

COMPUTER SCIENCE: NETWORKING

Certificate

Quincy College | Academic Division of Professional Programs

Program Description

The Networking Certificate was designed for those students who are interested in learning the fundamentals of Networking or for those students who would like to enhance their networking careers. The program is 24 credits and can be completed in one academic year.

Program Outcomes

At the completion of this program, the student should be able to:

- Describe the major hardware and software components of a computer system.
- Describe networking technologies used in computer networks.
- Compare and contrast various types of computer operating systems.
- Identify network boundaries and topologies within a network diagram.
- Explain the operation of various networking protocol features.
- Demonstrate the use of network monitoring and troubleshooting tools.
- Demonstrate configuration of networking devices, such as switches and routers.
- Analyze a given set of network diagnostic test results in order to identify a network problem.
- Design a network given a set of requirements and constraints.

ADDITIONAL INFORMATION

(*) Indicates course requires the completion of a prerequisite.

NOTE: All classes are offered in the fall and the spring unless otherwise designated:

F=Class is only offered in the Fall

S=Class is only offered in the Spring

PRIOR LEARNING

CompTIA and QC Courses

- Network+ is equivalent to CSI 244 Networking I
 - Security+ is equivalent to CSI 242 Computer Systems Security
- Students with proof of completion please contact Division Dean.

Course / Credit Information

Certificate Requirements	24 credits	Credits
CSI 101 Introduction to Computers		3 credits
CSI 104 Introduction to Programming with Python		3 credits
CSI 226 UNIX with Linux		3 credits
CSI 235 Computer Architecture*		3 credits
CSI 244 Networking I		3 credits
CSI 245 Networking II*		3 credits
CSI 246 Networking III* (S)		3 credits
Program Electives		3 credits

Total credits required for graduation 24 credits

Program Electives	Credits
CSA 213 Database Management	3 credits
CSI 217 Introduction to Operating Systems	3 credits
CSI 242 Computer System Security* (F)	3 credits
CSI 265 Linux System Administration* (S)	3 credits