

VMware vSphere V6.0 : Design and Deploy Fast Track

Duration 5 Days

OVERVIEW

This extended-hours training course equips you with the knowledge, skills, and abilities to design and deploy a VMware vSphere® 6.0 virtual infrastructure. You follow a proven approach to design and deploy a virtualization solution that is available, scalable, manageable, and secure, and that uses VMware best practices.

This course discusses the benefits and risks of available design alternatives and provides information to support making sound design decisions.

In this course, you practice your design skills by working with peers on a design project. You also deploy components of a completed vSphere design.

This course is based on VMware ESXi™ 6.0 and VMware vCenter Server™ 6.0.

OBJECTIVES:

By the end of the course, you should be able to meet the following objectives:

- Assess the business and application requirements of the current environment
- Understand and apply a framework to a design
- Analyze design choices and best-practice recommendations
- Design and deploy the core management infrastructure for an enterprise
- Design and deploy the virtual data center for an enterprise
- Design and deploy the compute infrastructure for an enterprise
- Design and deploy the storage and networking infrastructures for an enterprise
- Design and deploy virtual machines to run applications in a vSphere infrastructure
- Design and deploy security, management, and recoverability features for an enterprise

INTENDED AUDIENCE:

Experienced system integrators; consultants responsible for designing and deploying vSphere environments

PREREQUISITES:

Completion of the following courses:

- VMware vSphere: Install, Configure, Manage [V6.0]
- VMware vSphere: Optimize and Scale [V6.0]

Or equivalent experience with vSphere deployments

OUTLINE:**Course Introduction**

- Introductions and course logistics
- Course objectives

Infrastructure Assessment

- Define customer business objectives
- Gather and analyze business and application requirements
- Document design requirements, constraints, assumptions, and risks
- Use a systematic method to evaluate and document design decisions
- Create a conceptual design

Core Management Infrastructure

- Determine the number of vCenter Server instances to include in a design
- Choose appropriate platforms for vCenter Server components and databases
- Design a vCenter Server deployment topology that is appropriate for the size and requirements of the data center
- Review a core management infrastructure design and deploy it as designed

Virtual Data Center Infrastructure

- Calculate total capacity requirements for a design
- Create a virtual data center cluster design that meets business and workload requirements
- Evaluate the use of various management services, such as VMware vSphere® High Availability and VMware vSphere® Distributed Resource Scheduler™, in the virtual data center design
- Evaluate the use of resource pools in the virtual data center design
- Deploy virtual data center components for the given vSphere design

Compute Infrastructure

- Create a compute infrastructure design that includes the appropriate ESXi boot, installation, and configuration options
- Choose the ESXi host hardware for the compute infrastructure
- Review a compute infrastructure design and deploy it as designed
- Configure and run a script to automate ESXi host installation

Storage Infrastructure

- Calculate storage capacity and performance requirements for a design
- Evaluate the use of different storage platform and storage management solutions
- Design a storage platform and storage management architecture that meets the needs of the environment

- Review a storage platform design and deploy it as designed
- Review a storage management design and deploy it as designed

Network Infrastructure

- Evaluate the use of different network component and network management solutions
- Design a network component architecture that includes information about network segmentation and virtual switch types
- Review a network component design and deploy it as designed
- Design a network management architecture that meets the needs of the environment
- Review a storage management design and deploy it as designed

Virtual Machine Design

- Make virtual machine design decisions, including decisions for resources
- Design virtual machines that meet the needs of the applications in the environment
- Review a virtual machine design and deploy it as designed

Infrastructure Security

- Make security design decisions for various layers in the vSphere environment
- Design a security strategy that meets the needs of the vSphere environment
- Review an infrastructure security design and deploy it as designed

Infrastructure Manageability

- Make VMware vSphere® Update Manager™ design decisions that meet the requirements of the data center
- Review a vSphere Update Manager architecture design and deploy it as designed
- Make infrastructure management design decisions for the required areas
- Design an infrastructure management strategy that meets the needs of the vSphere environment
- Review an infrastructure management design and deploy it as designed

Infrastructure Recoverability

- Make infrastructure recoverability design decisions in the required areas
- Design an infrastructure recoverability strategy that meets the needs of the vSphere environment
- Review an infrastructure recoverability design and deploy it as designed