

## Electronic Systems Program Courses and Booklist

Electronic Systems Program Courses and Booklist <i>Electronics Assembler Certificate</i>		Prerequisite: None			
1st Trimester	Certificate: Electronics Assembler				
COURSE NUMBER	BOOKS AND SUPPLIES	PUBLISHER	ISBN	COST	QTY
ESP-0001 Worker Characteristics	None	None		\$0.00	
ESP-1010 Orientation & Safety	OSHA 10 Voucher (must purchase from TCAT-H Bookstore)	CareerSafe		\$59.00	
	Headphones			\$2.00	
ESP-1020 Customer Service	Customer Service Specialist Study Guide	ETA	1-891749-08-0	\$24.00	
	Customer Service Specialist Certification Exam Fee	ETA		\$80.00	
ESP-1030 Basic Math	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-1040 Computer Concepts I	Welcome to Computer Basics 2nd Ed.	Labyrinth Learning	978-1-64061-206-8	\$72.00	
	USB Flash Drive			\$6.00	
ESP-1050 DC Circuits I	EM1 DC Certification Study Guide (Download only from ETA)	ETA		\$25.00	
	Scientific Calculator (Casio fx-300MS or equivalent)	Casio		\$18.00	
	Digital Multimeter (Klein MM400 or equivalent)	Klein		\$68.00	
	EM1 DC Certification Exam Fee	ETA		\$30.00	
	DC CertTEC Certification Exam Fee	CertTEC		\$85.00	
ESP-1060 Soldering Techniques/Tools	Safety Glasses			\$2.00	
	Pocket Pack Solder .031 DIA 5 oz.			\$3.00	
	Desoldering Braid			\$2.00	
	Lithium 3V Battery			\$1.00	
	Soldering Project Kit (96901410)	Nida		\$31.00	
	The Tingle Soldering Kit (C6740)	Chaney Electronics		\$16.00	
	Shaking Dice Soldering Kit (MK150)	Velleman		\$18.00	
	Cables and Connectors Kit (96901459)	Nida		\$66.00	
ESP-1070 AC Circuits I	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-1080 Worker Ethics & Ex. I	None	None			
ESP-1090 Integrated Projects I	None	None			
<b>432 Contact Hours</b>		<b>Trimester 1 Books, Tests, and Supplies Total</b>		<b>\$608.00</b>	

**Note: Prices are estimates and subject to change without notice; state sales tax will be added to certain items**

Student is responsible for miscellaneous material (paper, pencils, tools, etc.)

revised 08/02/2022 (effective Fall 2023)

<b>Electronic Systems Program Courses and Booklist <i>Electronics Systems Tester Certificate</i></b>		<b>Prerequisite: Electronics Assembler Certificate</b>			
<b>2nd Trimester</b>		<b>Certificate: Electronics Systems Tester 864 Contact Hours</b>			
<b>COURSE NUMBER</b>	<b>BOOKS AND SUPPLIES</b>	<b>PUBLISHER</b>	<b>ISBN</b>	<b>COST</b>	<b>QTY</b>
ESP-0002 Worker Characteristics	None	None		\$0.00	
ESP-2010 Intro. to Applied Technology	None-Computer Based Instruction (Provided)	ACT WorkKeys		\$0.00	
ESP-2020 Analog Circuits I	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-2030 Digital Circuits I	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-2040 Tester Projects	Logic Probe (214 Graymark)	Graymark		\$22.00	
	Digital Multimeter (M2666-K)	Elenco		\$50.00	
ESP-2050 AC Circuits II	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-2060 Electronics Comp. Rev. II	AC CertTEC Performance Certification	CertTEC		\$85.00	
	Associate CET Study Guide-6th Edition	ETA	1-891749-07-2	\$72.00	
ESP-2070 Worker Ethics & Ex. II	None	None			
ESP-2080 Integrated Projects II	None	None			
<b>432 Contact Hours (864 Total Contact Hours)</b>				<b>Trimester 2 Books, Tests, and Supplies Total \$229.00</b>	

<b>Electronic Systems Program Courses and Booklist <i>Electronic Systems Repair Technician Diploma</i></b>		<b>Prerequisite: Electronic Systems Tester</b>			
<b>3rd Trimester</b>		<b>Diploma: Electronic Systems Repair Technician 1296 Total Contact Hours</b>			
<b>COURSE NUMBER</b>	<b>BOOKS AND SUPPLIES</b>	<b>PUBLISHER</b>	<b>ISBN</b>	<b>COST</b>	<b>QTY</b>
ESP-0003 Worker Characteristics	None	None		\$0.00	
ESP-3010 Professional Development	Connect to Your Career 3rd Ed.	Good-Heart Willcox	978-1-64564-747-8	\$66.00	
ESP-3020 Technical Writing	None-Computer Based Instruction (Provided)	ACT WorkKeys		\$0.00	
ESP-3030 D.C. Circuits II	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-3040 Analog Circuits II	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-3050 Digital Circuits II	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-3060 Microcontrollers	None-Computer Based Instruction (Provided)	Nida		\$0.00	
ESP-3070 Technician Projects	Clock & Robot Kit	TBD		\$120.00	
ESP-3080 Electronics Comp. Rev. III	Analog & Digital Performance Certifications	CertTEC		\$170.00	
	Associate CET Certification	ETA		\$60.00	
ESP-3090 Worker Ethics & Ex. III	None	None			
ESP-3100 Integrated Projects III	None	None			
<b>432 Contact Hours (1296 Total Contact Hours)</b>				<b>Trimester 3 Books, Tests, and Supplies Total \$416.00</b>	

