Introducing Cisco Data Center Networking (200-150)

Exam Description: The Introducing Cisco Data Center Networking (DCICN) exam (200-150) is a 90-minute, 55–65 question assessment. This exam is one of the exams associated with the CCNA Data Center Certification. This exam tests a candidate’s knowledge of data center physical infrastructure, data center networking concepts, and data center storage networking. The course, Introducing Cisco Data Center Networking v6 (DCICN), will help candidates prepare for this exam, as the content is aligned with the exam topics.

The following topics are general guidelines for the content likely to be included on the exam. However, other related topics may also appear on any specific delivery of the exam. In order to better reflect the contents of the exam and for clarity purposes, the guidelines below may change at any time without notice.

15% 1.0 Data Center Physical Infrastructure
1.1 Describe different types of cabling, uses, and limitations
1.2 Describe different types of transceivers, uses, and limitations
1.3 Identify physical components of a server and perform basic troubleshooting
1.4 Identify physical port roles
1.5 Describe power redundancy modes

23% 2.0 Basic Data Center Networking Concepts
2.1 Compare and contrast the OSI and the TCP/IP models

2.2 Describe classic Ethernet fundamentals
2.2.a Forward
2.2.b Filter
2.2.c Flood
2.2.d MAC address table

2.3 Describe switching concepts and perform basic configuration
2.3.a STP
2.3.b 802.1q
2.3.c Port channels
2.3.d Neighbor discovery
2.3.d (i) CDP
2.3.d (ii) LLDP
2.3.e Storm control

23% 3.0 Advanced Data Center Networking Concepts
3.1 Basic routing operations
3.1.a Explain and demonstrate IPv4/IPv6 addressing
3.1.b Compare and contrast static and dynamic routing
3.1.c Perform basic configuration of SVI/routed interfaces

3.2 Compare and contrast the First Hop Redundancy Protocols
3.2.a VRRP
3.2.b GLBP
3.2.c HSRP

3.3 Compare and contrast common data center network architectures
3.3.a 2 Tier
3.3.b 3 Tier
3.3.c Spine-leaf

3.4 Describe the use of access control lists to perform basic traffic filtering

3.5 Describe the basic concepts and components of authentication, authorization, and accounting

19% 4.0 Basic Data Center Storage
4.1 Differentiate between file and block based storage protocols

4.2 Describe the roles of FC/FCoE port types

4.3 Describe the purpose of a VSAN

4.4 Describe the addressing model of block based storage protocols
4.4.a FC
4.4.b iSCSI

20% 5.0 Advanced Data Center Storage
5.1 Describe FCoE concepts and operations
5.1.a Encapsulation
5.1.b DCB
5.1.c vFC
5.1.d Topologies
   5.1.d (i) Single hop
   5.1.d (ii) Multihop
   5.1.d (iii) Dynamic

5.2 Describe Node Port Virtualization

5.3 Describe zone types and their uses

5.4 Verify the communication between the initiator and target
5.4.a FLOGI
5.4.b FCNS
5.4.c active zone set