

An Introduction to VMware: Exploring Virtualization

Length: 4 Days

Summary: This course provides participants with a comprehensive introduction to the various features of VMware virtualization technologies.

Target Audience: IT Professional who needs to implement VMware virtualization technologies.

COURSE CONTENT

Module 1: Introduction to VMware Virtualization

- Topic 1: The Need for Virtualization
- Topic 2: The Rapid Growth of Virtualization
- Topic 3: A Brief History of VMware
- Topic 4: VMware Products and Technologies
- Topic 5: The Rise of the Hypervisor
- Topic 6: Virtualization and vSphere Components

Module 2: VMware Workstation

- Topic 1: Features and Functionalities
- Topic 2: Technology and Architecture
- Topic 3: Installation
- Topic 4: Configuration
- Topic 5: Virtual Networking
- Topic 6: Migrating and Cloning

Module 3: VMware Workstation Administration

- Topic 1: Understanding the File System
- Topic 2: Maintenance

Topic 3: Administration

Topic 4: Isolation and Encapsulation

Topic 5: Best Practices

Module 4: VMware ESXi Server

- Topic 1: Features and Functionalities
- Topic 2: Technology and Architecture
- Topic 3: Hardware Virtualization
- Topic 4: Interface to Hardware
- Topic 5: Service Console
- Topic 6: Linux Dependencies

Module 5: VMware ESXi Installation

- Topic 1: System Requirements
- Topic 2: Planning your Virtualized Environment
- Topic 3: Deployment Methods
- Topic 4: Nested Virtualization
- Topic 5: ESXi Server Installation

Module 6: VMware ESXi Configuration

- Topic 1: Configuring Local Storage
- Topic 2: Introduction to VMFS Datastores
- Topic 3: Introduction to VMFS Volumes
- Topic 4: Understanding SAN Storage
- Topic 5: Physical vs. Virtual NICs
- Topic 6: Physical vs. Virtual Switches
- Topic 7: Configuring Networking and VLANs
- Topic 8: Configuring iSCSI Targets
- Topic 9: Resource Pools and Allocations

Module 7: VMware ESXi Virtual Machines

- Topic 1: What is a Guest Environment?
- Topic 2: Designing the Environment
- Topic 3: Guest Operating Systems
- Topic 4: ISO Images and Virtual Media
- Topic 5: Guest Machine Networking
- Topic 6: Guest Resource Usage
- Topic 7: Introduction to VMDK Files
- Topic 8: VMware Guest Tools
- Topic 9: Creating a Guest Virtual Machine

Module 8: Introduction to VMware vCenter

- Topic 1: The Benefits of vCenter
- Topic 2: vCenter Product Family
- Topic 3: Centralized Control and Management
- Topic 4: vCenter Deployment
- Topic 5: System Requirements
- Topic 6: Best Practices

Module 9: Deploying VMware vCenter

- Topic 1: Virtualizing vCenter

Topic 2: vCenter Installation

Topic 3: Creating a Virtual Datacenter

Topic 4: Managing ESXi vSphere Hosts

Topic 5: Introduction to High Availability

Topic 6: Introduction to vNetwork Distributed Switches

Topic 7: Introduction to vDS Policies

Topic 8: Performing Basic Monitoring

Topic 9: Performing Basic Troubleshooting