



storage switch commands

ONTAP 9.6 commands

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storage switch commands

storage switch add

Add a back-end switch for monitoring

Availability: This command is available to *cluster* administrators at the *admin* privilege level.

Description

The `storage switch add` command enables you to add FC switches for SNMP monitoring in a MetroCluster configuration. Front end switches should not be added for monitoring and will result in a Monitor Status Error condition.

Parameters

-address <IP Address> - FC Switch Management IP Address

This parameter specifies the IP address of the back-end switch that is added for monitoring.

[-snmp-version {SNMPv1|SNMPv2c|SNMPv3}] - Supported SNMP Version

This parameter specifies the SNMP version that Data ONTAP uses to communicate with the back-end switch that is added for monitoring. The default SNMP version is SNMPv2c.

{ [-snmp-community <text>] - (DEPRECATED)-SNMPv2c Community or SNMPv3 Username



This parameter is deprecated and may be removed in a future release of Data ONTAP. Use `-snmp-community-or-username` instead.

This parameter specifies the SNMPv2c community set or SNMPv3 username on the switch that is added for monitoring.

[-snmp-community-or-username <text>] - SNMPv2c Community or SNMPv3 Username }

This parameter specifies the SNMPv2c community set or SNMPv3 username on the switch that is added for monitoring.

[-veto-backend-fabric-check {true|false}] - Veto Back-end Fabric Check? (privilege: advanced)

If specified, the `storage switch add` command will not check if the switch is present in the MetroCluster's back-end fabric. By default, it does not let you add switches that are not present.

[-blades <integer>,...] - Cisco Director Class Switch Blades to Monitor

This parameter specifies the blades to monitor on the back-end switch that is added for monitoring. It is only applicable to director-class switches.

Examples

The following command adds a back-end switch with IP Address 10.226.197.34 for monitoring:

```

cluster1::> storage switch add -address 10.226.197.34 -snmp-community-or
-username public
cluster1::> storage switch show

```

Monitor	Symbolic	Is				
Switch	Name	Vendor	Model	Switch WWN	Monitored	Status
Cisco_10.226.197.34	mcc-cisco-8Gb-fab-4	Cisco	DS-C9148-16P-K9	2000547fee78f088	true	ok
mcc-cisco-8Gb-fab-1	mcc-cisco-8Gb-fab-1	Cisco	-	-	false	-
mcc-cisco-8Gb-fab-2	mcc-cisco-8Gb-fab-2	Cisco	-	-	false	-
mcc-cisco-8Gb-fab-3	mcc-cisco-8Gb-fab-3	Cisco	-	-	false	-

```

4 entries were displayed.
cluster1::>

```

The following command adds a Cisco Director Class switch for monitoring. Data ONTAP uses SNMPv3 and 'snmpuser1' username to communicate with this switch.

```

cluster1::> storage switch add -address 10.228.56.208 -snmp-version SNMPv3
-snmp-community-or-username snmpuser1 -blades 3,4

```

storage switch modify

Modify information about a back-end switch's configuration

Availability: This command is available to *cluster* administrators at the *admin* privilege level.

Description

The `storage switch modify` enables you to modify certain parameters for identifying and accessing the FC back-end switches added for monitoring in a MetroCluster configuration.

Parameters

-switch-name <text> - FC Switch Name

This parameter specifies the name of the switch.

[-snmp-version {SNMPv1|SNMPv2c|SNMPv3}] - SNMP Version

This parameter specifies the SNMP version that Data ONTAP uses to communicate with the switch.

[-switch-ipaddress <IP Address>] - Switch IP Address

This parameter specifies the IP address of the switch.

{ [-snmp-community <text>] - (DEPRECATED)-SNMPv2c Community or SNMPv3 Username



This parameter is deprecated and may be removed in a future release of Data ONTAP. Use `-snmp-community-or-username` instead.

This parameter specifies the SNMPv2c community set or SNMPv3 username on the switch.

[-snmp-community-or-username <text>] - SNMPv2c Community or SNMPv3 Username }

This parameter specifies the SNMPv2c community set or SNMPv3 username on the switch.

[-blades <integer>,...] - Director-Class Switch Blades to Monitor

This parameter specifies the blades to monitor on the switch. It is only applicable to director-class switches.

Examples

The following command modifies Cisco_10.226.197.34 switch SNMP community to 'public':

```
cluster1::> storage switch modify -switch-name Cisco_10.226.197.34 -switch
-ipaddress 10.226.197.34 -snmp-community-or-username public
cluster1::>
```

The following command modifies the blades monitored on a director-class switch:

```
cluster1::> storage switch modify -switch-name Cisco_10.228.56.208 -blades
3,4
cluster1::>
```

The following command modifies Brocade 6505 switch SNMP version to SNMPv3 and SNMPv3 username to 'snmpuser1':

```
cluster1::> storage switch modify -switch-name Brocade6505 -switch
-ipaddress 10.226.197.34 -snmp-version SNMPv3 -snmp-community-or-username
snmpuser1
cluster1::>
```

storage switch refresh

Refresh storage switch info

Availability: This command is available to *cluster* administrators at the *advanced* privilege level.

Description

The `storage switch refresh` command triggers a refresh of the SNMP data for the MetroCluster FC switches and FC-to-SAS bridges. It does not do anything if the refresh is already going on. The FC switches and FC-to-SAS bridges must have been previously added for monitoring by using the [storage switch add](#) and [storage bridge add](#) commands respectively.

Examples

The following command triggers a refresh for the SNMP data:

```
cluster1::*> storage switch refresh
cluster1::*>
```

Related Links

- [storage switch add](#)
- [storage bridge add](#)

storage switch remove

Remove a back-end switch from monitoring

Availability: This command is available to *cluster* administrators at the *admin* privilege level.

Description

The `storage switch remove` enables you to remove FC back-end switches that were previously added for SNMP monitoring.

Parameters

-switch-name <text> - FC Switch Name

This parameter specifies the name of the back-end switch added for monitoring.

