

VNSXTDC30-TSHO (VMWARE NSX-T DATA CENTER: TROUBLESHOOTING AND OPERATIONS [V3.0]) 3.0

Objetivo

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

- Use the native tools available in NSX-T Data Center to identify and troubleshoot the problems related to NSX-T Data Center environment
- Use VMware vRealize® Log Insight and VMware vRealize® Network Insight to identify and troubleshoot the problems related to the NSX-T Data Center environment
- Explain the NSX-T Data Center infrastructure components and the communications between them
- Identify, analyze, and troubleshoot the following problems related to the NSX-T Data Center:
 - Management, control, data planes, infrastructure preparation
 - Logical switching and logical routing
 - Identify, analyze, and troubleshoot network security problems related to the NSX-T Data Center Distributed and Gateway firewalls
 - Identify, analyze, and troubleshoot problems related to VPN and load balancer services
 - Identify the components and packet flows involved in the NSX-T Data Center datapath and troubleshoot various problems that could occur in the datapath

Público Alvo

Intended audience

- Experienced system administrators and network administrators
- Network and security professionals who work with enterprise and data center networks

Pré-Requisitos

Prerequisites You should also have the following understanding or knowledge:

- Good understanding of TCP/IP services and protocols
- Knowledge and working experience of computer networking, including:
 - Switching and routing technologies (L2-L3)
 - Network and application delivery services (L4-L7)
- Knowledge and working experience of VMware vSphere® environments and KVM-based environments

Carga Horária

40 horas (5 dias).

Conteúdo Programático

COURSE OUTLINE

1 Course Introduction

- Introductions and course logistics
- Course objectives

2 NSX-T Data Center Operations and Tools

- Explain and validate the native troubleshooting tools (dashboards, traceflow, port mirroring) for the NSX-T Data

Center environment

- Configure syslog, IPFIX, and log collections for the NSX-T Data Center environment
- Integrate NSX-T Data Center with vRealize Log Insight and vRealize Network Insight
- Validate and review the APIs methods available to configure the NSX-T Data Center environment

3 Troubleshooting the NSX Management Cluster

- Describe the NSX Management cluster architecture, components, and communication channels
- Identify the workflows involved in configuring the NSX Management cluster
- Validate and troubleshoot the NSX Management cluster formation

4 Troubleshooting Infrastructure Preparation

- Describe the data plane architecture, components, and communication channels
- Explain and troubleshoot VMware ESXi™ transport node preparation issues
- Explain and troubleshoot KVM transport node preparation issues
- Explain and troubleshoot VMware NSX® Edge™ transport node preparation issues

5 Troubleshooting Logical Switching

- Understand the architecture of logical switching
- List the modules and processes involved in configuring logical switching
- Explain the importance of N-VDS and VDS in transport node
- Review the architecture and workflows involved in configuring
- Identify and troubleshoot common logical switching issues

6 Troubleshooting Logical Routing

- Review the architecture of logical routing and NSX Edge nodes
- Explain the workflows involved in the configuration of Tier-0 and Tier-1 gateways
- Explain the HA modes and logical router placements
- Identify and troubleshoot common logical routing issues

7 Troubleshooting Security

- Review the architecture of the Distributed Firewall
- Explain the workflows involved in configuring the Distributed Firewall
- Review the architecture of the Gateway Firewall
- Explain the workflows involved in configuring the Gateway Firewall
- Identify and troubleshoot common distributed firewall and Gateway Firewall issues

8 Troubleshooting Load Balancing and VPN Services

- Review load balancer architecture and components
- Identify and troubleshoot common load balancing issues
- Review of IPsec and L2 VPN architecture and components
- Identify and troubleshoot common IPsec and L2 VPN issues

9 Datapath Walkthrough

- Verify and validate the path of the packet on the NSX-T datapath (East-West and North-South)
- Identify and perform packet captures at various points in the datapath
- Use nsxcli to retrieve configurations involved in the NSX-T datapath

