

The Windows Server 2003 MCSA Core series has in one package all the training courses you need to pass the three core exams required for the Microsoft Certified Systems Administrator credential. The three courses deliver nearly 50 hours of training in three core exam subjects. Courses meet or exceed all the latest Microsoft certification objectives. At the conclusion of this series, you'll be prepared to pass the two required networking system exams and the required client operating system exam (Windows XP Professional). By successfully completing these exams and one elective exam of your choice, you'll be MCSA certified.

Implementing Network Infrastructure

Session 1

Section A: Network Infrastructure Overview

- Required Skills
- Required Components
- Base Platform
- Network Planning

Section B: Understanding TCP/IP

- TCP/IP History
- TCP/IP Protocol Suite
- OSI Model
- OSI Upper Layers
- OSI Middle Layers
- OSI Lower Layers
- Mapping TCP/IP to OSI
- TCP/IP Communications

Section C: IP Addresses

- MAC Addresses
- IP Addresses
- Subnet Mask
- IP Address Clauses
- Subnet Mathematics

Section D: Addressing Your Network

- Static Addresses
- Dynamic Addresses
- Assigning Addresses
- Assign Static Address
- Alternate Configuration
- Advanced IP Properties
- Configure Advanced Settings

Section E: Dynamic Addressing

- APIPA
- Using APIPA
- DHCP
- DHCP Process
- DHCP Scopes
- DHCP Superscopes

Section F: Implementing DHCP

- DHCP Authorization
- Create Scope
- Configure Client
- Create Reservation

Session 2

Section A: Managing DHCP

- Reconcile Scopes
- Backup DHCP
- DHCP Relay Agent
- Install Relay Agent

- Configure Relay Agent
- Section B: IP Address Troubleshooting
 - DHCP Problems
 - Troubleshooting Tools
 - Conflict Detection
 - DHCP Authorization
 - Client IP Problems
- Section C: Name Resolution
 - DNS History
 - Authority/Delegation
 - Zones/Domains
 - DNS Namespace
 - DNS Servers
 - DNS Zone Types
- Section D: Install DNS Servers
 - Install DNS
 - Configure DNS Servers
 - Configure DNS Options
 - Server Properties
 - Configure Forwarding
- Section E: Configuring Zones
 - Choose Zone Type
 - Active Directory Integration
 - Create Zone
 - Zone Properties
 - Create DNS Records
 - Delegate Domain
- Section F: Monitor & Troubleshoot DNS
 - Monitoring DNS
 - Event Viewer
 - Debug Logging
 - Nslookup
 - Aging & Scavenging
 - Troubleshoot Name Resolution

Session 3

- Section A: Remote Access
 - Types of Connectivity
 - Configure Remote Access
 - Configure Modem
 - Configure RRAS
 - RRAS Properties
 - Ports
- Section B: Virtual Private Networks
 - PPTP
 - L2TP/IPSec
 - Configure Security
 - IP Settings
 - Configure Client
 - IPSec Settings
 - Access Network
- Section C: Remote Access Policies
 - RRAS User Authentication
 - Configure Logging
 - User Properties
 - Remote Access Policies
 - Configure Policies
 - Policy Properties

- Verify Policy
- Section D: Internet Authentication Service
- RADIUS
 - Authentication
 - Configure IAS Server
 - RADIUS Clients
 - IAS Policies
 - Authorize Server
 - Configure
- Section E: Troubleshooting Remote Access
- Common Problems
 - VPN Security
 - Packet Filters
 - Test Filters
- Section F: Routing Introduction
- IP Routing
 - Routing Protocols
 - RIP Routing
 - OSPF Routing
 - Static Routing

Session 4

- Section A: Implementing Routing
- Managing IP Routing
 - Routing Protocols
 - Routing & Remote Access
 - Static Routing
 - Verify Static Route
 - Dynamic Routing
 - Configure Outbound
 - Configure Inbound
- Section B: Demand-Dial Routing
- Usage
 - Configure DDR
 - Dial-In Setup
 - Dial-Out Setup
 - Two-way Connection
 - Dynamic Routes
 - Configure Remote
 - Demand-Dial Interface
- Section C: Secure Remote Access
- VPNs
 - Corporate VPN
 - VPN Credentials
 - VPN Properties
 - IP Addressing
 - Branch VPN
 - Verify VPN Connection
 - Filtering/Rules
- Section D: ICS NAT
- Address Translation
 - Connection Sharing
 - ICS/ICF Set-Up
 - Advanced Setting
 - ICS/ICF Services
- Section E: RRAS NAT
- Implementation
 - Configuring