Examples

The following command removes 'Cisco_10.226.197.34' switch from monitoring:

```

cluster1::> storage switch show
                Symbolic                               Is
Monitor
  Switch      Name      Vendor  Model      Switch WWN      Monitored
Status
-----
-----
Cisco_10.226.197.34
                mcc-cisco-8Gb-fab-4
                  Cisco   DS-C9148-16P-K9
                                2000547fee78f088 true      ok
mcc-cisco-8Gb-fab-1
                mcc-cisco-8Gb-fab-1
                  Cisco   -              -              false     -
mcc-cisco-8Gb-fab-2
                mcc-cisco-8Gb-fab-2
                  Cisco   -              -              false     -
mcc-cisco-8Gb-fab-3
                mcc-cisco-8Gb-fab-3
                  Cisco   -              -              false     -

```

4 entries were displayed.

```
cluster1::> storage switch remove -switch-name Cisco_10.226.197.34
```

```

cluster1::> storage switch show
                Symbolic                               Is
Monitor
  Switch      Name      Vendor  Model      Switch WWN      Monitored
Status
-----
-----
mcc-cisco-8Gb-fab-4
                mcc-cisco-8Gb-fab-4
                  Cisco
                                -              -              false     -
mcc-cisco-8Gb-fab-1
                mcc-cisco-8Gb-fab-1
                  Cisco   -              -              false     -
mcc-cisco-8Gb-fab-2
                mcc-cisco-8Gb-fab-2
                  Cisco   -              -              false     -
mcc-cisco-8Gb-fab-3
                mcc-cisco-8Gb-fab-3
                  Cisco   -              -              false     -

```

4 entries were displayed

```
cluster1::>
```

storage switch show

Display switch information

Availability: This command is available to *cluster* administrators at the *admin* privilege level.

Description

The `storage switch show` command displays information about all the storage switches in the MetroCluster configuration. The back-end switches must have been previously added for monitoring using the [storage switch add](#) command. If no parameters are specified, the default command displays the following information about the storage switches:

- Switch
- Symbolic Name
- Vendor
- Model
- Switch WWN
- Is Monitored
- Monitor Status

To display detailed profile information about a single storage switch, use the `-switch-name` parameter.

Parameters

{ [-fields <fieldname>,...]

Displays the specified fields for all the storage switches, in column style output.

| [-connectivity]

Displays the following details about the connectivity from the storage switch to connected entities:

- Port name
- Port operating mode
- Port world wide name
- Peer port world wide name
- Peer type
- Additional information about peer

Displays the following details about the connectivity from the node to the storage switch:

- Node name
- Adapter name
- Switch port name
- Switch port speed
- Adapter type

| [**-cooling**]

Displays the following details about the fans and temperature sensors on the storage switch:

- Fan name
- Fan speed in rotations per minute (RPM)
- Fan operational status
- Temperature sensor name
- Temperature sensor reading in Celsius °C
- Temperature sensor status

| [**-error**]

Displays the errors related to the storage switch.

| [**-port**]

Displays the following details about the storage switch ports:

- Port name
- Port world wide name
- Port administrative status
- Port operational status
- Port operating mode
- Whether SFP is present in the port
- Port speed in gigabits per second (Gbps)
- Port BB credit
- Peer port world wide name

| [**-power**]

Displays the following details about the storage switch power supplies:

- Power supply name
- Power supply serial number
- Power supply operational status

| [**-san-config**]

Displays the following details about the Virtual Storage Area Networks (VSAN) and Zones of the storage switch:

- VSAN identifier
- VSAN name
- VSAN operational status
- Type of load balancing configured for the VSAN
- Whether in-order-delivery set for the VSAN
- Whether the auto power reset of the PSU is enabled

- VAN member switch name and port
- Zone name
- VSAN ID of the zone
- Zone member switch name and port
- Zone member port id
- Zone member port world wide name

| [-sfp]

Displays the following details about the storage switch ports Small Formfactor Pluggable (SFP):

- Port name
- Type of SFP
- SFP transmitter type
- SFP vendor
- SFP part number
- SFP serial number

| [-stats]

Displays the following details about the storage switch ports:

- Port name
- Frames received through the port (Rx Frames)
- Frames transmitted through the port (Tx Frames)
- Octets received through the port (Rx Octets)
- Octets transmitted through the port (Tx Octets)
- Port error frames

| [-instance] }

Displays expanded information about all the storage switches in the system. If a storage switch is specified, then this parameter displays the same detailed information for the storage switch you specify as does the -switch-name parameter.

[-switch-name <text>] - FC Switch Name

Displays information only about the storage switches that match the name you specify.

[-switch-wwn <text>] - Switch World Wide Name

Displays information only about the storage switches that match the switch wwn you specify.

[-switch-symbolic-name <text>] - Switch Symbolic Name

Displays information only about the storage switches that match the switch symbolic name you specify.

[-switch-fabric-name <text>] - Fabric Name

Displays information only about the storage switches that match the switch fabric you specify.

[--domain-id <integer>] - Switch Domain ID

Displays information only about the storage switches that match the switch domain id you specify.

[--switch-role {unknown|primary|subordinate}] - Switch Role in Fabric

Displays information only about the storage switches that match the switch role you specify.

[--snmp-version {SNMPv1|SNMPv2c|SNMPv3}] - SNMP Version

Displays information only about the storage switches that match the switch SNMP version you specify.

[--switch-model <text>] - Switch Model

Displays information only about the storage switches that match the switch model you specify.

[--switch-vendor {unknown|Brocade|Cisco}] - Switch Vendor

Displays information only about the storage switches that match the switch vendor you specify.

[--fw-version <text>] - Switch Firmware Version

Displays information only about the storage switches that match the switch firmware version you specify.

[--serial-number <text>] - Switch Serial Number

Displays information only about the storage switches that match the switch serial number you specify.

[--switch-ipaddress <IP Address>] - Switch IP Address

Displays information only about the storage switches that match the switch IP address you specify.

