



Industrial Electronics & Controls (615)

Certificate Program

ABOUT OUR PROGRAM

When completers of the Industrial Electronics and Controls certificate enter industry, they bring with them a wide range of skills that local and regional employers are seeking.

The program provides students with experience in general and industrial electronic components such as sensors, motors, and valves, as well as typical electronic circuits found in industry. Students gain experience with computer applications and programmable logic controllers.

The certificate includes health and safety instruction.

NATURE OF WORK AND EMPLOYMENT

Graduates of this certificate are prepared to work with industrial machines and manufacturing systems. Typical career positions include maintenance technician, troubleshooter, machine builder, and field sales specialist.

PROGRAM CONTACTS

Call Highland at 815-235-6121 for the following program contacts:

- Scott Anderson, Dean of Business & Technology
- Steve Gellings, Electronics Faculty
- Thedford Jackson, Transfer Coordinator/Student Advisor

First Semester

12 Sem. Hours

* BUSN	141	Business Communications (or ENGL 121 or COMM 101)	3
* ELET	179	Electronic Principles	3
* INFT	180	Introduction to Information Systems	3
* MATH	111	Technical Math (or higher level)	3

Second Semester

14 Sem. Hours

* ELET	182	Devices and Circuits I	3
* ELET	293	Intro to Programmable Logic Controllers	3
MTEC	120	Equipment Maintenance Skills	3
* MTEC	263	General Hydraulics	3
OCED	117	Occupational Safety	1
OCED	118	Health and Safety Topics	1

Third Semester

16 Sem. Hours

* ELET	183	Devices and Circuits II	3
* ELET	220	Motors and Controls	3
* ELET	297	Advanced Programmable Logic Controllers	3
MTEC	130	Introduction to Remote Monitoring	1
* MTEC	210	General Pneumatics	3
* ELET	291	Introduction to Automation	3

Total Hours =

42

* Course has a prerequisite. See course descriptions.

In compliance with U.S. Department of Education disclosure guidelines, gainful employment statistics for certificate programs can be found at www.highland.edu/hcc_academics.

