

SYLLABUS  
PART I  
EDISON COMMUNITY COLLEGE  
EGR 100S INTRODUCTION TO ENGINEERING  
1 CREDIT HOUR

**COURSE DESCRIPTION**

Presents the various areas of engineering and examines the ethical responsibilities of engineers. Students work on interdisciplinary teams to design and build solutions to engineering challenges. Microsoft Word, Project and Excel are introduced as tools to document the project.

**COURSE GOALS**

The student will:

Bloom's Level		Program Outcomes A,B,C,D,E,F
1	1. List some of the areas of engineering specialization.	2,2,2,2,2,2
5	2. Design and create part of a team project.	8,8,8,8,10,8
3	3. Solve open ended design problems.	5,4,5,5,7,6
2	4. Discuss an engineering code of ethics.	7,7,4,6,9,7
1	5. Record project costs and time-lines using computer software.	6,5,6,8,6,9

A ELT Electronics Transfer

B ELT Automation and Robotics

C ELT Industrial Machinery

D MET Mechanical Transfer

E MET Manufacturing Systems

F MET Mechanical Design Option

**CORE VALUES**

The Core Values are a set of principles, which guide in creating educational programs and environments at Edison. They include communication, ethics, critical thinking, human diversity, inquiry/respect for learning, and interpersonal skills/teamwork. The goals, objectives, and activities in this course will introduce/reinforce these Core Values whenever appropriate.

**TOPIC OUTLINE**

1. Engineering Fields
2. Design Project
3. Documentation
4. Mechanical Design
5. Manufacturing
6. Electrical
7. Ethics