

Engineering Career Exploration Track

Major Description:

This accredited program is designed to provide students with the knowledge and skills needed to succeed in today's industrialized society. Modern industrial societies are centered on the successful production, distribution, and utilization of mechanized devices and techniques. Robust design methods are pivotal in the manufacturability, performance, and economic feasibility of these devices. Together with study of the basic engineering principles, design is the cornerstone of the Mechanical and Manufacturing Engineering Technology program.

Course Plan:

Semester	Course
1 st Semester	EGT 110: Introduction to Engineering Technology
2 nd Semester	EGT 162: Industrial Electricity
3 rd Semester	EGT 116: Introduction to Manufacturing
4 th Semester	EGT 212: Computer-Aided Drafting and Design

Course Descriptions:

EGT 110: Introduction to Engineering Technology

Prerequisite: Math ACT Score of 22+ or ALEKS score of 30+

The course introduces concepts from introduction to computer graphics and parametric design, basic electronics, basic mechanics, and engineering calculations; technology computer applications; and spreadsheets for engineering calculations. General Education Credit: Natural Science

EGT 116: Introduction to Manufacturing

Fundamentals of welding and metal processing methods; metal casting, shaping, metal forming, bulk deformation processes.

EGT 162: Industrial Electricity

Prerequisite: Math ACT Score of 22+ or ALEKS score of 30+

Students will learn the fundamentals of DC and AC circuits, networks, electrical code, and Industrial applications of electrical theory and circuitry.

EGT 212: Computer-Aided Drafting and Design

Fundamentals of computer-aided drafting; production of technical drawings using CAD software; working drawings; standard machine elements; tolerance dimensioning.

Links:

[Mechanical and Manufacturing Engineering Technology](#)