



AL IMAM MOHAMMAD IBN SAUD ISLAMIC UNIVERSITY
COLLEGE OF ENGINEERING
Department of Mechanical Engineering

Course Information	
Course Code and Name:	ME213 Mechanics of Materials Lab
Credit Hours:	1 (2 Lab Hrs.)
Prerequisites:	ME 216 Mechanics of Materials

Course Description
Material testing against tension, compression and impact testing, investigations of Hooke's law, strain gages measurements of deflection, phenomena of bending, phenomena of hardness via its different tests and theory of torsion and deflection. Phenomena of creep and its effect on temperature. Dynamic testing of materials like fatigue.

Textbook			
Title	Fundamentals of Materials Science & Engineering		
Authors	William D Callister, Jr. & David .G. Rethwish		
Publisher	John Wiley & Sons, Inc.	Year and Edition	2007, 3 rd Edition

Course Contents
Hooke's Law.
Impact Test.
Tensile Test.
Flexure Test
Hardness Test.
Torsion Test.
Deflection Test.
Fatigue Test.
Creep Test.

Academic Coordinator	Signature
Dr. Mahmoud Ahmadein	<i>M. Ahmadein</i>



Official Stamp