[--switch-status {unknown|ok|error}] - Switch Status

Displays information only about the storage switches that match the switch status you specify.

[--snmp-community <text>] - (DEPRECATED)-SNMPv2c Community or SNMPv3 Username



This parameter is deprecated and may be removed in a future release of Data ONTAP. Use `--snmp-community-or-username` instead.

Displays information only about the storage switches that match the switch SNMPv2c community or SNMPv3 username you specify.

[--snmp-community-or-username <text>] - SNMPv2c Community or SNMPv3 Username

Displays information only about the storage switches that match the switch SNMPv2c community or SNMPv3 username you specify.

[--profile-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Profile Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the profile data last successful refresh timestamp you specify.

[--is-monitoring-enabled {true|false}] - Is Monitoring Enabled for Switch

Displays information only about the storage switches that match the switch monitoring value you specify.

[--blades <integer>,...] - Director-Class Switch Blades to Monitor

Displays information only about the storage switches that match the blade value you specify.

[-engine-id <Hex String>] - Engine ID of SNMPv3 Capable Switch

Displays information only about the storage switches that match the SNMPv3 engine-id you specify.

[-psu-name-list <text>,...] - Switch Power Supply Name List

Displays information only about the storage switches that have the power supply units with the names you specify.

[-psu-serial-number-list <text>,...] - Switch Power Supply Serial Number List

Displays information only about the storage switches that have the power supply units with the serial numbers you specify.

[-psu-status-list {unknown|normal|warning|faulty|not-present}] - Switch Power Supply Status List

Displays information only about the storage switches that have the power supply units with the statuses you specify.

[-psu-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Power Supply Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the power supply unit data last successful refresh timestamp you specify.

[-temp-sensor-name-list <text>,...] - Switch Temperature Sensor Name List

Displays information only about the storage switches that have the temperature sensors with the names you specify.

[-temp-sensor-reading-list <integer>,...] - Switch Temperature Sensor Reading © List

Displays information only about the storage switches that have the temperature sensors with the readings you specify.

[-temp-sensor-status-list {unknown|normal|warning|critical}] - Switch Temperature Sensor Status List

Displays information only about the storage switches that have the temperature sensors with the statuses you specify.

[-temp-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Temperature Sensor Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the temperature sensor data last successful refresh timestamp you specify.

[-fan-name-list <text>,...] - Switch Fan Name List

Displays information only about the storage switches that match the fans with the names you specify.

[-fan-rpm-list <integer>,...] - Switch Fan Speed (RPM) List

Displays information only about the storage switches that match the fans with the RPM speeds you specify.

[-fan-status-list {unknown|operational|failed|not-operational|not-present}] - Switch Fan Operational Status List

Displays information only about the storage switches that match the fans with the statuses you specify.

[-fan-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm] }] - Switch Fan Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the fan data last successful refresh timestamp you specify.

[-vsan-index-list <integer>,...] - Switch VSAN Index List

Displays information only about the storage switches that have the VSANs with the indexes you specify.

[-vsan-name-list <text>,...] - Switch VSAN Name List

Displays information only about the storage switches that have the VSANs with the names you specify.

[-vsan-oper-status-list {up|down}] - Switch VSAN Operational Status List

Displays information only about the storage switches that have the VSANs with the operational statuses you specify.

[-vsan-load-balancing-type-list {src-id-dest-id|src-id-dest-id-ox-id}] - Switch VSAN Load balancing Type List

Displays information only about the storage switches that have the VSANs with the load balancing types you specify.

[-is-vsan-iod-list {true|false}] - Is In-order Delivery Set for VSAN List

Displays information only about the storage switches that have the VSANs with the IOD setting you specify.

[-vsan-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm] }] - Switch VSAN Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the VSAN data last successful refresh timestamp you specify.

[-member-switch-name-list <text>,...] - Member Switch List

Displays information only about the storage switches that have the VSANs with the member switch names you specify.

[-member-switch-port-name-list <text>,...] - Member Switch Port Name List

Displays information only about the storage switches that have the VSANs with the member switch port names you specify.

[-vsan-id-list <integer>,...] - Zone VSAN ID List

Displays information only about the storage switches that have the VSANs with the IDs you specify.

[-zone-name-list <text>,...] - Switch Zone Name List

Displays information only about the storage switches that have the zones with the names you specify.

[-zone-member-sw-domain-id-list <integer>,...] - Zone Member Switch Port Domain ID List

Displays information only about the storage switches that have the zones with the member switch domain ids you specify.

[-zone-member-port-name-list <text>,...] - Zone Member Port List

Displays information only about the storage switches that have the zones with the port names you specify.

[-zone-member-port-wwn-list <text>,...] - Zone Member WWPN List

Displays information only about the storage switches that have the zones with the port WWNs you specify.

[-zone-member-port-switch-name-list <text>,...] - Zone Member Switch WWN List

Displays information only about the storage switches that have the zones with the member port hosting switch names you specify.

[-zone-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}]

- Switch Zone Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the zone data last successful refresh timestamp you specify.

[-zone-member-wwn-list <text>,...] - Zone Member WWN List

Displays information only about the storage switches that have the zones with the member WWNs you specify.

[-zone-member-port-id-list <text>,...] - Zone Member Port ID List

Displays information only about the storage switches that have the zones with the member port ids you specify.

[-port-wwn-list <text>,...] - Switch Port World Wide Name (WWPN) List

Displays information only about the storage switches that have the ports with the WWNs you specify.

[-port-name-list <text>,...] - Switch Port Name List

Displays information only about the storage switches that have the ports with the names you specify.

[-port-admin-status-list {unknown|enabled|disabled}] - Switch Port Admin Status List

Displays information only about the storage switches that have the ports with administrative statuses you specify.

[-port-oper-status-list {unknown|online|offline}] - Switch Port Operational Status List

Displays information only about the storage switches that have the ports with operational statuses you specify.

