Comcast
Local AS: 6211
Local Int: 68.136.143.66/30
neighbor 68.136.143.65 remote-as 65000
neighbor 68.136.143.65 password ##################

Century
Local AS: 6214
Local Int: 152.162.97.182/30
neighbor 152.162.97.181 remote-as 65510
neighbor 152.162.97.181 password ##################

COMCAST

CENTURY

BGP

BGP

COMCAST EDGE NGFW
Model: PA-5220
Name: gwNGFWSICHQ01
IP: 10.1.180.10/30

CENTURY EDGE NGFW
Model: PA-5220
Name: gwNGFWSICHQ02
IP: 10.1.180.6/30

OSPF AREA 1

OSPF AREA 2

VLAN 1
VLAN 2
VLAN 3
VLAN 4
VLAN 5
VLAN 6
VLAN 18

MDF 1

MDF 2

DNS
Name: svDnsSeaIceHq01
Vlan: 10.1.10.4

DHCP
Name: svDHCPSeaIceHQ01
IP: 10.1.10.6

Voice Gateway
Name: vgSeaIceHQ01
IP: 10.1.10.8

WIFI Controller
Model: C9120AXI-B
Name: wcSeaIceHQ01
VLAN 4: 10.1.60.4

Model: Cisco Catalyst 9500
Name: mlsSeaIceHQ01
Quantity: 2

Model: Cisco Catalyst 9500
Name: mlsSeaIceHQ02
Quantity: 2

TRUNK

OSPF AREA 0

OSPF AREA 0

OSPF AREA 0

OSPF AREA 0

DNS
Name: svDnsSeaIceHq02
Vlan: 10.1.10.5

DHCP
Name: svDHCPSeaIceHQ02
IP: 10.1.10.7

Voice Gateway
Name: vgSeaIceHQ02
IP: 10.1.10.9

WIFI Controller
Model: C9120AXI-B
Name: wcSeaIceHQ02
VLAN 4: 10.1.60.5

Model: Palo Alto 850 NGFW
Name: fsPrxySeaIceHQ01

TRUNK

Model: Cisco Catalyst 9300
Name: wgsSeaIceHQ01
Quantity: 4
Total Ports: 192

Model: Cisco Catalyst 9300
Name: wgsSeaIceHQ02
Quantity: 4
Total Ports: 192

Model: Cisco Catalyst 9300
Name: wgsSeaIceHQ03
Quantity: 4
Total Ports: 192

Model: Cisco Catalyst 9300
Name: wgsSeaIceHQ04
Quantity: 4
Total Ports: 192

Access
Access
Access
Access
Access
Access
Access
Access
Access
Access
Access
Access

Model: C9120AXI-B
Quantity: 1

Model: Cisco 7965
Quantity: 38

Quantity: 38

Model: Cisco 7965
Quantity: 51

Quantity: 45

Model: C9120AXI-B
Quantity: 3

Model: Cisco 7965
Quantity: 44

Quantity: 44

Model: C9120AXI-B
Quantity: 2

Model: Cisco 7965
Quantity: 49

Quantity: 47

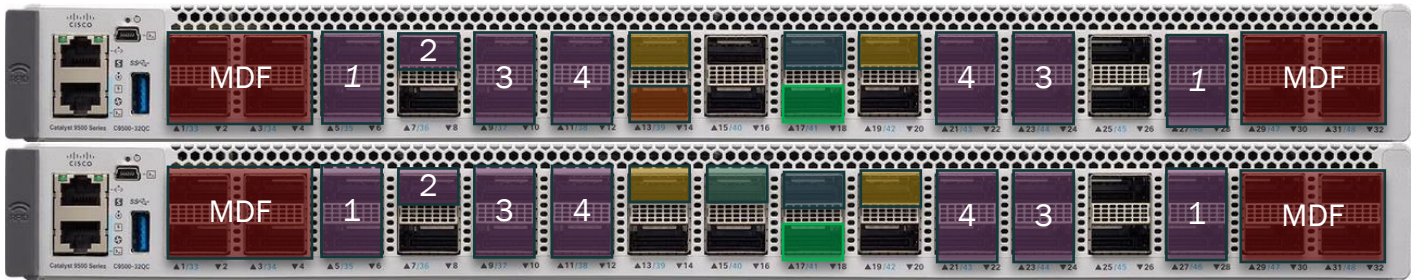IDF 1

IDF 2

IDF 3

IDF 4

Legend	mlsSeaIceHQ01- SVI
VLAN 10 – Network Services VLAN 20 – Campus Data VLAN 30 – Campus Voice VLAN 40 – Finance Data VLAN 50 – Finance Voice VLAN 60 - Campus Wireless VLAN 180 – Routing IP HELPER ADDRESS	VLAN 10: 10.1.10.2/28 VLAN 20: 10.1.20.2/23 VLAN 30: 10.1.30.2/23 VLAN 40: 10.1.40.2/24 VLAN 50: 10.1.50.2/24 VLAN 60: 10.1.60.2/22 VLAN 180: 10.1.180.1/30

