

VMWA-34 - VMWARE NSX: INSTALL, CONFIGURE, MANAGE [V4.0]

Categoria: VMware

INFORMAZIONI SUL CORSO

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£55

Durata: 5 Giorni

Categoria: VMware

Qualifica Istruttore: VMware Certified Instructor Dedicato a: Professionista IT Produttore: VMware

OBIETTIVI

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

- -Describe the architecture and main components of NSX
- -Explain the features and benefits of NSX
- -Deploy the NSX Management cluster and VMware NSX® Edge™ nodes
- -Prepare VMware ESXi[™] hosts to participate in NSX networking
- -Create and configure segments for layer 2 forwarding
- -Create and configure Tier-0 and Tier-1 gateways for logical routing
- -Use distributed and gateway firewall policies to filter east-west and north-south traffic in NSX
- -Configure Advanced Threat Prevention features
- -Configure network services on NSX Edge nodes
- -Use VMware Identity Manager™ and LDAP to manage users and access
- -Explain the use cases, importance, and architecture of Federation

PREREQUISITI

- -Good understanding of TCP/IP services and protocols
- -Knowledge and working experience of computer networking, including switching and routing technologies (L2 through L3) and L2 through L7 firewall
- -Knowledge and working experience with VMware vSphere® environments
- -Knowledge and working experience with Kubernetes or VMware vSphere® with VMware Tanzu® environments

CONTENUTI

1 Course Introduction

- -Introductions and course logistics
- -Course objectives

2 VMware Virtual Cloud Network and VMware NSX

- -Introduce the VMware Virtual Cloud Network vision
- -Describe the NSX product portfolio
- -Discuss NSX features, use cases, and benefits



- -Explain NSX architecture and components
- -Explain the management, control, data, and consumption planes and their functions.

3 Preparing the NSX Infrastructure

- -Deploy VMware NSX® ManagerTM nodes on ESXi hypervisors
- -Navigate through the NSX UI
- -Explain data plane components such as N-VDS/VDS, transport nodes, transport zones, profiles, and more
- -Perform transport node preparation and configure the data plane infrastructure
- -Verify transport node status and connectivity
- -Explain DPU-based acceleration in NSX
- -Install NSX using DPUs

4 NSX Logical Switching

- -Introduce key components and terminology in logical switching
- -Describe the function and types of L2 segments
- -Explain tunneling and the Geneve encapsulation
- -Configure logical segments and attach hosts using NSX UI
- -Describe the function and types of segment profiles
- -Create segment profiles and apply them to segments and ports
- -Explain the function of MAC, ARP, and TEP tables used in packet forwarding
- -Demonstrate L2 unicast packet flow
- -Explain ARP suppression and BUM traffic handling

5 NSX Logical Routing

- -Describe the logical routing function and use cases
- -Introduce the two-tier routing architecture, topologies, and components
- -Explain the Tier-0 and Tier-1 gateway functions
- -Describe the logical router components: Service Router and Distributed Router
- -Discuss the architecture and function of NSX Edge nodes
- -Discuss deployment options of NSX Edge nodes
- -Configure NSX Edge nodes and create NSX Edge clusters
- -Configure Tier-0 and Tier-1 gateways
- -Examine single-tier and multitier packet flows
- -Configure static routing and dynamic routing, including BGP and OSPF
- -Enable ECMP on a Tier-0 gateway
- -Describe NSX Edge HA, failure detection, and failback modes
- -Configure VRF Lite

6 NSX Bridging

- -Describe the function of logical bridging
- -Discuss the logical bridging use cases
- -Compare routing and bridging solutions
- -Explain the components of logical bridging
- -Create bridge clusters and bridge profiles

7 NSX Firewalls

- -Describe NSX segmentation
- -Identify the steps to enforce Zero-Trust with NSX segmentation
- -Describe the Distributed Firewall architecture, components, and function



- -Configure Distributed Firewall sections and rules
- -Configure the Distributed Firewall on VDS
- -Describe the Gateway Firewall architecture, components, and function
- -Configure Gateway Firewall sections and rules

8 NSX Advanced Threat Prevention

- -Explain NSX IDS/IPS and its use cases
- -Configure NSX IDS/IPS
- -Deploy NSX Application Platform
- -Identify the components and architecture of NSX Malware Prevention
- -Configure NSX Malware Prevention for east-west and north-south traffic
- -Describe the use cases and architecture of VMware NSX® Intelligence™
- -Identify the components and architecture of VMware NSX® Network Detection and Response™
- -Use NSX Network Detection and Response to analyze network traffic events.

9 NSX Services

- -Explain and configure Network Address Translation (NAT)
- -Explain and configure DNS and DHCP services
- -Describe VMware NSX® Advanced Load Balancer™ architecture, components, topologies, and use cases.
- -Configure NSX Advanced Load Balancer
- -Discuss the IPSec VPN and L2 VPN function and use cases
- -Configure IPSec VPN and L2 VPN using the NSX UI

10 NSX User and Role Management

- -Describe the function and benefits of VMware Identity Manager™ in NSX
- -Integrate VMware Identity Manager with NSX
- -Integrate LDAP with NSX
- -Identify the various types of users, authentication policies, and permissions
- -Use role-based access control to restrict user access
- -Explain object-based access control in NSX

11 NSX Federation

- -Introduce the NSX Federation key concepts, terminology, and use cases.
- -Explain the onboarding process of NSX Federation
- -Describe the NSX Federation switching and routing functions.
- -Describe the NSX Federation security concepts.

INFO

Esame: 2V0-41.24 - VMware NSX 4.x Professional --- VMware Certified Professional - Network Virtualization (VCP-NV)

Materiale didattico: Materiale didattico ufficiale VMware in formato digitale

Costo materiale didattico: incluso nel prezzo del corso a Calendario

Natura del corso: Operativo (previsti lab su PC)