

Enterprise Computing Solutions - Education Services

TRAINING OFFERING

Du kan nå oss här

Kronborgsgränd 7, 164 46 Kista

Email: edu.ecs.se@arrow.com Phone: +46 8 555 188 00



VMware vCloud NFV with vCloud Director [V9.7]

CODE: LENGTH: PRICE:

VMW NFVVCD97 40 Hours (5 days) kr46,000.00

Description

This five-day, hands-on training course discusses Network Functions Virtualization (NFV), a network architecture concept that specifies how virtualization technologies can be used to virtualize network service functions.

This course also covers interfacing VMware vCloud Director® with other systems using various APIs and the integration and use of VMware vCloud® Availability for vCloud Director®. You will also understand how to manage multisite, cross-VDC (Virtual Data Center) networking for vCloud Director and how to configure Central Point of Management (CPOM) to define a software-defined datacenter (SDDC) for tenant and provider users of vCloud Director. This course also discusses how to monitor various vCloud Director objects using VMware vRealize® Operations™, Tenant vApp, and VMware vRealize® Log Insight™

Objectives

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

- Describe the VMware vCloud® NFV™ architecture
- Describe the vCloud Director architecture as Virtualized Infrastructure Manager (VIM)
- · Secure the deployment of multivendor virtual network functions (VNFs) on the vCloud NFV platform
- Manage vCloud Director to support NFV workloads in a secure, multitenant environment
- Configure VMware vSAN™ to enable multiple tiers in provider virtual data centers
- Create and manage vCloud Director organizations and vApps to satisfy business needs
- · Create and manage vCloud Director catalogs
- · Use advanced services to manage VMware NSX® from vCloud Director

Audience

Customers, cloud architects, systems engineers, data center administrators, and cloud administrators with experience in managed services or managing a service provider environment

Prerequisites

Completion of the following course is required:

- VMware vSphere: Install, Configure, Manage [V6.x] or equivalent knowledge Completion of the following eLearning courses is recommended:
- VMware vCloud Director: Fundamentals [V8.x]
- · VMware vSAN and HCI Fundamentals
- · VMware Network Virtualization Fundamentals

Substantial knowledge of TCP/IP networking is helpful.

Programme

2 vCloud NFV Overview

- 1 Course Introduction Define the benefits of vCloud NFV
- Introductions and course logistics Describe a sample vCloud NFV solution
- Course objectives
 Describe the vCloud NFV architecture
- 3 NFV Infrastructure
- · Compare physical and virtual infrastructures
- · Describe the advantages and components of the NFV infrastructure (NFVI)
- Explain the role of network virtualization in the NFVI
- · Compare physical and virtual infrastructures
- · Describe the vSAN architecture and the differences between the vSAN hybrid and all-flash architectures
- Explain the purpose of virtual machine storage policies
- · Describe network virtualization with NSX

- 4 Virtualized Infrastructure Manager (VIM)
- · Describe the VMware products for the VIM layer
- · Explain basic concepts related to vCloud Director
- Describe the relationship between provider VDCs (Virtual Data Centers) and organization VDCs
- · Describe how vSAN integrates with vCloud Director
- · Create vSAN storage policies
- · Describe the components and basic configuration of the vCloud Director architecture
- · Create resource pools
- 5 vCloud Providers
- Describe how compute and storage resources are provided to vCloud Director
- · Describe provider VDC requirements and best practices
- · Create provider VDCs
- · Describe the VNF on-boarding process
- 6 vCloud Director Organizations
- · Describe and create vCloud Director organizations
- Discuss vCloud Director HTML5 UI
- · Discuss HTML5-based provider portal
- · Discuss tenant portal
- · Discuss the use cases of a vCloud Director organization VDC
- · Discuss organization VDC allocation models
- · Recognize resource allocations for an organization
- · Examine the function and requirements of network pools.
- · Describe the network types available in vCloud Director (external, organization, and vApp)
- · Discuss the organization network types
- · Create and manage organization VDC networks
- · Add a catalog to an organization
- · Populate, share, and publish catalogs
- · Manage access to vApps and catalogs
- Modify the configuration of vApps and their virtual machines (VMs)
- · Manage organization VDC networking
- · Create affinity and anti-affinity rules
- 7 vCloud Director Security
- · Describe role-based access
- · Create custom security roles
- · Integrate Directory Service with vCloud Director
- · Integrate LDAP, SAML, SSL, Kerberos, and OAuth2 with vCloud Director
- Configure SSO
- 8 vCloud Director Networking
- · Describe the use and placement of NSX® EdgeTM services gateways in relation to vCloud Director
- Review routing with the distributed logical router and Edge services gateways in combination with vCloud Director
- · Firewall management in vCloud Director with Edge services gateways and the distributed firewall
- Architecture of VMware NSX-T™ (Basic)
- · vCloud Director supported features of NSX-T
- · Discuss multisite
- · Configure Cross VDC networking
- 9 Resource Management and Monitoring
- · Manage provider and organization VDCs
- Manage VMware vCenter Server® instances and VMware ESXi™ hosts
- Manage vSphere datastores
- · Manage resource pools at the vSphere level
- · Monitor usage information at provider and organization VDCs
- · Use the cell management tool
- · Manage provider VDC and Org-VDC
- Monitor vCloud Director environments with VMware vRealize® Operations Manager™
- Monitor vCloud Director environments with vRealize Log Insight
- · Describe the components for NVFI operations management
- Use VMware vRealize® BusinessTM for cost management
- Review historical virtual machine metrics in vCloud Director
- View vCloud Director logs
- 10 vCloud Extensibility
- · Introduce container service extension
- · Explore vCloud Director CLI
- Use Python SDK for vApp deployment
- · Discuss Terraform vCloud Director capabilities

- 11 Day 2 Operations
- Identify log locations for vCloud Director
- Use VMware vRealize® OrchestratorTM Plug-in for vCloud Director Navigate through vCloud Director logs

Session Dates

Ytterligare information

Denna utbildning finns också som utbildning på plats. Kontakta oss för mer information.