CLDACI: Building the Cisco Cloud with Application Centric Infrastructure

Course ID #: 1575-988-ZZ-W

Hours: 35

Course Content

Course Description:

Building the Cisco Cloud with Application Centric Infrastructure (CLDACI) v1.0 is a new 5-day ILT course designed to help students prepare for the CCNP Cloud certification, a professional level certification specializing in Cloud technologies. Our Cisco training courses are designed and developed with the learner in mind, making sure that the material covers all of the information you'll need to know in order to complete your Cisco Cloud Certification. This course extensively covers the process of implementing public, private, and hybrid cloud based on Cisco ACI. You'll complete this CCNP training with the knowledge needed to advance your career and work in the Cisco Cloud environment.

At Course Completion:

Upon course completion, you will be able to:

- Describe Cisco Application Centric Infrastructure (ACI) fundamentals
- Integrate Cisco ACI with VM managers
- Implement application policies
- Configure Layer 4 to Layer 7 services
- Extend Cisco ACI to external Layer 3 and Layer 4 connections
- Configure orchestration and automation tools, protocols and application programming interfaces (APIs)

Prerequisites:

You should have the following knowledge before attending this course:

- Good understanding of networking protocols
- Recommend CCNP Certification or equivalent knowledge
- Good understanding of the VMware environment
- Recommend attendance of the VMware vSphere: Install, Configure, Manage (Version 6.0)(VICM)

Deliver Method:

This course is delivered through a mix of instructor-led training (ILT) and hands-on labs.

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Topics:

Module 1: Implement Cisco ACI Fundamentals
- ACI key features
- Nexus 9000 product family
- ACI management networks
- Virtual eXtensible LAN
- API controller
- Tenants
- DHCP relay
- Authentication, authorization and RBAC
- Fabric and access policies
- ACI VMM domains
- Hypervisor normalization
- ACI and VMware VDS
- ACI applications
- Policy model
- Policy driven data center design advantages
- Application profiles
- ACI fabric gateway
- Load balancing

Module 2: Implement Cisco ACI Enhanced Features
- Port channels
- Configuring vPC in ACI
- Cisco application virtual switch (AVS)
    - Characteristics
    - Distributed firewall
    - Mircrosegmentation
    - Installation
    - Configuration
    - Verification
- Inter-tenant communication and contracts
- Layer 4 to layer 7 application profiles
- Layer 4 to layer 7 services programmability

Module 3: Configure Cisco ACI External Connections
- ACI external connections
- Access policies for L3-out
- L3-out configuration
- Layer 2 outside connections
- Layer 2 connection configurations

Module 4: Automate and Design Cisco ACI Deployment
- ACI programmability
- REST API
- Python programmability tools
- UCS director
- ACI migration
- Migration options