[-port-mode-list {unknown|auto|F-port|FL-port|E-port|TE-port|U-port|G-port}] - Switch Port Mode List

Displays information only about the storage switches that have the ports with the operating modes you specify.

[-port-oper-speed-list <integer>,...] - Switch Port Current Speed (in Gbits/sec) List

Displays information only about the storage switches that have the ports with the operational speeds you specify.

[-port-bb-credit-list <integer>,...] - Switch Port BB Credit List

Displays information only about the storage switches that have the ports with the BB credits you specify.

[-port-sfp-present-list {true|false}] - Switch Port Is SFP Present List

Displays information only about the storage switches that have the ports with the SFP present values you specify.

[-port-peer-wwpn-list <text>,...] - Switch Port Peer WWPN List

Displays information only about the storage switches that have the ports with the peer port WWPNs you specify.

[-port-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Port Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the port data last successful refresh timestamp you specify.

[-port-stat-name-list <text>,...] - Switch Port Name List

Displays information only about the storage switches that have the ports with the names you specify.

[-port-tx-frames-list <integer>,...] - Switch Port Transmitted Frame Count List

Displays information only about the storage switches that have the ports with the transmitted frames values you specify.

[-port-rx-frames-list <integer>,...] - Switch Port Received Frame Count List

Displays information only about the storage switches that have the ports with the received frames values you specify.

[-port-tx-octets-list <integer>,...] - Switch Port Total Transmitted Octets List

Displays information only about the storage switches that have the ports with the transmitted octets values you specify.

[-port-rx-octets-list <integer>,...] - Switch Port Total Received Octets List

Displays information only about the storage switches that have the ports with the received octets values you specify.

[-port-frame-error-list <integer>,...] - Switch Port Frame Error Count List

Displays information only about the storage switches that have the ports with the error frame values you specify.

[-port-stat-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Port Stat Data Last Update Timestamp

Displays information only about the storage switches that match the port statistics data last successful refresh timestamp you specify.

[-sfp-port-name-list <text>,...] - Switch Port Name List

Displays information only about the storage switches that have the ports with the names you specify.

[-sfp-type-list {unknown|other|gbic|embedded|glm|gbic-with-serial-id|gbic-without-serial-id|sfp-with-serial-id|sfp-without-serial-id|xfp|x2-short|x2-medium|x2-tall|xpak-short|xpak-medium|xpak-tall|xenpak|sfp-dw-dm|qsfp|x2-dw-dm|gbic-not-installed|small-form-factor}] - Switch Port SFP Type List

Displays information only about the storage switches that have the ports with the SFP types you specify.

[-sfp-tx-type-list {unknown|long-wave-laser|short-wave-laser|long-wave-laser-cost-reduced|electrical|ten-gig-base-sr|ten-gig-base-lr|ten-gig-base-er|ten-gig-base-lx4|ten-gig-base-sw|ten-gig-base-lw|ten-gig-base-ew}] - Switch Port SFP Transmitter Type List

Displays information only about the storage switches that have the ports with the SFP transmitter types you specify.

[-sfp-vendor-list <text>,...] - Switch Port SFP Vendor List

Displays information only about the storage switches that have the ports with the SFP vendors you specify.

[-sfp-part-number-list <text>,...] - Switch Port SFP Part Number List

Displays information only about the storage switches that have the ports with the SFP part numbers you specify.

[-sfp-serial-number-list <text>,...] - Switch Port SFP Serial Number List

Displays information only about the storage switches that have the ports with the SFP serial numbers you specify.

[-sfp-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Port SFP Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the port SFP data last successful refresh timestamp you specify.

[-switch-error-text-list <text>,...] - Switch Error Text List

Displays information only about the storage switches that have the errors you specify.

[-conn-switch-port-name-list <text>,...] - Switch Port Name List

Displays information only about the storage switches that have the ports with the names you specify.

[-conn-switch-port-mode-list {unknown|auto|F-port|FL-port|E-port|TE-port|U-port|G-port}] - Switch Port Operating Mode List

Displays information only about the storage switches that have the ports with the operating modes you specify.

[-conn-switch-port-wwn-list <text>,...] - Switch Port WWN List

Displays information only about the storage switches that have the ports with the WWNs you specify.

[-conn-switch-port-peer-port-wwn-list <text>,...] - Switch Port Peer Port WWN List

Displays information only about the storage switches that have the ports with the peer port WWNs you specify.

[-conn-switch-port-peer-info-list <text>,...] - Switch Port Peer Host & Port Name List

Displays information only about the storage switches that have the ports with the peer information values you specify.

[-conn-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Connectivity Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the switch connectivity data last successful refresh timestamp you specify.

[-conn-switch-port-peer-type-list {unknown|bridge|switch|fcp-adapter|fcvi-adapter}] - Switch Port Peer Type List

Displays information only about the storage switches that have the ports connected to the peer types you specify.

[-switch-port-name-list <text>,...] - Switch Port Name List

Displays information only about the storage switches that have the ports with the names you specify.

[-switch-port-speed-list <integer>,...] - Switch Port Speed (in Gbps) List

Displays information only about the storage switches that have the ports with the speeds you specify.

[-node-name-list <nodename>,...] - Node Name List

Displays information only about the storage switches that are connected to the nodes you specify.

[-adapter-name-list <text>,...] - Node Adapter Name List

Displays information only about the storage switches that are connected to the adapters you specify.

[-adapter-port-name-list <text>,...] - Node Adapter Port Name List

Displays information only about the storage switches that are connected to the adapter ports you specify.

[-adapter-type-list {unknown|FCP-Initiator|FC-VI|FCP-Target}] - Node Adapter Type List

Displays information only about the storage switches that are connected to the types of adapters you specify.

[-path-data-last-successful-refresh-timestamp {MM/DD/YYYY HH:MM:SS [{+|-}hh:mm]}] - Switch Path Data Last Successful Refresh Timestamp

Displays information only about the storage switches that match the node to switch path data last successful refresh timestamp you specify.

