



CompTIA Network+ Class Outline

1. Network theory

- Network types
- Network standards and the OSI model
- Data transmission methods

2. Bounded network media

- Copper media
- Fiber optic media
- Bounded network media installation

3. Unbounded network media

- Wireless networking
- Wireless network devices and components
- Implement wireless technology
- Internet of Things

4. Network implementations

- Physical network topologies
- Logical network topologies
- Ethernet networks
- Network devices

5. TCP/IP addressing and data delivery

- The TCP/IP protocol suite
- IPv4 addressing
- Default IP addressing schemes
- Create custom IP addressing schemes

- IPv6 address implementation

6. Routing and switching

- Switching
- Network packet routing
- Static and dynamic IP routing
- VLANs

7. TCP/IP implementation

- Assign IP addresses
- Naming services
- TCP/IP utilities
- Common TCP/IP protocols

8. Network security analysis

- Introduction to network security
- Network security policies
- Physical security controls
- Common network attacks

9. Network security implementation

- Authentication
- Access control
- Port, service, and protocol security
- Wireless network security
- Patches and updates
- Mitigation techniques

10. WAN infrastructure

- WAN basics
- WAN connectivity methods
- WAN transmission technologies
- VoIP

11. Cloud and virtualization techniques

- Virtualization technologies

- Network storage technologies
- Cloud computing

12. Remote networking

- Remote network architectures
- Remote access network implementations
- Virtual private networking

13. Network management

- Monitor networks
- Document the network
- Establish baselines
- Network performance optimization
- Ensure business continuity

14. Troubleshooting network issues

- Network troubleshooting methodology
- Network troubleshooting tools
- Troubleshoot wired connectivity and performance issues
- Troubleshoot wireless connectivity and performance issues
- Troubleshoot network service issues