

55343 Networking with Windows Server 2016

Category: Infrastructure & IT Operations | **Vendor:** Microsoft

Duration: 40.00 hours (5 days)

32.5 CPD Hours

Rating: ★ 4.6 (5,878 reviews)

Course Information

Delivery Format: Instructor Led - Online

Course Overview

55343A is the Community Courseware equivalent of retired Legacy Course 20741BC - Networking with Windows Server 2016. This 5-day classroom-based course provides the fundamental networking skills required to deploy and support Windows Server in most organizations. It covers IP fundamentals, remote access technologies, and more advanced content including Software Defined Networking. Although this course and the associated labs are written for Windows Server 2022, the skills taught will also be backwards compatible for Server 2016 and Server 2019.

About This Course

55343A is the Community Courseware equivalent of retired Legacy Course 20741BC - Networking with Windows Server 2016. This 5-day classroom-based course provides the fundamental networking skills required to deploy and support Windows Server in most organizations. It covers IP fundamentals, remote access technologies, and more advanced content including Software Defined Networking. Although this course and the associated labs are written for Windows Server 2022, the skills taught will also be backwards compatible for Server 2016 and Server 2019.

Who Should Attend

This course is intended for existing IT professionals who have some networking knowledge and experience and are looking for a single course that provides insight into core and advanced networking technologies in Windows Server. This audience would typically include: Network administrators who are looking to reinforce existing skills and learn about new networking technology changes and functionality in Windows Server. System or Infrastructure Administrators with general networking knowledge who are looking to gain core and advanced networking knowledge and skills on Windows Server.

Prerequisites & Entry Requirements

General Prerequisites:

In addition to professional experience, students who attend this training should already have the following technical knowledge:

- Experience working with Windows Server
- Knowledge of the Open Systems Interconnection (OSI) model
- Understanding of core networking infrastructure components and technologies such as cabling, routers and switches
- Familiarity with networking topologies and architectures such as local area networks (LANs), wide area networks (WANs) and wireless networking
- Some basic knowledge of the TCP/IP protocol stack, addressing and name resolution
- Experience with and knowledge of virtualization
- Hands-on experience working with the Windows client operating systems such as Windows 10 or Windows 11

Learning Outcomes

Upon successful completion of this course, participants will be able to:

Plan and implement an IPv4 network. Implement Dynamic Host Configuration Protocol (DHCP). Implement IPv6. Implement Domain Name System (DNS). Implement and manage IP address management (IPAM). Plan for remote access. Implement DirectAccess. Implement virtual private networks (VPNs). Implement networking for branch offices. Configure advanced networking features. Implement Software Defined Networking.

Detailed Course Outline

1 - Planning and implementing an IPv4 network

- Planning IPv4 addressing
- Configuring an IPv4 host
- Managing and troubleshooting IPv4 network connectivity

2 - Implementing DHCP

- Overview of the DHCP server role
- Deploying DHCP
- Managing and troubleshooting DHCP

3 - Implementing IPv6

- Overview of IPv6 addressing
- Configuring an IPv6 host
- Implementing IPv6 and IPv4 coexistence
- Transitioning from IPv4 to IPv6

4 - Implementing DNS

- Implementing DNS servers
- Configuring zones in DNS
- Configuring name resolution between DNS zones
- Configuring DNS integration with Active Directory Domain Services (AD DS)
- Configuring advanced DNS settings

5 - Implementing and managing IPAM

- Overview of IPAM
- Deploying IPAM
- Managing IP address spaces by using IPAM

6 - Remote access in Windows Server

- Overview of remote access
- Implementing the Web Application Proxy

7 - Implementing DirectAccess

- Overview of DirectAccess
- Implementing DirectAccess by using the Getting Started Wizard
- Implementing and managing an advanced DirectAccess infrastructure

8 - Implementing VPNs

- Planning VPNs
- Implementing VPNs

9 - Implementing networking for branch offices

- Networking features and considerations for branch offices
- Implementing Distributed File System (DFS) for branch offices
- Implementing BranchCache for branch offices

10 - Configuring advanced networking features

- Overview of high performance networking features
- Configuring advanced Microsoft Hyper-V networking features

11 - Implementing Software Defined Networking

- Overview of SDN.
- Implementing network virtualization
- Implementing Network Controller

1 - Planning and implementing an IPv4 network

- Planning IPv4 addressing
- Configuring an IPv4 host
- Managing and troubleshooting IPv4 network connectivity

2 - Implementing DHCP

- Overview of the DHCP server role
- Deploying DHCP
- Managing and troubleshooting DHCP