[-name-list <text>,...] - Switch Name List

Displays information only about the storage switches that match the names you specify.

[-domain-id-list <integer>,...] - Switch Domain ID List

Displays information only about the storage switches that match the domain ids you specify.

[-wwn-list <text>,...] - Switch WWN List

Displays information only about the storage switches that match the switch WWNs you specify.

[-role-list {unknown|primary|subordinate}] - Switch Role in Fabric List

Displays information only about the storage switches that match the switch roles you specify.

[-address-list <IP Address>,...] - Switch IP Address List

Displays information only about the storage switches that match the switch IP addresses you specify.

Examples

The following example displays information about all storage switches:

```

cluster::>storage switch show
          Symbolic                               Is
Monitor
  Switch      Name      Vendor  Model      Switch WWN      Monitored
Status
-----
Cisco_10.226.197.34
          mcc-cisco-8Gb-fab-4
          Cisco    DS-C9148-16P-K9
          2000547fee78f088 true      ok
Cisco_10.226.197.35
          mcc-cisco-8Gb-fab-3
          Cisco    DS-C9148-16P-K9
          2000547fee78f0f0 true      ok
Cisco_10.226.197.36
          mcc-cisco-8Gb-fab-2
          Cisco    DS-C9148-16P-K9
          2000547fee78efb0 true      ok
Cisco_10.226.197.37
          mcc-cisco-8Gb-fab-1
          Cisco    DS-C9148-16P-K9
          2000547fee78f0d8 true      ok

4 entries were displayed.
cluster::>

```

The following example displays connectivity (switch to peer and node to switch) information about all storage switches:

```

cluster::> storage switch show -connectivity
Switch Name: Cisco_10.226.197.36
Switch WWN: 2000547fee78efb0
Fabric WWN: 2001547fee78efb1
Vendor: Cisco
Model: DS-C9148-16P-K9
Errors: -
Last Update Time: 7/31/2014 14:16:42 -04:00
Connectivity:
Port Name Port Mode Port WWN      Peer Port WWN      Peer Type      Peer
Info
-----
fc1/1      F-port  2001547fee78efb0 2100001086607d34 unknown
unknown
fc1/3      F-port  2003547fee78efb0 21000024ff3dd9cb unknown

```

```

unknown
    fc1/4      F-port      2004547fee78efb0 21000024ff3dda8d unknown
unknown
    fc1/5      F-port      2005547fee78efb0 500a0980009af880 unknown
unknown
    fc1/6      F-port      2006547fee78efb0 500a0981009af370 unknown
unknown
    fc1/11     TE-port     200b547fee78efb0 200b547fee78f088 switch
Cisco_10.226.197.34:fc1/11
    fc1/12     TE-port     200c547fee78efb0 200c547fee78f088 switch
Cisco_10.226.197.34:fc1/12
    fc1/13     F-port      200d547fee78efb0 2100001086609e22 unknown
unknown
    fc1/15     F-port      200f547fee78efb0 21000024ff3dd91b unknown
unknown
    fc1/16     F-port      2010547fee78efb0 21000024ff3dbef5 unknown
unknown
    fc1/17     F-port      2011547fee78efb0 500a0981009afda0 unknown
unknown
    fc1/18     F-port      2012547fee78efb0 500a0981009a9160 unknown
unknown
    fc1/25     F-port      2019547fee78efb0 21000010866037e8 bridge
ATTO_10.226.197.17:1
    fc1/27     F-port      201b547fee78efb0 21000024ff3dd9d3 fcvi-adapter
dpg-mcc-3240-15-a1:fcvi_device_1
    fc1/28     F-port      201c547fee78efb0 21000024ff3dbe3d fcvi-adapter
dpg-mcc-3240-15-a2:fcvi_device_1
    fc1/29     F-port      201d547fee78efb0 500a0980009ae0a0 fcp-adapter
dpg-mcc-3240-15-a2:0c
    fc1/30     F-port      201e547fee78efb0 500a0981009aef40 fcp-adapter
dpg-mcc-3240-15-a1:0d
Last Update Time: 7/31/2014 14:26:48 -04:00
Path:

```

Node	Adapter	Switch Port	Speed	Adapter Type
dpg-mcc-3240-15-a1	0d	fc1/30	4Gbps	FCP-Initiator
dpg-mcc-3240-15-a1	fcvi_device_1	fc1/27	8Gbps	FC-VI
dpg-mcc-3240-15-a2	0c	fc1/29	4Gbps	FCP-Initiator
dpg-mcc-3240-15-a2	fcvi_device_1	fc1/28	8Gbps	FC-VI

The following command displays cooling (temperature sensors and fans) information about all storage switches:

```

cluster::>storage switch show -cooling
Switch Name: Cisco_10.226.197.34
      Switch WWN: 2000547fee78f088
      Fabric WWN: 2001547fee78efb1
      Vendor: Cisco
      Model: DS-C9148-16P-K9
      Errors: -
      Last Update Time: 7/31/2014 14:26:58 -04:00
Fans:
  Fan              RPM Status
  -----
  Fan Module-1    - operational
  Fan Module-2    operational
  Fan Module-3    operational
  Fan Module-4    operational
Last Update Time: 7/31/2014 14:27:10 -04:00
Temperature Sensors:
Sensor              Temp (C) Status
-----
module-1 Outlet    27 normal
module-1 Outlet    29 normal
module-1 Intake    26 normal
module-1 Intake    28 normal

```

The following command displays the error information about all storage switches:

```
cluster::> storage switch show -error
Switch Name: Cisco_10.226.197.34
  Switch WWN: 2000547fee78f088

-----
-----
  Cisco_10.226.197.34(2000547fee78f088): Switch is Unreachable over
Management Network.
Switch Name: Cisco_10.226.197.35
  Switch WWN: 2000547fee78f0f0

-----
-----
  Cisco_10.226.197.35(2000547fee78f0f0): Switch is Unreachable over
Management Network.
Switch Name: Cisco_10.226.197.36
  Switch WWN: 2000547fee78efb0

-----
-----
  Cisco_10.226.197.36(2000547fee78efb0): Switch is Unreachable over
Management Network.
Switch Name: Cisco_10.226.197.37
  Switch WWN: 2000547fee78f0d8

-----
-----
  Cisco_10.226.197.37(2000547fee78f0d8): Switch is Unreachable over
Management Network.
4 entries were displayed.
```