HSRP VIPs	mlsSeaIceHQ02- SVI
VLAN 10: 10.1.1.1 VLAN 20: 10.1.2.1 VLAN 30: 10.1.3.1 VLAN 40: 10.1.4.1 VLAN 50: 10.1.5.1 VLAN 60: 10.1.6.1	VLAN 10: 10.1.10.3/28 VLAN 20: 10.1.20.3/23 VLAN 30: 10.1.30.3/23 VLAN 40: 10.1.40.3/24 VLAN 50: 10.1.50.3/24 VLAN 60: 10.1.60.3/22 VLAN 180: 10.1.180.2/30

PROTOCOLS

BGP
IP SLA
OSPF
HSRP
RPVSTP

MDF 1 2 3 4 4 3 1 MDF

MDF 1 2 3 4 4 3 1 MDF

OS2 LC to LC Fiber Optic
Patch Cable Single Mode
Duplex 9/125 SMF Yellow
1M-15M. 100Gbps

AOI QSFP+ 40G-LR4
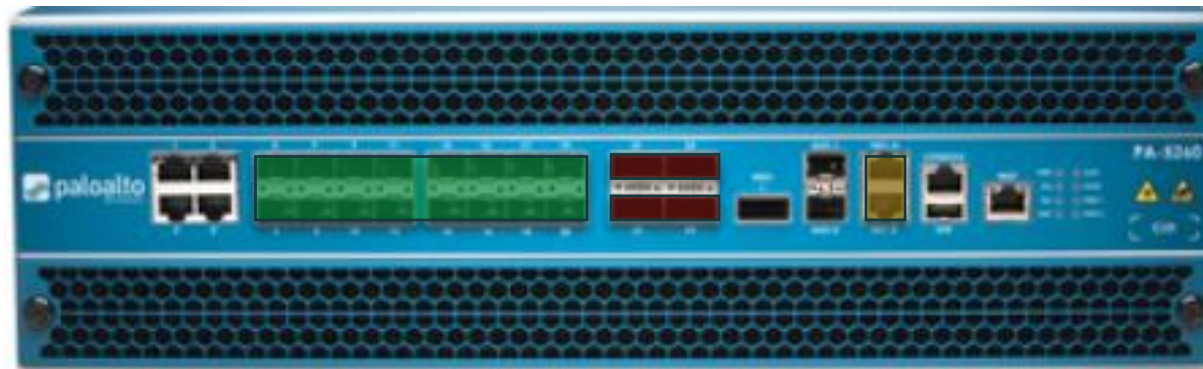Lite 4xCWDM Daul LC
SMF
AQOLBCQ4EDMA0878

Cisco QSFP-40G-SR-BD
40GBASE-SR BiDi QSFP
Transceivers 10-2945-02

OM4 LC to ST Fiber Optic
Patch Cable Multimode
Duplex Aqua 50/125 LC ST
1M-15M 40Gbps

MDFs   NGFW

DNS   VG   DHCP   IDFs   WLC

Palo Alto PA-5220 Next-Generation Firewall VPN Gateway

OS2 LC to LC Fiber Optic
Patch Cable Single Mode
Duplex 9/125 SMF Yellow
1M-15M. 100Gbps

AOI QSFP+ 40G-LR4
Lite 4xCWDM Daul LC
SMF
AQOLBCQ4EDMA0878

OPTIONAL HA PAIR
PORTS
Would require
Ethernet cable
installed

MDFs

HA

ISP

Cisco C9300 48U-A

Cisco QSFP-40G-SR-BD 40GBASE-SR BiDi QSFP Transceivers 10-2945-02

MDFs

OM4 LC to ST Fiber Optic Patch Cable Multimode Duplex Aqua 50/125 LC ST 1M-15M 40Gbps

