References	<ol style="list-style-type: none"> 1. Hibbeler R. C., Engineering Mechanics, Statics, 14th ed, 2015 2. M. E. Plesha, Engineering Mechanics Statics, 1st ed, 2010 3. A. Bedford, Engineering Mechanics Statics, 5th ed, 2008 				
External sources	<ol style="list-style-type: none"> 1. Hibbeler R. C., Engineering Mechanics, Statics, 14th ed, 2015 2. M. E. Plesha, Engineering Mechanics Statics, 1st ed, 2010 3. A. Bedford, Engineering Mechanics Statics, 5th ed, 2008 				
Course assessment	Homework	Project	Quizzes and assessment	Mid-term exam	Final exam
	10	10	20	10	50
General notes					

Republic of Iraq
Ministry of Higher
Education and Scientific
Research
Supervision and Scientific
Evaluation Apparatus



University: Shatt Al-Arab University
College: College of Engineering
Department: Civil Engineering
Stage: 1st stage
Lecturer name: Feras Abbas Lefta
Academic title: Assist. Lecturer

Course Weekly Outline

Week No.	Theoretical	Experimental	Aims
1	Introduction		<p>This module covers a wide range of engineering mechanics topics in order to provide the basic knowledge and foundations applicable to various civil engineering problems, such as Newton's laws and basic conservation (mass, momentum and energy).</p>
2	Introduction		
3	Force Analysis		
4	Force Analysis		
5	Force Analysis		
6	Equilibrium		
7	Equilibrium		
8	Equilibrium		
9	Equilibrium		
10	Trusses		
11	Trusses		
12	Trusses		
13	Trusses		
14	Trusses		
15	Trusses		