Microcomputer Systems Option

Computer technology is an Associate of Applied Science (AAS) option. AAS degrees are traditionally technically focused with some general education requirements. If your interest is in technically-oriented tasks such as designing and implementing computer networks and telecommunication systems, solving manufacturing process and production problems, programming computer numerical control (CNC) machines for automated machine operations, designing computer animation and graphics, or designing multimedia projects, then one of the computer technology options might be for you. All of these options transition smoothly into bachelor degree options upon completion.

Microcomputer Systems
The Microcomputer systems option is designed to prepare students with background and skills to design, implement, and support networked systems in both standard and enterprise settings. It builds a solid foundation in the hardware and architecture of telecommunications networks and systems; operating systems and applications; systems design and analysis; networking theory and solutions; types of networks, including fiber optics and wireless; network management and control; network and flow optimization; network security; configuring, and troubleshooting.

Career Planning
Career preparation is part of the mission of Southeast. 100% of programs offer our students an internship, study-abroad program, clinical opportunity, student teaching or research internship.

The Office of Career Services in Academic Hall 057 can provide students with professional career counseling and coaching, resume critiques, practice interviews, job search strategies, career events, networking opportunities, and more.

Career Opportunities
- Information Technology Specialist
- Network Administrator/Specialist
- Network Manager
- System Administrator
- Telecommunications Specialist
- Technical Specialist

AAS to BS Options
The following Bachelor of Science degree programs can be easily transitioned into after completion of the AAS degree:
- Technology Management: Telecommunications & Computer Networking Option

Other bachelor degree programs within the Department of Polytechnic Studies might be pursued in conjunction with this AAS degree; however, it may be more difficult. See an advisor for more details.

Transfer and Dual Credit Students
If you have dual credit or transfer credit, please visit our transfer course equivalencies guide at semo.edu/transfercredit.
COLLEGE OF SCIENCE, TECHNOLOGY, ENGINEERING AND MATHEMATICS

Computer Technology: Microcomputer Systems Option
Associate of Applied Science (AAS)

This is a guide based on the 2018-2019 Undergraduate Bulletin and is subject to change. The time it takes to earn a degree will vary based on several factors such as dual enrollment, remediation, and summer enrollment. Students will meet with an academic advisor each semester and use DegreeWorks to monitor their individual progress.

**CURRICULUM CHECKLIST**

Computer Technology: Microcomputer Systems – 70 hours

Required Courses:
- ___ EN 100 English Composition I (3)
- OR
- ___ EN 140 Rhetoric & Critical Thinking (3)
- ___ IM 300 Technical Communications (3)
- ___ IM 301 Industrial Safety Supervision (3)
- ___ IM 419 Industrial Supervision (3)
- ___ MA116 Precalculus A (3)
- ___ MA117 Precalculus B (3)
- ___ MN 260 Technical Computer Programming (3)
- OR
- ___ CS 155 Computer Science I (4)
- ___ PH 120 Introductory Physics I (5)
- ___ PH 121 Introductory Physics II (5)
- ___ PS 103 U.S. Political Systems (3)
- ___ SC 105 Fundamentals of Oral Communications (3)

Microcomputer Systems option
- ___ ET 160 Basic Electricity & Electronics (3)
- ___ ET 245 Logic Circuits (3)
- ___ TN 255 Microcomputer Maintenance & Troubleshooting (3)
- ___ TN 275 Introduction to Networks (3)
- ___ TN 375 Routing and Switching Essentials (3)
- ___ TN 395 Server Maintenance & Troubleshooting (3)
- ___ TN 425 Wireless Communication & Mobile Data Networks (3)
- ___ TN 475 Scaling Networks (3)
- ___ TN 563 Connecting Networks (3)

Choose 6 hours from:
- ___ CY 201 Introduction to Cybersecurity (3)
- ___ IM 317 Industrial Internship (3)
- ___ TN 435 Network Security (3)

**SAMPLE FIVE-SEMESTER PLAN**

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Refer to the Undergraduate Bulletin or DegreeWorks for additional graduation requirements (i.e. minimum GPA and coursework) for your program of study.