The following command displays the detailed information about all the storage switches:

```

cluster::> storage switch show -instance
Switch Name: Cisco_10.226.197.34
  Switch Domain: -
  Switch Role: -
  Switch WWN: 2000547fee78f088
  Fabric WWN: 2001547fee78efb1
  Vendor: Cisco
  Model: DS-C9148-16P-K9
  Firmware Version: 6.2(1)
  Management IP: 10.226.197.34
  Errors: Cisco_10.226.197.34(2000547fee78f088): Switch is
Unreachable over Management Network.
  Last Update Time: 7/31/2014 14:41:28 -04:00
Fabric:
Switch Name                Domain WWN                Role                IP Address
-----
Cisco_10.226.197.34        0 2000547fee78f088      unknown
10.226.197.34
Cisco_10.226.197.36        0 2000547fee78efb0      unknown
10.226.197.36

```

The following command displays port information about all storage switches:

```

cluster::> storage switch show -port
Switch Name: Cisco_10.226.197.34
  Switch WWN: 2000547fee78f088
  Fabric WWN: 2001547fee78efb1
  Vendor: Cisco
  Model: DS-C9148-16P-K9
  Errors: -
  Last Update Time: 7/31/2014 14:26:58 -04:00
Ports:
Admin Oper SFP Speed BB
Port Name Port WWN Status Status Port Mode Present (Gbps) Credit
PeerPortWWN
-----
fc1/1      2001547fee78f088
          enabled online F-port true 8 1
2100001086608b76
fc1/2      2002547fee78f088
          enabled offline auto true 0 1
fc1/3      2003547fee78f088
          enabled online F-port true 8 1

```

```

21000024ff48edd9
  fc1/4      2004547fee78f088
              enabled online F-port true      8      1
21000024ff3dd981
  fc1/5      2005547fee78f088
              enabled online F-port true      4      1
500a098001057f98
  fc1/6      2006547fee78f088
              enabled online F-port true      4      1
500a098101069778
  fc1/7      2007547fee78f088
              enabled offline auto true      0      1
  fc1/8      2008547fee78f088
              enabled offline auto true      0      1
  fc1/9      2009547fee78f088
              enabled offline auto true      0      1
  fc1/10     200a547fee78f088
              enabled offline auto true      0      32
  fc1/11     200b547fee78f088
              enabled offline TE-port true     8      32
200b547fee78efb0
  fc1/12     200c547fee78f088
              enabled offline TE-port true     8      32
200c547fee78efb0
  fc1/13     200d547fee78f088
              enabled online F-port true      8      32
2100001086609c2e
  fc1/14     200e547fee78f088
              enabled offline auto true      0      32
  fc1/15     200f547fee78f088
              enabled offline auto true      0      32
  fc1/16     2010547fee78f088
              enabled offline auto true      0      32
  fc1/17     2011547fee78f088
              enabled offline auto true      0      32
  fc1/18     2012547fee78f088
              enabled offline auto true      0      32
  fc1/19     2013547fee78f088
              enabled offline auto true      0      32
  fc1/20     2014547fee78f088
              enabled offline auto true      0      1
  fc1/21     2015547fee78f088
              enabled offline auto true      0      1
  fc1/22     2016547fee78f088
              enabled offline auto true      0      32
  fc1/23     2017547fee78f088

```

		enabled	offline	auto	true	0	32
fc1/24	2018547fee78f088						
		enabled	offline	auto	true	0	32
fc1/25	2019547fee78f088						
		enabled	online	F-port	true	8	32
2100001086609c06							
fc1/26	201a547fee78f088						
		enabled	offline	auto	true	0	32
fc1/27	201b547fee78f088						
		enabled	online	F-port	true	8	32
21000024ff48ea93							
fc1/28	201c547fee78f088						
		enabled	online	F-port	true	8	32
21000024ff48eacf							
fc1/29	201d547fee78f088						
		enabled	online	F-port	true	4	32
500a098101484340							
fc1/30	201e547fee78f088						
		enabled	online	F-port	true	4	32
500a09810147e700							
fc1/31	201f547fee78f088						
		enabled	offline	auto	true	0	32
fc1/32	2020547fee78f088						
		enabled	offline	auto	true	0	1
fc1/33	2021547fee78f088						
		enabled	offline	auto	true	0	1
fc1/34	2022547fee78f088						
		enabled	offline	auto	true	0	32
fc1/35	2023547fee78f088						
		enabled	offline	auto	true	0	32
fc1/36	2024547fee78f088						
		enabled	offline	auto	true	0	32
fc1/37	2025547fee78f088						
		enabled	offline	auto	true	0	32
fc1/38	2026547fee78f088						
		enabled	offline	auto	true	0	32
fc1/39	2027547fee78f088						
		enabled	offline	auto	true	0	32
fc1/40	2028547fee78f088						
		enabled	offline	auto	true	0	32
fc1/41	2029547fee78f088						
		enabled	offline	auto	true	0	32
fc1/42	202a547fee78f088						
		enabled	offline	auto	true	0	32
fc1/43	202b547fee78f088						
		enabled	offline	auto	true	0	32


```

fc1/44      202c547fee78f088
             enabled  offline auto    true           0           32
fc1/45      202d547fee78f088
             enabled  offline auto    true           0           32
fc1/46      202e547fee78f088
             enabled  offline auto    true           0           32
fc1/47      202f547fee78f088
             enabled  offline auto    true           0           32
fc1/48      2030547fee78f088
             enabled  offline auto    true           0           0
port-channel 1
             2401547fee78f088
             enabled  offline auto    true           0           0
port-channel 2
             2402547fee78f088
             enabled  offline auto    true           0           0
port-channel 3
             2403547fee78f088
             enabled  offline auto    true           0           0
port-channel 4
             2404547fee78f088
             enabled  offline auto    true           0           0
port-channel 5
             2405547fee78f088
             enabled  offline auto    true           0           0
port-channel 6
             2406547fee78f088
             enabled  offline auto    true           0           0
port-channel 7
             2407547fee78f088
             enabled  offline auto    true           0           0
port-channel 8
             2408547fee78f088
             enabled  offline auto    true           0           0
port-channel 9
             2409547fee78f088
             enabled  offline auto    true           0           0
port-channel 10
             240a547fee78f088
             enabled  offline auto    true           0           0
port-channel 11
             240b547fee78f088
             enabled  offline auto    true           0           0
port-channel 12
             240c547fee78f088
             enabled  offline auto    true           0           0