- ICF/ICS Conflict
 - Enable RRAS NAT
 - Public/Private
 - NAT Properties
 - Using NAT
- Section F: Troubleshooting Routing
- RRAS
 - Demand-Dial
 - NAT
 - Event Logging
 - Trace Log

Session 5

Section A: Security Templates

- Baseline
- Add Security MMC
- Built-in Templates
- Create Template
- Implement Template
- Import Templates
- Applying Templates

Section B: IPsec

- IPsec Process
- IPsec Protocols
- Transport Mode
- Tunnel Mode
- Integrity/Encryption
- Authentication

Section C: Configure IPsec

- Implementation
- Actions/Rules
- Using IPsec
- IP Filter List
- Filter Actions
- Create Policy
- Assign Policy
- Verify

Section D: Troubleshoot IPsec

- IP Security Monitor
- Tracking IPsec
- Solve/Verify
- View Policy
- Update Policy
- QuickMode

Section E: Monitoring

- Tools
- Network Performance
- Network Diagnostics
- Network Monitor
- Capture VPN Traffic
- Analyze Data
- Troubleshooting Tools

Section F: Troubleshooting Services

- Services
- Failure Actions
- Service Console
- SC Command

Managing a Network Environment

Session 1

Section A: Introduction

- Course Overview
- Windows 2003 Family
- Windows 2003 Editions
- Standard & Enterprise
- Datacenter & Web

Section B: Installation

- Prerequisite Knowledge
- Hardware Requirements
- Clean Installations
- Upgrade Installations
- Upgrading NT 4.0 Domains
- NT 4.0 Upgrade Issues
- NT 4.0 Upgrade Order
- Upgrading to Active Directory

Section C: Upgrading Windows 2000

- Active Directory
- Adprep/forestprep
- Adprep/domainprep
- Set Up Server 2003
- Windows Setup
- Verify Upgrade
- Functional Levels
- Domain/Forest Levels

Section D: Hardware Support

- Server Class Hardware
- Standard/Wireless
- USB Devices
- View Devices
- Optical Drives
- Hardware Installation
- Driver Signing
- Unsigned Drivers

Section E: Troubleshoot Hardware

- Hardware Problems
- Add Hardware Wizard
- Update Drivers
- Audio
- HAL/Computer Driver
- Other Tools

Session 2

Section A: Server 2003

- Hard Drives
- Basic Disks
- Dynamic Disks
- More on Basic Disks
- Basic to Dynamic
- Dynamic Conversion

Section B: Basic Dynamic Volumes

- Volume Types
- Spanned vs. Striped
- Disk Management
- Simple Volume
- Spanned Volume
- Striped Volume

Section C: Fault Tolerant Volumes

- Mirrored Volume
- RAID-5 Volume
- Configure Mirror
- Configure RAID-5

Section D: Managing Volumes

- Disk Management Console
- Mount into Directory
- Storage Commands
- DiskPart Utility
- Defrag Utility
- Schedule Defrag

Section E: File Systems

- FAT/FAT32
- NTFS
- NTFS-Based Features
- Format NTFS
- Format FAT32
- File Permissions

Section F: Computer Accounts

- Access Server Resources
- Join Domains
- Create Accounts
- Log onto Domain
- Computer Management
- Computer Account Issues
- DNS Settings
- Reset Account

Session 3

Section A: User Accounts

- Basic Building Block
- Authentication
- Create Users
- Local User Account
- Active Directory Users
- User Properties
- Verify Resource Access

Section B: Advanced User Accounts

- Create Users Quickly
- Create Template
- Copy Template
- net User Command
- dsadd User Command

Section C: User Account Properties

- Properties
- Account Tab
- Profile Tab
- Account Policies
- Password Policy
- Account Lockout Policy

Section D: User Profiles

- Roaming Profile
- Mandatory Profile
- Add Roaming Profile
- Save Profile
- Add Mandatory Profile

Section E: Groups

- Group Categories
- Group Scope

- Windows 2000 Mixed Mode
- Domain Local Group
- Global & Universal Groups
- Domain Groups
- Forest Groups
- Section F: Managing Groups
- Control Access
- Add Users · Create Group
- Change Group Scope
- Move Users or Groups
- AD Automation

