

Networking (N+)

Duration - 1 Month



✧ Network Theory

- Networking Terminology
- Network Categories
- Standard Network Models
- Physical Network Topologies
- Logical Network Topologies

✧ Network Communications Methods

- Data Transmission Methods
- Media Access Methods
- Signaling Methods

✧ Network Media and Hardware

- Bounded Network Media
- Unbounded Network Media
- Noise Control
- Network Connectivity Devices

✧ Network Implementations

- Ethernet Networks
- Wireless Networks

✧ Networking Models

- The OSI Model
- The TCP/IP Model

✧ TCP/IP Addressing and Data Delivery

- The TCP/IP Protocol Suite
- IP Addressing
- Default IP Addressing Schemes
- Create Custom IP Addressing Schemes
- Implement IPv6 Addresses
- Delivery Techniques

✧ TCP/IP Services

- Assign IP Addresses
- Domain Naming Services
- TCP/IP Commands
- Common TCP/IP Protocols
- TCP/IP Interoperability Services

✧ LAN Infrastructure

- Switching
- Enable Static Routing
- Implement Dynamic IP Routing
- Virtual LANs
- Plan a SOHO Network

✧ WAN Infrastructure

- WAN Transmission Technologies
- WAN Connectivity Methods
- Voice over Data Transmission

✧ Remote Networking

- Remote Network Architectures
- Remote Access Networking Implementations
- Virtual Private Networking
- VPN Protocols

✧ System Security

- Computer Security Basics
- System Security Tools
- Authentication Methods
- Encryption Methods

✧ **Network Security**

- Network Perimeter Security
- Intrusion Detection and Prevention
- Protect Network Traffic Using IPSec

✧ **Network Security Threats and Attacks**

- Network-Based Security Threats and Attacks
- Apply Threat Mitigation Techniques
- Educate Users

✧ **Network Management**

- Network Monitoring
- Configuration Management Documentation
- Network Performance Optimization

✧ **Network Troubleshooting**

- Network Troubleshooting Models
- Network Troubleshooting Utilities
- Hardware Troubleshooting Tools
- Common Connectivity Issues