

Aerospace Engineering **Division:**
Level and Major: Bsc Aerospace Eng

Course Title: Thermodynamics (I) **Number of Credits: 3** **Prerequisite**
Lecturer: Dr. Mahmoud Mani

Course Description:

Basic thermodynamics concepts and analysis of thermodynamic systems

Course Goals and Objectives:

Teaching thermodynamics and its basic laws

Course Topics:

- Introduction
- Basic concepts
- raw material properties
- work and heat
- first law of thermodynamics for system and control volume
- second law of thermodynamics
- Entropy
- irreversibility and availability

Reading Resources:

Evaluation:

Final exam: 60%

Midterm exam: 30%

Homeworks: 10%