Session 4

Section A: NTFS Permissions

- Local File Access
- Permission Inheritance
- Grant Permissions
- Advanced Permissions
- Modify Inheritance
- Effective Permissions

Section B: Share Permissions

- Create Share
- Real World Permissions
- Modify Permissions
- Troubleshooting

Section C: NTFS Features

- Ownership
- View Ownership
- Take Ownership
- Compression
- Quotas
- Apply Compression
- Set Quota
- Test Quota Entries

Section D: Printers

- Permissions
- Print Devices
- Sharing
- Setting Up
- Install on Server
- Share Permissions
- Install on Client
- Manage Printers
- Print Queue
- Print Server Properties

Section E: Windows Licensing

- Site Licensing
- Licensing Tool
- Verify Licensing
- Licensing Server
- Licensing Modes

Section F: Software Update Services

- Install SUS
- Administrative Interface
- Service Packs

Session 5

Section A: Remote Administration

- Remote Tools
- Install Help
- Add Computer Management
- Remote Assistance
- Using Remote Assistance

Section B: Remote Desktop

- Implementing
- Connection
- Enable & Add Users
- Remote Connection
- Options
- Remote Control

Section C: Web Server

- Web Services
- IIS 6.0
- Install IIS
- Manage Server
- Securing IIS

Section D: Monitoring Servers

- Monitoring Tools
- System Monitor
- Remote Monitoring
- Performance Logs
- Log/Schedule Properties
- Create Logs/Alerts
- View Logs
- Performance Guidelines

Section E: Shadow Copies

- Requirements
- Enable Shadow Copies
- Settings
- Restore Shadow Copies

Section F: Backup

- Backup Options
- Removable Storage
- Backup Process
- Advanced Options
- Scheduled Backups
- Restore Options
- Restore Active Directory
- Restore Data

Section G: Disaster Recovery

- Basic Elements
- Redundancy
- ASR
- Using ASR

Windows XP Professional

Session 1

Section A: Introduction

- Installing & Using Windows XP
- XP Networking
- Hardware Requirements
- Hardware Reality

Section B: Installing Windows XP

- Installation Modifiers
- GUI-Mode Installation
- Dynamic Update

- Product Activation
- Section C: Upgrading Windows XP
 - Requirements
 - Upgrade Issues
 - Perform Upgrade
 - System Compatibility
 - Logging onto Windows XP
- Section D: Migrating User Settings
 - File & Settings Transfer Wizard
 - User Transfer Wizard
 - User State Migration Tool
- Section E: Unattended Installation
 - Setup Manager
 - Using Setup Manager
 - User Specific Information
 - Advanced Settings
 - Cloning Windows XP
 - Sysprep Options
- Section F: Remote Installation Services
 - Setting Up RIS
 - RIS Permissions
 - Installing with RIS
 - RIS Limitations
- Section G: Installation Troubleshooting
 - Install Problems
 - Check HCL
 - ACPI Problems
 - Switch HAL

Session 2

- Section A: User Accounts
 - Workgroup vs. Domain
 - Create & Manage Users
 - User Accounts in Workgroup
 - Manage Workgroup Accounts
 - Domain User Accounts
 - Manage Domain Accounts
- Section B: Groups
 - Local Groups & Permissions
 - Built-in Groups
 - System Groups
 - Working with Groups
 - Planning Groups
- Section C: Logging On to Windows XP
 - Domain Environment
 - Workgroup Environment
 - Fast User Switching
 - Enable Fast User Switching
 - Troubleshooting Logon
 - Logon Caching
- Section D: User Profiles
 - Change User Profiles
 - Contents of User Profiles
 - Roaming User Profiles
 - Enable Roaming Profiles
 - Create Profile
 - Copy Profile
 - Set Roaming Profiles

Section E: Local Security Policy

- Manage Account Policies
- User Rights Assignments
- Security Options
- Use Secpol.msc
- Security Templates
- Add & Remove Console Snap In
- Preconfigured Templates

Section F: Group Policy

- Local & Domain Policy
- Group Policy MMC
- Windows XP Group Policy
- Computer Policy
- User Policy
- Test Group Policy

Session 3

Section A: Auditing

- Edit Audit Policy
- Plan Audit Policy
- Requirements for Auditing
- Establish Auditing
- Event Viewer

