Course : VMware, technical solutions overview

Synthesis course - 2d - 14h00 - Ref. VSY
Price : 2020 CHF E.T.

Discover the different infrastructure virtualization solutions based on VMware technologies. This technical overview course will help you understand how to optimally manage and supervise a VMware virtual platform, and how to implement a security policy and Disaster Recovery Plan (DRP) in VMware environments. You will also learn about private and public Cloud Computing through the VMware Cloud.

Teaching objectives

At the end of the training, the participant will be able to:

- Define the fundamental principles of virtualization: concepts, advantages, evolution
- Learn about the different infrastructure virtualization solutions based on VMware technology
- Understand how to supervise and optimize a VMware virtual platform
- Explain the different backup solutions for a VMware virtual infrastructure

Intended audience

IT managers, production managers, operations managers, user relations managers, helpdesk managers, system or network administrators, application managers, project managers...

Prerequisites

Basic knowledge of technical architectures (systems and networks).

Course schedule

PARTICIPANTS
IT managers, production managers, operations managers, user relations managers, helpdesk managers, system or network administrators, application managers, project managers...

PREREQUISITES
Basic knowledge of technical architectures (systems and networks).

TRAINER QUALIFICATIONS
The experts leading the training are specialists in the covered subjects. They have been approved by our instructional teams for both their professional knowledge and their teaching ability, for each course they teach. They have at least five to ten years of experience in their field and hold (or have held) decision-making positions in companies.

ASSESSMENT TERMS
The trainer evaluates each participant's academic progress throughout the training using multiple choice, scenarios, hands-on work and more.
Participants also complete a placement test before and after the course to measure the skills they've developed.

1 Introduction to virtualization

- Definition of virtualization.
- Infrastructure virtualization concepts (servers, networks, storage): what can be virtualized?
- The advantages and limitations of virtual technology.
- The main use cases for virtualization.
- The evolution of the virtualization market.
- The main market players.
- VMware's positioning in relation to other vendors.
- Learn about the different infrastructure virtualization solutions based on VMware technology.

2 VMware vSphere virtualization operating system

- Overview of VMware vSphere architecture.
- Hypervisor overview: features, ESXi hypervisor.
- Managing virtual machines and physical hosts with vCenter.
- The vCenter Server administration server: what it's for, what you can do and what you can't.
- Virtual machines: definition, features and benefits.
- Virtual network management: standard and distributed switches.
- The difference between a real physical network and a virtual network.
- Storage management. Do's and don'ts.

3 VMware vSphere: an overview of advanced features

- VMware vSphere licenses.
- Migration of virtual machines without service interruption (VMotion, Storage VMotion, etc.).
- Overview of VMotion: features and benefits for virtualization.
- Introducing EVC ([Enhanced VMotion Compatibility").
- Optimized resource management (DRS, Storage DRS, Resources Pools, vApp).
- Introducing DRS: features and benefits for virtualization.
- Presentation of Storage DRS: features and benefits for virtualization.
- Introduction to Resources Pools: features and benefits for virtualization.
- Introduction to vApp: features and benefits for virtualization.
- High availability (VMware HA, Fault Tolerance).
- Why implement high availability with VMware?
- VMware vSphere scalability (Auto Deploy, Host Profile, Linked Mode).

4 VMware Horizon Suite: applications and virtual desktops

- The challenges of the virtual workstation.
- Horizon View or the virtual desktop solution.
- Overview of Horizon View: features and benefits for virtualization.
- Application virtualization with ThinApp.
- Introducing ThinApp: features and benefits for virtualization.
- What virtualization brings to mobility.
- Mobility and BYOD (bring your own devices): Horizon Workspace, access to applications and data.

5 VMware and Cloud Computing

- Discover private and public cloud computing through the VMware Cloud.
- Deliver IT services through the VMware Cloud.
- VMware Cloud solution, vCloud Director: features, what it brings to virtualization.
- Introduction to vCloud Connector, the private and public cloud interconnection: features.

6 Supervision and management of virtual infrastructures

- Understand how to monitor and optimize the management of a VMware virtual platform.
- vCenter Operations Management Suite (supervision and management of virtual infrastructures).
- Supervision, prevention and capacity planning with vCenter Operation Manager.
- Application mapping of virtual machines with vCenter Infrastructure Navigator.
- Measure the cost of virtual infrastructure utilization with vCenter Chargeback Manager.
- Automate virtual infrastructure operations with vCenter Orchestrator.

7 Securing and recovering virtual infrastructures

- Understand security and disaster recovery planning for a VMware virtual infrastructure.
- Securing networks and data with vCloud Networking and Security and vShield Endpoint.
- VM (virtual machine) backup.
- What a DRP (Disaster Recovery Plan) is, what it contains, its objective.
- Implementation of a Disaster Recovery Plan (DRP), with vCenter Site Recovery Manager.
- Introduction to vCenter Site Recovery Manager: features and benefits for virtualization.

Dates and locations

REMOTE CLASS
2026 : 31 Mar., 4 June, 17 Sep., 15 Dec.