<b>Electronics Systems Technician Diploma-Industrial Electronics Specialty (Option 1)</b>		<b>Prerequisite: Electronic Systems Repair Technician Diploma</b>			
<b>4th Trimester</b>		<b>Diploma: Industrial Electronics 1728 Total Contact Hrs.</b>			
<b>COURSE NUMBER</b>	<b>BOOKS AND SUPPLIES</b>	<b>PUBLISHER</b>	<b>ISBN</b>	<b>COST</b>	<b>QTY</b>
ESP-0004 Worker Characteristics	None	None		\$0.00	
ESP-4010 Industrial Electronics	Pneumatic Fundamentals	Festo	584196	\$30.00	
	Electrical Controls of Pneumatic Systems	Festo	978-2-89289-410-3	\$30.00	
	CM-284-L1 PAC Workbook 2nd Ed. Version 2.11	TII		\$120.00	
	Programmable Logic Controllers Connect Access Card 6e	McGraw-Hill	9781264446759	\$129.00	
	SM-L24-SAS-SIM-V32 Student Lab Manual	Future Tek		\$63.00	
	SM PF-40 Drive Student Lab Manual	Future Tek		\$67.00	
	SM-PanelView Plus 7 Student Lab Manual	Future Tek		\$67.00	
	Automation and Robotics-FMS (Provided by Instructor)	Festo		\$0.00	
	Mechatronics Training Guide (Provided by Instructor)	Festo		\$0.00	
	Process Control-Festo LX (Provided by Instructor)	Festo		\$0.00	
	Worker Ethics and Exploration IV	None		\$0.00	
<b>432 Contact Hours (1728 Total Contact Hours)</b>		<b>Trimester 4 Books, Tests, and Supplies Total</b>		<b>\$506.00</b>	

**Course Books and Supplies Totals**

Electronics Assembler Certificate Books and Supplies Total	<b>\$608.00</b>
Electronics Systems Tester Certificate Books and Supplies Total	<b>\$229.00</b>
Electronic Systems Repair Technician Diploma Books and Supplies Total	<b>\$416.00</b>
Electronics Systems Technician-Industrial Electronics Diploma Books and Supplies Total	<b>\$506.00</b>
<b>Electronic Systems Program Books and Supplies Total</b>	<b>\$1759.00</b>
<b>Electronic Systems Program Tuition Total</b>	<b>\$5492.00</b>
<b>Electronic Systems Total Program Cost (Option 1)</b>	<b>\$7251.00</b>

<b>Electronics Systems Technician Diploma-Communications Specialty (Option 2)</b>		<b>Prerequisite: Electronic Systems Repair Technician Diploma</b>			
<b>4th Trimester</b>		<b>Diploma: Communications 1728 Total Contact Hrs.</b>			
<b>COURSE NUMBER</b>	<b>BOOKS AND SUPPLIES</b>	<b>PUBLISHER</b>	<b>ISBN</b>	<b>COST</b>	<b>QTY</b>
ESP-0004 Worker Characteristics	None	None		\$0.00	
ESP-4020 Communications	Telecommunications (Provided by Instructor)	Nida		\$0.00	
	RF Communications (Provided by Instructor)	Nida		\$0.00	
	Signal Processing (Provided by Instructor)	Nida		\$0.00	
	Intro to Telecommunications manual and consumable kit	C-TECH	0-9789769-5-9	\$58.00	
	Copper Manual and consumable kit (4.0)	C-TECH	1-7323242-2-0	\$176.00	
	Fiber Optic Manual and consumable kit (4.0)	C-TECH	1-7323242-4-7	\$271.00	
	Worker Ethics and Exploration IV	None		\$0.00	
<b>432 Contact Hours (1728 Total Contact Hours)</b>		<b>Trimester 4 Books, Tests, and Supplies Total</b>		<b>\$505.00</b>	

**Course Books and Supplies Totals**

Electronics Assembler Certificate Books and Supplies Total	<b>\$608.00</b>
Electronics Systems Tester Certificate Books and Supplies Total	<b>\$229.00</b>
Electronic Systems Repair Technician Diploma Books and Supplies Total	<b>\$416.00</b>
Electronics Systems Technician-Industrial Electronics Diploma Books and Supplies Total	<b>\$505.00</b>

**Electronic Systems Program Books and Supplies Total (Option 2) \$1758.00**  
**Electronic Systems Program Tuition Total \$5492.00**

**Electronic Systems Total Program Cost (Option 2) \$7250.00**