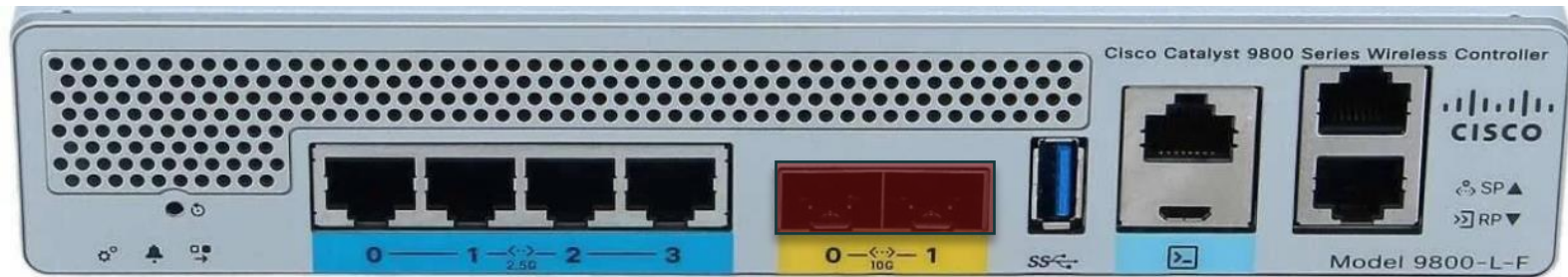**Cisco Catalyst 9300 2-Port 40GbE QSFP+ Network Module *8 = 320Gbps = 1.6G per drop**

MDFs

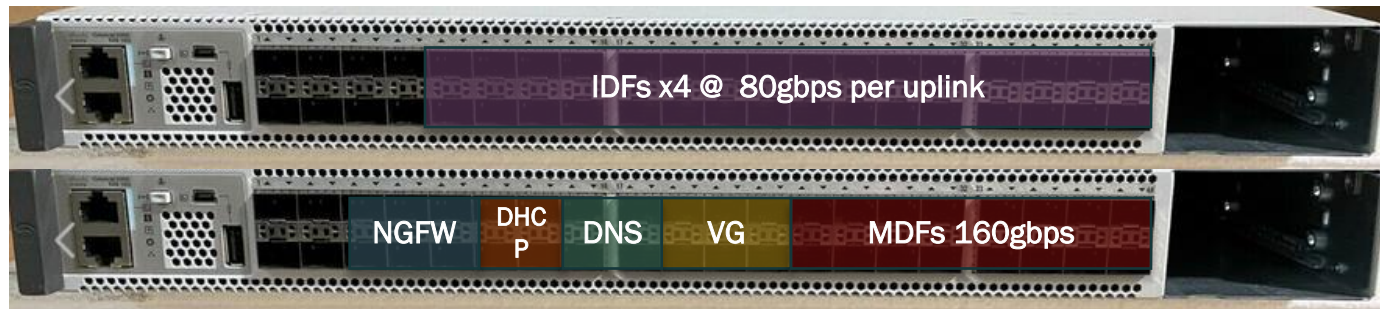**CAT 6 Ethernet Cable Lan Network CAT6 Internet Modem Blue RJ45 Patch Cord**

CAT6

Cisco C9800-L-C-K9 Catalyst 9800-L Copper Uplink Wireless LAN Controller

10Gtek SFP-10G-SR 10GBase Multi Mode LC Connector

CORE

Cisco C9500-40X-E 40-Port 10G Switch Quatity: 2

IDFs x4 @ 80gbps per uplink

NGFW | DHCP | DNS | VG | MDFs 160gbps

10Gtek SFP-10G-SR 10GBase Multi Mode LC Connector
Quantity: 52

DHCP | DNS | VG | IDFs
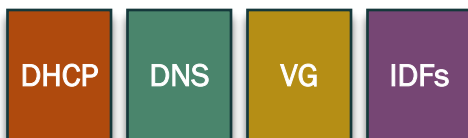
Cisco SFP-10G-LR 10G Single Mode LC Connector
Quantity: 28

NGFW | MDFs

Copper Drops (Patch Panel)
35 small cubicles, 2 Ethernet ports each Total: 70
5 offices, 4 Ethernet ports each Total: 20
90 Total Drops

IDF1

8ct MM Fiber Strand ST Connector

8ct MM Fiber Strand ST Connector

42 small cubicles, 2 Ethernet ports each Total: 84
3 offices, 4 Ethernet ports each Total: 12
3 small conference rooms, 8 ports each Total: 24
120 Total Drops

IDF2

8ct MM Fiber Strand ST Connector

8ct MM Fiber Strand ST Connector

MDF1

MDF2

16ct SM Fiber Strand LC Connector

8ct MM Fiber Strand ST Connector

8ct MM Fiber Strand ST Connector

IDF3

30 network drops in Cafeteria Total: 30
35 small cubicles, 2 Ethernet ports each Total: 70
3 offices, 4 Ethernet ports each Total: 12
4 small conference rooms, 8 ports each Total: 32
144 Total Drops

8ct MM Fiber Strand ST Connector

8ct MM Fiber Strand ST Connector

IDF4

Copper Drops (Patch Panel)
36 ports in large conference room Total: 36
42 small cubicles, 2 Ethernet ports each Total: 84
5 offices, 4 Ethernet ports each Total: 20
140 Total Drops