3 - Implementing IPv6

- Overview of IPv6 addressing
- Configuring an IPv6 host
- Implementing IPv6 and IPv4 coexistence
- Transitioning from IPv4 to IPv6

4 - Implementing DNS

- Implementing DNS servers
- Configuring zones in DNS
- Configuring name resolution between DNS zones
- Configuring DNS integration with Active Directory Domain Services (AD DS)
- Configuring advanced DNS settings

5 - Implementing and managing IPAM

- Overview of IPAM
- Deploying IPAM
- Managing IP address spaces by using IPAM

6 - Remote access in Windows Server

- Overview of remote access
- Implementing the Web Application Proxy

7 - Implementing DirectAccess

- Overview of DirectAccess
- Implementing DirectAccess by using the Getting Started Wizard
- Implementing and managing an advanced DirectAccess infrastructure

8 - Implementing VPNs

- Planning VPNs
- Implementing VPNs

9 - Implementing networking for branch offices

- Networking features and considerations for branch offices
- Implementing Distributed File System (DFS) for branch offices
- Implementing BranchCache for branch offices

10 - Configuring advanced networking features

- Overview of high performance networking features
- Configuring advanced Microsoft Hyper-V networking features

11 - Implementing Software Defined Networking

- Overview of SDN.
- Implementing network virtualization
- Implementing Network Controller

Upcoming Schedule

Available training dates for 55343 Networking with Windows Server 2016:

Start Date	End Date	Location	Delivery	Price
28 Sep 2026	02 Oct 2026	Online	Virtual	€2,995.00
25 Jan 2027	29 Jan 2027	Online	Virtual	€2,995.00

Additional Course Details

Nexus Humans 55343 Networking with Windows Server training program is a workshop that presents an invigorating mix of sessions, lessons, and masterclasses meticulously crafted to propel your learning expedition forward.

This immersive bootcamp-style experience boasts interactive lectures, hands-on labs, and collaborative hackathons, all strategically designed to fortify fundamental concepts.

Guided by seasoned coaches, each session offers priceless insights and practical skills crucial for honing your expertise. Whether you're stepping into the realm of professional skills or a seasoned professional, this comprehensive course ensures you're equipped with the knowledge and prowess necessary for success.

While we feel this is the best course for the 55343 Networking with Windows Server course and one of our Top 10 we encourage you to read the course outline to make sure it is the right content for you.

Additionally, private sessions, closed classes or dedicated events are available both live online and at our training centres in Dublin and London, as well as at your offices anywhere in the UK, Ireland or across EMEA.

Frequently Asked Questions

Q: What delivery options are available for 55343 Networking with Windows Server 2016?

We offer multiple delivery formats:

- Live Instructor-Led Classroom Online (Virtual/Live Online)
 - Traditional Instructor-Led Classroom Training (ILT)
 - On-site delivery at your offices anywhere in United Kingdom
 - Private dedicated courses customized for your team
-

Q: How many CPD hours does this course provide?

The 5-day 55343 Networking with Windows Server 2016 course provides up to 32.5 CPD hours of structured learning. CPD certificates can be provided upon request.

Q: What is the duration of the 55343 Networking with Windows Server 2016 training?

The training takes place over 5 day(s), with each day lasting approximately 40.00 hours including breaks for lunch and refreshments.

Q: Do you provide corporate training for 55343 Networking with Windows Server 2016?

Yes, we provide corporate training, dedicated training, and closed classes for 55343 Networking with Windows Server 2016. Training can take place anywhere in United Kingdom including London, Manchester, Birmingham, Edinburgh, or live online allowing teams from across United Kingdom or internationally to attend.

Q: Why choose Nexus Human for 55343 Networking with Windows Server 2016?

Nexus Human is recognized as one of the leading training providers. Our trainers have won multiple awards including:

- Small Firms Best Trainer Award
- National Training Partner of the Year (Ireland) - Multiple Years
- Global Top 30 Instructor Awards (2012, 2019, 2021)
- Tech Excellence Award Nominations
- Learning Performance Institute (LPI) External Training Provider Sponsor 2024

Q: Are there any discount codes available?

Yes! Use discount code **PENPAL5** when booking your 55343 Networking with Windows Server 2016 training. Please note that only one discount code can be used per booking and cannot be combined with other special offers.

Nexus Human

Professional Training & Development

✉ Email: info@nexushuman.com

🌐 Website: www.nexushuman.com

☎ Phone: +353 1 XXX XXXX (Ireland) | +44 20 XXXX XXXX (UK)

© 2026 Nexus Human. All rights reserved. This brochure was generated on 05/09/2026.