

INDUSTRIAL ELECTRONICS TECHNICIAN, CERTIFICATE OF ACHIEVEMENT

Control Number: 41469
Not Financial Aid Eligible

This certificate prepares students to maintain and troubleshoot basic industrial control systems. Students gain hands-on experience with switches, contactors, motor drives, and indicators. Students who obtain this certificate are proficient at circuit analysis, wiring, crimping, and documentation to include wiring diagrams, schematics, and basic ladder logic diagrams.

Program Outcomes

1. Students will be able to utilize fundamental electrical theory to predict and explain behavior of electric circuits.
2. Students will acquire the skills and knowledge necessary to effectively use multimeters and oscilloscopes to analyze and troubleshoot electric circuits.
3. Students will acquire the electrical knowledge and practical skills necessary to obtain employment as a maintenance technician to meet the needs of local manufacturing facilities.

Certificate of Achievement Requirements

The Certificate of Achievement is a state-approved career program that requires a minimum of eight units and is designed to prepare the graduate to enter a particular field of employment. In order to be awarded a certificate, students are required to obtain a grade of "C" or better in all program-required courses. Grades of "CR" or "P" will be accepted whereas "CR" or "P" meets the equivalency of a "C" or better. At least 3 units in an advanced course from the certificate must be completed at OCC at the department's discretion. Certificates of Achievement are not automatically awarded. A petition must be filed in Enrollment Services or online at the beginning of the semester in which the student will be completing their final requirements. The petitioning periods are listed in the Graduation Requirements (<https://catalog.cccd.edu/orange-coast/graduation-requirements/>) section of this catalog. Check with a counselor to determine the requirements for completion.

A list of certificate programs can be found in the Programs A-Z (<https://catalog.cccd.edu/orange-coast/programs-study/>) section of this catalog.

Course	Title	Units
Required Courses		
ELEC A100 or MATH A115 or MATH A120	Electronic Problem Solving College Algebra Trigonometry	3-4
ELEC A111	D.C. Circuits	3
ELEC A112	A.C. Circuits	3
ELEC A131	Automation 1- Industrial Control Systems	4
Total Units		13-14

Program Sequence

These sequences at Orange Coast College are curriculum maps for students to finish all requirements for the certificate. There may be

advisories, prerequisites, or time requirements that students need to consider before following these maps. **Students are advised to meet with an Orange Coast College Counselor for alternate sequencing.**

Course	Title	Units
Year 1		
Semester 1		
ELEC A100 or MATH A115 or MATH A120	Electronic Problem Solving or College Algebra or Trigonometry	3-4
ELEC A111	D.C. Circuits	3
ELEC A112	A.C. Circuits	3
ELEC A131	Automation 1- Industrial Control Systems	4
Units		13-14
Total Units		13-14