



ELECTRICAL SYSTEMS TECHNOLOGY

Associate in Applied Science | Diploma | Certificate

The Electrical Systems Technology curriculum is designed to provide students with the skills and technical background required for entry-level employment in the installation and maintenance of electrical/electronic systems found in residential, commercial and industrial facilities.

To learn more visit www.piedmontcc.edu/est

More about ELECTRICAL SYSTEMS

The Electrical Systems Technology curriculum is designed to provide students with the skills and technical background required for entry-level employment in the installation and maintenance of electrical/electronic systems found in residential, commercial and industrial facilities.

Most training is hands-on and includes such topics as AC/DC theory, basic wiring practices, digital electronics, programmable logic controllers, industrial motor controls, and the National Electric Code.

Outlook for EMPLOYMENT

Upon successful completion of this program, graduates will qualify for entry-level employment in the electrical/electronics or renewable energy fields. Specific jobs include entry level positions as an electrician, electronics technician or an electrical/electronics maintenance specialist.

Electrician
Electronics Technician
Electrical Maintenance Specialist

Elective COURSES

ELN/ELC Elective Choices

PHY 110/110A Physics ***
PHY 151 College Physics ***
ELC 213 Instrumentation

Social Science Elective Choices

ECO 251 Principles of Microeconomics
ECO 252 Principles of Macroeconomics
SOC 210 Intro to Sociology
PSY 150 General Psychology

COURSES

Required Courses for Program			AAS	DIP	C1	C2
ACA	111	College Student Success OR	✓	✓		
ACA	122	College Transfer Success	✓	✓		
CIS	110	Intro to Computers	✓			
COM	231	Public Speaking	✓			
ELC	112	DC/AC	✓	✓	✓	✓
ELC	113	Residential Wiring	✓	✓	✓	✓
ELC	115	Industrial Wiring	✓	✓	✓	
ELC	117	Motors and Controls	✓	✓		
ELC	118	National Electrical Code (NEC)	✓	✓	✓	✓
ELC	128	Intro to PLC	✓	✓		
ELC	213	Instrumentation	✓	✓		
ELC	228	PLC Applications	✓			
ELN	131	Analog Electronics 1	✓	✓		✓
ELN	133	Digital Electronics	✓	✓		
ELN	135	Electronic Circuits	✓			
ENG	111	Writing and Inquiry	✓	✓		
HUM	110	Tech Society ****	✓			
HUM	115	Critical Thinking ****	✓			
ISC	112	Industrial Safety	✓	✓	✓	✓
ISC	170	Problem Solving	✓	✓		
MAT	143	Quantitative Literacy **	✓	✓		
MAT	171	Pre-Cal Algebra **	✓	✓		
XXX		ELC/ELN Elective	✓			
XXX		Social Science Elective	✓			
Semester Hours Required for Degree			69/70	46/47	17	17

Courses with matching symbols indicate OR/AND requirements. Review back page or contact Student Development for more information.

AAS = Associate in Applied Science DIP= Diploma (Commercial Wiring)
C1 = Certificate (General) C2 = Certificate (Residential Wiring)

✓ Denotes required for degree completion

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Process for ADMISSIONS

- Submit a complete Application for Admission to the Office of Admissions.
- Submit official transcript(s) of high school education and all post-high school course work to the Office of Admissions if requested. GED scores or transcript of courses for the Adult High School Diploma may be submitted in lieu of the high school transcript.
- Complete the Admission Placement Test.
- Diploma and certificate admission requirements may vary. Contact the Admissions Office for details.

Program CONTACT

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Person County Campus - I119

Walter Montgomery, Dean
(336) 322-2258
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Person County Campus - L119

“*” means these courses may be offered spring or fall.



Person County Campus
1715 College Drive
Roxboro, NC 27573
(336) 599-1181

Caswell County Campus
331 Piedmont Drive
Yanceyville, NC 27379
(336) 694-5707

ASSOCIATE IN APPLIED SCIENCE Suggested Course Sequence Full-time Student

Course#	Course Name	CL.	LB.	CLIN.	CR.
FALL SEMESTER					
ACA 111	College Student Success <i>OR</i>	1	0	0	1
ACA 122	College Transfer Success	0	2	0	1
ELC 112	DC/AC	3	6	0	5
ELC 113	Residential Wiring	2	6	0	4
ENG 111	Writing and Inquiry	3	0	0	3
MAT 143	Quantitative Literacy <i>OR</i>	2	2	0	3
MAT 171	Pre-Calc Algebra	3	2	0	4
		10-12	14-16	0	16-17

SPRING SEMESTER

ELC 115	Industrial Wiring	2	6	0	4
ELC 118	NEC	1	2	0	2
ELN 131	Analog Electronics 1	3	3	0	4
ISC 112	Industrial Safety	2	0	0	2
PHY	Elective (110 & 110A <i>OR</i> 151)	3	2	0	4
		11	13	0	16

SUMMER SEMESTER

ELC 117	Motors and Controls	2	6	0	4
		2	6	0	4

FALL SEMESTER

CIS 110	Intro to Computers	2	2	0	3
ELC 128	Intro to PLCs	2	3	0	3
ELC 213	Instrumentation	2	2	0	4
ELN 133	Digital Electronics	3	2	0	4
ISC 170	Problem Solving	3	0	0	3
		12	9	0	17

SPRING SEMESTER

HUM 110	Tech & Society <i>OR</i>	3	0	0	3
HUM 115	Critical Thinking	3	0	0	3
ELN 135	Electronic Circuits	2	3	0	3
ELC 228	PLC Applications	2	6	0	4
COM 231	Public Speaking	3	0	0	3
SOC/ECO/PSY	Elective	3	0	0	3
		13	9	0	16
		48-50	51-53	0	69-70

**TOTAL SEMESTER HOURS
REQUIRED FOR DEGREE: 69-70**