

VMWARE VSPHERE: INSTALL, CONFIGURE, MANAGE [V7]



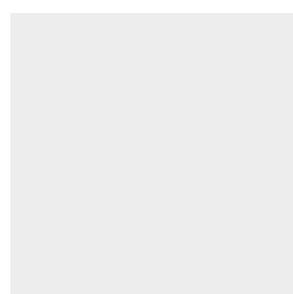
Course Level:
Professional

Course Duration:
5 Days

Course Overview:

This five-day training on VMware vSphere: Install, Configure, Manage [V7] course from CloudThat teaches candidates how they can install, configure, and manage VMware vSphere 7, including VMware ESXi 7 and VMware vCenter Server 7. Taking this course prepares candidates on how to administer a vSphere infrastructure for an organization of any size. This professional-level VMware course lays the foundation for most of the other VMware technologies in the software-defined data center.

By enrolling in our VMware vSphere: Install, Configure, Manage [V7] training program, learners will acquire the necessary skills and knowledge to pass the final exam successfully. Candidates attending our training get access to the authored curriculum and can learn through engaging and interactive sessions delivered by VMware certified in-house trainers.



Product Alignment

- VMware ESXi 7.0
- VMware vCenter Server 7.0

Prerequisites

This course has the following prerequisites:

- System administration experience on Microsoft Windows or Linux operating systems

Objectives

-  Describe the software-defined data center (SDDC)
-  Explain the vSphere components and their function in the infrastructure
-  Describe the benefits and capabilities of VMware Skyline
-  Install and configure ESXi hosts
-  Deploy and configure VMware vCenter® Server Appliance
-  Use VMware vSphere Client to manage the vCenter Server inventory and the vCenter Server configuration
-  Manage, monitor, back up, and protect vCenter Server Appliance
-  Create virtual networks with vSphere standard switches

- 
- Describe the storage technologies supported by vSphere
 - Configure virtual storage using iSCSI and NFS storage
 - Create and manage VMware vSphere VMFS datastores
 - Use the vSphere Client to create virtual machines, templates, clones, and snapshots
 - Create a content library and deploy virtual machines from templates in the library
 - Manage virtual machine resource use
 - Migrate virtual machines with VMware vSphere vMotion and VMware vSphere Storage vMotion
 - Create and manage a vSphere cluster that is enabled with VMware vSphere High Availability
 - VMware vSphere Distributed Resource Scheduler
 - Discuss solutions for managing the vSphere life cycle
 - Use VMware vSphere Lifecycle Manager to perform upgrades to ESXi hosts and virtual machines.

Certifications

Attending this course meets the training requirement to achieve the following certification:

- VMware Certified Professional – Data Center Virtualization (VCP-DCV)
- 

Want to make a career in virtualization? Move up the corporate ladder with a list of VMware cloud certifications from CloudThat. Grab up to **30% discount** on any of our 45+ VMware certification courses.

[Enroll Today!](#)

Course Outline

Module 1: Course Introduction

Topics

- Introductions and course logistics
- Course objectives

Module 2: Introduction to vSphere and the Software-Defined Data Center

Topics

- Explain basic virtualization concepts
- Describe how vSphere fits into the software-defined data center and the cloud infrastructure
- Explain how vSphere interacts with CPUs, memory, networks, and storage

Module 2: Introduction to vSphere and the Software-Defined Data Center

Topics

- Recognize the user interfaces for accessing the vCenter Server system and ESXi hosts
- Describe the ESXi host architecture
- Navigate the Direct Console User Interface (DCUI) to configure an ESXi host
- Install an ESXi host
- Use VMware Host Client to configure ESXi host settings
- Describe how to proactively manage your vSphere environment using VMware Skyline

Course Outline

Module 3: Virtual Machines

Topics

- Create and provision a virtual machine
- Explain the importance of VMware Tools
- Install VMware Tools
- Identify the files that make up a VM
- Recognize the components of a VM
- Recognize virtual devices supported by a VM
- Describe the benefits and use cases for containers
- Identify the parts of a container system