```

```
sup-fc0          enabled online unknown true      1      0
```

The following command displays power supply unit information about all storage switches:

```
cluster::> storage switch show -power
Switch Name: Cisco_10.226.197.34
          Switch WWN: 2000547fee78f088
          Fabric WWN: 2001547fee78efb1
          Vendor: Cisco
          Model: DS-C9148-16P-K9
          Errors: -
          Last Update Time: 7/31/2014 14:41:49 -04:00
Power Supplies:
Power Supply   Serial Number Status
-----
300.00W 110v AC PAC15494TBZ   normal
300.00W 110v AC PAC15494T4D   normal
```

The following command displays san configuration (VSANs and Zones) information about all storage switches:

```
cluster::> storage switch show -san-config
Switch Name: Cisco_10.226.197.34
          Switch WWN: 2000547fee78f088
          Fabric WWN: 2001547fee78efb1
          Vendor: Cisco
          Model: DS-C9148-16P-K9
          Errors: -
          Last Update Time: 7/31/2014 14:41:49 -04:00
VSAN Configuration:
Oper
VSAN ID Vsan Name                               Status Load Balancing  isIOD
-----
      1 VSAN0001                               up      src-id-dest-id  true
      2 dpg_13_storage                         up      src-id-dest-id-ox-id
                                         true
      3 dpg_13_fcvi                           down    src-id-dest-id-ox-id
                                         true
     10 dpg_mcc_13_fab1_fcvi                   up      src-id-dest-id  true
     20 dpg_mcc_13_fab1_storage                 up      src-id-dest-id-ox-id
                                         true
     30 dpg_mcc_13_fab2_fcvi                   up      src-id-dest-id  true
     40 VSAN0040                               up      src-id-dest-id  true
     70 dpg_mcc_14_fcvi                       up      src-id-dest-id  true
     80 dpg_mcc_14_storage                     up      src-id-dest-id-ox-id
```

```

true
110 dpg_mcc_15_fcvi      up      src-id-dest-id-ox-id
true
120 dpg_mcc_15_storage  up      src-id-dest-id-ox-id
true
4094 isolated_vsan      down    src-id-dest-id-ox-id
true

```

VSAN Membership:

```

VSAN ID Switch Name          Switch Port Name
-----
1 Cisco_10.226.197.34 fc1/2
1 Cisco_10.226.197.34 fc1/7
1 Cisco_10.226.197.34 fc1/8
1 Cisco_10.226.197.34 fc1/9
1 Cisco_10.226.197.34 fc1/10
1 Cisco_10.226.197.34 fc1/11
1 Cisco_10.226.197.34 fc1/12
1 Cisco_10.226.197.34 fc1/14
1 Cisco_10.226.197.34 fc1/19
1 Cisco_10.226.197.34 fc1/20
1 Cisco_10.226.197.34 fc1/21
1 Cisco_10.226.197.34 fc1/22
1 Cisco_10.226.197.34 fc1/23
1 Cisco_10.226.197.34 fc1/24
1 Cisco_10.226.197.34 fc1/31
1 Cisco_10.226.197.34 fc1/32
1 Cisco_10.226.197.34 fc1/33
1 Cisco_10.226.197.34 fc1/34
1 Cisco_10.226.197.34 fc1/35
1 Cisco_10.226.197.34 fc1/36
1 Cisco_10.226.197.34 fc1/37
1 Cisco_10.226.197.34 fc1/38
1 Cisco_10.226.197.34 fc1/39
1 Cisco_10.226.197.34 fc1/40
1 Cisco_10.226.197.34 fc1/41
1 Cisco_10.226.197.34 fc1/42
1 Cisco_10.226.197.34 fc1/43
1 Cisco_10.226.197.34 fc1/44
1 Cisco_10.226.197.34 fc1/45
1 Cisco_10.226.197.34 fc1/46
1 Cisco_10.226.197.34 fc1/47
1 Cisco_10.226.197.34 fc1/48
1 Cisco_10.226.197.34 port-channel 1
1 Cisco_10.226.197.34 port-channel 2
1 Cisco_10.226.197.34 port-channel 3
1 Cisco_10.226.197.34 port-channel 4

