**Test Name**

Layer 3 Fabric functionality.

**Test Abstract**

The purpose of this test is to determine layer 3 data center fabric capabilities and ease of provisioning the fabric.

The tests will include link failures, node failures, and NOS configuration changes on service connections.

**Test Topology**

A Side

B Side

Leaf / TOR

Spine / EOR

Border / Access



Dell

Srvr4

Dell

Srvr5

Dell

Srvr6

Dell

Srvr3

Dell

Srvr2

Dell

Srvr1



VPN Access

**Testbed Requirements**

Each switching and routing device in the network to utilize layer 3 routing capabilities to distribute the routing capabilities as far down the stack as possible. Where possible, leverage IP address saving capabilities (unnumbered) and highlight ease of provisioning and operations.

Automation support for configuring and troubleshooting.

**Detailed Steps**

Test1: Configure layer 3 network

Test2: Ensure routing protocol interoperability

Test3: Confirm end to end connectivity

Test4: Disrupt primary routing path, time and observe traffic switching to backup path

Test5: Time and observe revert

**Results**

(Record data loss and service outage time for link down, node down, and configuration scenarios)

**Observations**

Note configuration complexity, or lack thereof.

Verify operationally capable of quickly identifying outage location.

**Defects**

(Note any observed defects and anticipated severity; e.g., Critical, Major, Minor)

**Conclusions**

(Note conclusions based on Test Results and Observations)