COURSES

AUTOMATION & ROBOTICS

ATR-215   **Sensors and Transducers**   **Lec 2 Lab 3 Clinic 0 Credit 3**

This course provides the theory and application of sensors typically found in an automated manufacturing system. Topics include physical properties, operating range, and other characteristics of numerous sensors and transducers used to detect temperature, pressure, position, and other desired physical parameters. Upon completion, students should be able to properly interface a sensor to a PLC, PC, or process control system.

Co-Requisites: None
Pre-Requisites: None

ATR-280   **Robotic Fundamentals**   **Lec 3 Lab 2 Clinic 0 Credit 4**

This course covers application, programming, and maintenance fundamentals for robotic devices. Emphasis is placed on terminology, problem solving, robotic systems controls, and hands-on projects. Upon completion, students should be able to apply basic concepts in application, programming, and robotic control systems.

Co-Requisites: None
Pre-Requisites: None