Module 5: Configuring and Managing Virtual Networks

Topics

- Create and manage standard switches
- Describe the virtual switch connection types
- Configure virtual switch security, traffic-shaping, and load-balancing policies

Module 4: vCenter Server

Topics

- Describe the vCenter Server architecture
- Discuss how ESXi hosts communicate with vCenter Server
- Deploy and configure vCenter Server Appliance
- Use vSphere Client to manage the vCenter Server inventory
- Add data center, organizational objects, and hosts to vCenter Server
- Use roles and permissions to enable users to access objects in the vCenter Server inventory
- Back up vCenter Server Appliance
- Monitor vCenter Server tasks, events, and appliance health
- Use VMware vCenter Server High Availability to protect a vCenter Server Appliance

Module 5: Configuring and Managing Virtual Networks

Topics

- Compare vSphere distributed switches and standard switches

Module 6: Configuring and Managing Virtual Storage

Topics

- Identify storage protocols and storage device types
- Discuss ESXi hosts using iSCSI, NFS, and Fibre Channel storage
- Create and manage VMFS and NFS datastores
- Explain how multipathing works with iSCSI, NFS, and Fibre Channel storage
- Recognize the components of a VMware vSAN configuration

Module 8: Resource Management and Monitoring

Topics

- Discuss CPU and memory concepts in a virtualized environment
- Describe what overcommitment of a resource means
- Describe methods for optimizing CPU and memory usage
- Use various tools to monitor resource use
- Create and use alarms to report certain conditions or events

Module 7: Virtual Machine Management

Topics

- Use templates and cloning to deploy new virtual machines
- Modify and manage virtual machines
- Create a content library and deploy virtual machines from templates in the library
- Use customization specification files to customize a new virtual machine
- Perform vSphere vMotion and vSphere Storage vMotion migrations
- Describe the Enhanced vMotion Compatibility feature
- Create and manage virtual machine snapshots
- Examine the features and functions of VMware vSphere Replication
- Describe the benefits of VMware vSphere Storage APIs – Data Protection

Module 9: vSphere Clusters

Topics

- Describe the functions of a vSphere DRS cluster
- Create a vSphere DRS cluster
- Monitor a vSphere cluster configuration
- Describe options for making a vSphere environment highly available
- Explain the vSphere HA architecture
- Configure and manage a vSphere HA cluster
- Examine the features and functions of VMware vSphere Fault Tolerance
- Describe the function of the vSphere Cluster Service

Module 10: vSphere Lifecycle Management

Topics

- Recognize the importance of vCenter Server Update Planner
- Describe how VMware vSphere Lifecycle Manager works
- Describe how to update ESXi hosts using baselines
- Validate ESXi host compliance using a cluster image
- Describe how to upgrade VMware Tools and VM hardware
- Describe VMware vSphere Lifecycle Manager and VMware vSAN integration

Who should Enroll for this Course?

- System administrators
- System engineers

About CloudThat

CloudThat is the first company in India to offer Cloud Training & Consulting services for mid-market & enterprise clients from across the globe. Since our inception in 2012, we have trained over 500K+ IT professionals from fortune 500 companies on technologies such cloud, Artificial Intelligence, Machine Learning, IoT, OpenStack, OpenShift, DevOps, MongoDB, Big Data and more.

Through sheer dedication and excellence in the field of cloud training, CloudThat has recently being recognized as **VMware Authorized Training Reseller**. In addition, CloudThat is a proud Microsoft Gold Partner, AWS Advanced Consulting Partner, Google Cloud Platform Partner, and Databricks Partner. Recently, we have won the Microsoft Asia Superstar Campaign for India-2021 for being a global leader in providing cloud training and consultancy services with exemplary track record.

Our Success Track

10+ Years
of Experience

100+
Corporates served

28+
countries catered

500K+
Professionals trained

200+
Projects delivered

350+
Cloud certifications

To know more about our VMware certification training, email at sales@cloudthat.com or call us at +918880002200.