

DATA CENTER: CISCO UNIFIED COMPUTING (DCICN)

TECHLAN

ACADEMY

DATE: to be confirmed

CONTACT: academy@techlan.it

STUDY BOOK:

PRICE: Request

COURSE OBJECTIVE:

The focus of this skills-building course is on deploying, securing, operating, and maintaining the Cisco Unified Computing System (UCS) and UCS C-Series Rack Servers for use in data centers. The extensively hands-on course covers configuring and managing Cisco UCS servers using unified I/O networking for LAN and SAN connectivity, virtualizing server hardware identifiers to enable rapid recovery of server operating system images, automating UCS deployments using UCS Central Software and Cisco Integrated Management Controller (IMC) Supervisor, configuring fault tolerance, implementing role-based access control (RBAC), backing up and restoring system configurations, and using the monitoring and troubleshooting tools in Cisco UCS Manager and Cisco IMC.

Upon completion of this course, you will be able to:

- Install the UCS B-Series system out of the box and deploy service profiles using pooled identities and service profile templates
- Configure the UCS B-Series system for deployments using iSCSI and configure B- and C-Series systems for deployments using Fibre Channel for regular data access and booting
- Configure and implement security mechanisms such as RBAC with Organizations and Locales, LDAP integration, trusted points, and key rings
- Configure and implement monitoring with syslog and Call Home
- Manage UCS Manager domains with UCS Central, manage multiple C-Series servers with Cisco IMC Supervisor, and interact with the UCS Manager XML API

PREREQUISIT:

It is recommended, but not required, that students have the following knowledge and skills:

- Understanding of server system design and architecture
- Familiarity with Ethernet and TCP/IP networking
- Familiarity with SANs
- Familiarity with Fibre Channel protocol
- Understanding of Cisco Enterprise Data Center Architecture
- Familiarity with hypervisor technologies (such as VMware)

In relation to EXAM:

200-150 DCICN

WHO SHOULD ATTEND

System engineers and technicians who implement Cisco UCS B-Series Blade Servers and Cisco UCS C-Series Rack-Mount Servers

Data center (LAN, SAN, Server) administrators, managers, designers, and engineers

COURSE CONTENT:

MODULE 1: Cisco Unified Computing System Implementation

Cisco UCS Server Form Factors
Cisco Unified Computing System Connectivity
Configuring Identity Abstraction
Configuring Service Profile Templates

MODULE 2: SAN Storage Implementation for Cisco Unified Computing System

Implementing iSCSI
Implementing Fibre Channel Port Channels
Implementing FCoE

MODULE 3: Security Implementation for Cisco Unified Computing System

Implementing Role-Based Access Control
Implementing External Authentication Providers
Implementing Key Management

MODULE 4: Operations and Maintenance for Cisco Unified Computing System

Implementing Cisco UCS Firmware Updates
Implementing Cisco UCS Backups
Implementing Monitoring

MODULE 5: Cisco Unified Computing System Automation

Implementing Cisco UCS Central
Implementing Cisco UCS Director
Comparing Scripting Options for Cisco UCS Manager

LABS:

Lab 1: Access the Remote Lab Environment
Lab 2: Provision Cisco UCS Fabric Interconnect Cluster
Lab 3: Configure Server and Uplink Ports
Lab 4: Configure VLANs
Lab 5: Configure a Cisco UCS Service Profile Using Hardware Identities
Lab 6: Configure Basic Identity Pools
Lab 7: Configure a Cisco UCS Service Profile Using Pools
Lab 8: Configure a Service Profile Template
Lab 9: Configure an iSCSI Service Profile
Lab 10: Configure Pod-Specific Device Aliases
Lab 11: Configure Zoning
Lab 12: Configure VSANs in Cisco UCS Manager
Lab 13: Configure Unified Ports on UCS Fabric Interconnects
Lab 14: Install and Boot VMware ESXi on Cisco UCS C-Series Servers from SAN LUN
Lab 15: Install and Boot VMware ESXi on Cisco UCS B-Series Servers from SAN LUN
Lab 16: Configure Organizations and Locales
Lab 17: Configure Job-Specific Roles
Lab 18: Configure Cisco UCS Manager to Authenticate Users with Microsoft Active Directory
Lab 19: Configure a Trusted Point and KeyRing in Cisco UCS Manager
Lab 20: Perform Backup and Restore Activities
Lab 21: Implement Syslog
Lab 22: Deploy and Use Cisco UCS Central
Lab 23: Deploy and Use Cisco IMC Supervisor
Lab 24: Configure Cisco UCS Manager with XML API and Cisco UCS PowerTools