Section B: Windows Installer

- Benefits
- Publish vs. Assign
- Troubleshoot Windows Installer

Section C: User Interface

- Configuring the Desktop
- Start Menu
- My Computer
- Display Properties
- Control Panel

Section D: Interface Options

- Accessibility Services
- Configure Accessibility Services
- Multi-language Support
- Regional Settings Control Panel

Section E: Hardware Installation

- Device Drivers
- Device Manager
- Signed Drivers

Section F: Hardware Support

- Display Devices
- Troubleshooting Video Problems
- Fax Support
- Install & Setup Fax Service
- USB & Firewire Support
- USB Root Hub & Universal Host Controller

Section G: Mobile Computer Hardware

- Power Management
- Configure Power Management
- Wireless Networking

Section H: Storage Devices

- Hard Disk Support
- Dynamic Volumes
- Disk Management
- Create Volume

- Upgrade to Dynamic Disk
- CD, CDR & DVD

Session 4

Section A: File Systems

- NTFS
- Convert to NTFS
- File System Maintenance
- File System Tools

Section B: Simple NTFS

- NTFS Features
- Simple File Sharing
- Limits of Simple File Sharing
- Protecting Folders

Section C: NTFS

- NTFS Permissions
- Planning Permissions
- Add Groups to Permission List
- Effective User Permissions
- NTFS Ownership
- Take Ownership

Section D: NTFS Features

- NTFS Compression
- Compressing Files
- NTFS Encryption
- EFS Features
- Encrypt Files
- Remote Encryption
- Web DAV

Section E: EFS Recovery

- Recover Encrypted Data
- DRA Policy
- Encrypt Files with DRA
- Lost Certificates
- EFS & Backup Program
- Disable EFS

Section F: Networking Setup

- NWLink
- TCP/IP
- NetBEUI
- Network Connections Control Panel
- TCP/IP Configuration
- DNS & Wins
- TCP/IP Options
- Advanced TCP/IP Options

Session 5

Section A: Network Troubleshooting

- Repair Network Connection
- Network Interface
- Protocols
- TCP/IP Troubleshooting
- PING, TRACERT & NBTSTAT
- Base Connectivity
- NETSTAT

Section B: Sharing Resources

- Sharing Folders & Files

- Enable File Sharing
- View Local Security Policy
- Set Share Permissions
- Permission Hierarchy
- Set Permission for Sharing
- Set NTFS Security
- Section C: Monitoring Shared Resources
- Computer Management MMC
- Run As Option
- Managing Shares
- Connect to Remote Shares
- Section D: Offline Folders
- Configure Offline Folders
- Make Files Available Offline
- Network Connection Lost
- Network Connection Established
- Folder Options
- Synchronization Manager
- Section E: Configure Printers
- Sharing Printers
- Install a Printer
- Add Printer Wizard
- Printer Sharing
- Printer Permission
- Internet Printing
- Locate & Connect to Internet Printers
- Section F: Managing Printers
- Print Server Properties
- Print Queue
- Printer Properties
- Print Priorities
- Spooler
- Section G: Remote Connectivity
- Dial-up Networking
- New Connection Wizard
- VPN
- L2TP Connections
- Setup VPN Connection
- VPN Properties

Session 6

Section A: Internet Connection Utilities

- Internet Connection Sharing
- Options for ICS
- ICS Discovery & Control
- Install ICS
- Network Setup Wizard
- Enable ICS
- Universal PnP
- Internet Connection Firewall
- Log Files & Third Party Firewall
- Enable ICF
- Setup NAT & ICF Security

Section B: Web Services

- Web Server
- Install IIS
- Internet Explorer Security
- Accessing IIS Local Host

- Security Settings
- Manage IIS
- Section C: Remote Desktop
 - Terminal Services
 - Configure Remote Desktop
 - Connect to Remote Desktop
 - Web-based Remote Desktop
 - Using Remote Desktop on the Web
 - Remote Assistance
- Section D: System Performance
 - Application Performance
 - Performance Options
 - Program Compatibility
 - Performance Monitoring
 - Monitor Disk & Network
- Section E: Windows Backup
 - Backup Permissions
 - Using Windows Backup
 - Backup Options
 - Scheduled Backups
 - Automated System Recovery
 - Removable Storage
- Section F: Disaster Recovery
 - Safe Boot Options
 - Last Known Good Configuration
 - MSCONFIG Utility
 - Recovery Console
 - Limitations
 - Enable Recovery Console
 - Access Recovery Console