A.A.S., INFORMATION TECHNOLOGY SPECIALIST

Concentrations: Computing Technology, Network and Cybersecurity, and Network and System Administration

Minimum Requirements for A.A.S. Degree: 60 credits

Students must earn a C- grade or better in each course.

General University Requirements

Complete the general university requirements. ([http://catalog.uaf.edu/certificates-associate](http://catalog.uaf.edu/certificates-associate))

A.A.S. Degree Requirements

Complete the A.A.S. degree requirements. ([http://catalog.uaf.edu/certificates-associate/summary-of-certificate-and-associate-degree-requirements/#associateofappliedsciencetext](http://catalog.uaf.edu/certificates-associate/summary-of-certificate-and-associate-degree-requirements/#associateofappliedsciencetext))

Program Requirements

CITS F204 Introduction to Network Support and Administration 3

Select one from the following: 3

CITS F205 Introduction to Microcomputer Programming
CS F103 Introduction to Computer Programming
CS F201 Computer Science I
CITS F212 Server Operating Systems 3
CITS F261 Computer and Network Security 3
CITS F281 Professional Practices in IT 3
CITS F284 Independent Project 3
or CITS F285 Cooperative Work Experience

Additional 6 credits from CIOS, CITS or CS electives 6

Concentrations

Select one from the following concentrations: 21-22

Computing Technology

Network and Cybersecurity

Network and System Administration

Pass a certification review requiring students to demonstrate proficiency in the following skill areas: network support and troubleshooting; system administration; cybersecurity; independent thinking; human relations and support; and professional practices. 2

Total Credits 45-46

1 As part of the A.A.S. degree requirements, complete DEVM F105 or any course at the F100 level or above in mathematical sciences (computer science, math or statistics) for the computation requirement, and ABUS F154, ANTH F100X, SOC F101X for the human relations requirement.

2 Prior to graduation, all students are required to pass a certification review that includes a hands-on scenario task and the development and presentation of a portfolio of work.

Concentrations

COMPUTING TECHNOLOGY

Select 21-22 credits from the following or from program coordinator-approved courses:

CITS F201 Microcomputer Operating Systems Support
CITS F203 Information Technology Support Fundamentals
CITS F219 Microcomputer Operating Systems: Topics
CITS F220 Implementing Internet Tools and Technologies
CITS F221 Graphics and Multimedia for the Web
CITS F222 Website Design
CITS F240 System and Network Services Administration
CITS F241 Networking and LAN Infrastructure Basics
CITS F242 Routing and Switching Essentials
CITS F243 Intermediate Networking and LAN Infrastructure
CITS F244 Advanced Network Infrastructure Services
CITS F262 Cybersecurity Defense and Countermeasures
CITS F263 Network Security Penetration Testing
CITS F265 Directory Services Administration
CITS F282 IT Troubleshooting Skills
CITS F289 Information Technology: Topics

Total Credits 21-22

NETWORK AND CYBERSECURITY

CITS F241 Networking and LAN Infrastructure Basics 4
CITS F242 Routing and Switching Essentials 4
CITS F243 Intermediate Networking and LAN Infrastructure 4
CITS F244 Advanced Network Infrastructure Services 4
CITS F262 Cybersecurity Defense and Countermeasures 3
CITS F263 Network Security Penetration Testing 3

Total Credits 22

NETWORK AND SYSTEM ADMINISTRATION

CITS F240 System and Network Services Administration 3
CITS F241 Networking and LAN Infrastructure Basics 4
CITS F242 Routing and Switching Essentials 4
CITS F243 Intermediate Networking and LAN Infrastructure 4
CITS F244 Advanced Network Infrastructure Services 4
Note: Upon admission to the certificate or degree program, each student will be assigned a mentor/committee chairperson who will be responsible for determining the student’s current level of competency in the various skill areas; assisting the student in determining the courses/experiences necessary for gaining competency in the deficient skill areas; setting up the student’s committee to consist of the mentor and at least one other individual who may be a UA faculty member, an adjunct faculty member, or an expert in the student’s community; arranging for practical experiences in the student’s community; and organizing the committee’s final assessment of the student’s work and recommending award of the certificate or degree.