```

```
1 Cisco_10.226.197.34 port-channel 5
1 Cisco_10.226.197.34 port-channel 6
1 Cisco_10.226.197.34 port-channel 7
1 Cisco_10.226.197.34 port-channel 8
1 Cisco_10.226.197.34 port-channel 9
1 Cisco_10.226.197.34 port-channel 10
1 Cisco_10.226.197.34 port-channel 11
1 Cisco_10.226.197.34 port-channel 12
1 Cisco_10.226.197.36 fc1/2
1 Cisco_10.226.197.36 fc1/7
1 Cisco_10.226.197.36 fc1/8
1 Cisco_10.226.197.36 fc1/9
1 Cisco_10.226.197.36 fc1/10
1 Cisco_10.226.197.36 fc1/11
1 Cisco_10.226.197.36 fc1/12
1 Cisco_10.226.197.36 fc1/14
1 Cisco_10.226.197.36 fc1/19
1 Cisco_10.226.197.36 fc1/20
1 Cisco_10.226.197.36 fc1/21
1 Cisco_10.226.197.36 fc1/22
1 Cisco_10.226.197.36 fc1/23
1 Cisco_10.226.197.36 fc1/24
1 Cisco_10.226.197.36 fc1/26
1 Cisco_10.226.197.36 fc1/31
1 Cisco_10.226.197.36 fc1/32
1 Cisco_10.226.197.36 fc1/33
1 Cisco_10.226.197.36 fc1/34
1 Cisco_10.226.197.36 fc1/35
1 Cisco_10.226.197.36 fc1/36
1 Cisco_10.226.197.36 fc1/37
1 Cisco_10.226.197.36 fc1/38
1 Cisco_10.226.197.36 fc1/39
1 Cisco_10.226.197.36 fc1/40
1 Cisco_10.226.197.36 fc1/41
1 Cisco_10.226.197.36 fc1/42
1 Cisco_10.226.197.36 fc1/43
1 Cisco_10.226.197.36 fc1/44
1 Cisco_10.226.197.36 fc1/45
1 Cisco_10.226.197.36 fc1/46
1 Cisco_10.226.197.36 fc1/47
1 Cisco_10.226.197.36 fc1/48
30 Cisco_10.226.197.34 fc1/3
30 Cisco_10.226.197.34 fc1/4
30 Cisco_10.226.197.36 fc1/3
30 Cisco_10.226.197.36 fc1/4
40 Cisco_10.226.197.34 fc1/1
```

```

40 Cisco_10.226.197.34 fc1/5
40 Cisco_10.226.197.34 fc1/6
40 Cisco_10.226.197.36 fc1/1
40 Cisco_10.226.197.36 fc1/5
40 Cisco_10.226.197.36 fc1/6
70 Cisco_10.226.197.34 fc1/15
70 Cisco_10.226.197.34 fc1/16
70 Cisco_10.226.197.36 fc1/15
70 Cisco_10.226.197.36 fc1/16
80 Cisco_10.226.197.34 fc1/13
80 Cisco_10.226.197.34 fc1/17
80 Cisco_10.226.197.34 fc1/18
80 Cisco_10.226.197.36 fc1/13
80 Cisco_10.226.197.36 fc1/17
80 Cisco_10.226.197.36 fc1/18
110 Cisco_10.226.197.34 fc1/26
110 Cisco_10.226.197.34 fc1/27
110 Cisco_10.226.197.34 fc1/28
120 Cisco_10.226.197.34 fc1/25
120 Cisco_10.226.197.34 fc1/29
120 Cisco_10.226.197.34 fc1/30
120 Cisco_10.226.197.36 fc1/25
120 Cisco_10.226.197.36 fc1/29
120 Cisco_10.226.197.36 fc1/30

```

Last Update Time: 7/31/2014 14:45:40 -04:00

Zone Configuration:

Member	Member	Member				
Zone Name	VSAN ID	Switch Name	Port Name	Port ID	Member	WWN
dpg_mcc_fcvi	30	Cisco_10.226.197.36	fc1/3	-		
\$default_zone\$	30	Cisco_10.226.197.36	fc1/4			
dpg_mcc_storage	40	Cisco_10.226.197.36	fc1/1			
\$default_zone\$	40	Cisco_10.226.197.36	fc1/5			
dpg_mcc_14_fcvi	70	Cisco_10.226.197.36	fc1/15			
\$default_zone\$	70	Cisco_10.226.197.36	fc1/16			
dpg_mcc_14_storage	80	Cisco_10.226.197.34	fc1/13			

```

$default_zone$ 80 Cisco_10.226.197.34
                  fc1/17

dpg_mcc_15_fcvi
                  110 Cisco_10.226.197.36
                  fc1/27

$default_zone$
                  110 Cisco_10.226.197.36
                  fc1/28

dpg_mcc_15_storage
                  120 Cisco_10.226.197.34
                  fc1/25

$default_zone$
                  120 Cisco_10.226.197.34
                  fc1/29

```

The following command displays port SFP information about all storage switches:

```

cluster::> storage switch show -sfp
Switch Name: Cisco_10.226.197.34
          Switch WWN: 2000547fee78f088
          Fabric WWN: 2001547fee78efb1
          Vendor: Cisco
          Model: DS-C9148-16P-K9
          Errors: -
          Last Update Time: 7/31/2014 14:41:49 -04:00
SFP:
Port Name Type          Tx Type          Vendor          Part Number Serial
Number
-----
fc1/1      sfp-with-serial-id
          short-wave-laser CISCO-FINISAR
          FTLF8528P2BCV-CS

FNS160629J9
fc1/2      unknown          unknown
fc1/3      sfp-with-serial-id
          short-wave-laser CISCO-FINISAR
          FTLF8528P2BCV-CS

FNS160629H3
fc1/4      sfp-with-serial-id
          short-wave-laser CISCO-FINISAR
          FTLF8528P2BCV-CS

```

```

FNS160629QH
  fc1/5      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160628EA
  fc1/6      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629QT
  fc1/7      unknown      unknown
  fc1/8      unknown      unknown
  fc1/9      unknown      unknown
  fc1/10     unknown      unknown
  fc1/11     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629GP
  fc1/12     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS16061X71
  fc1/13     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629P8
  fc1/14     unknown      unknown
  fc1/15     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629JP
  fc1/16     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160628D2
  fc1/17     sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629NG

```

```

fc1/18      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629R1
fc1/19      unknown          unknown
fc1/20      unknown          unknown
fc1/21      unknown          unknown
fc1/22      unknown          unknown
fc1/23      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629NC
fc1/24      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160628CX
fc1/25      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS160629NZ
fc1/26      unknown          unknown
fc1/27      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS16061XB0
fc1/28      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS16061XA6
fc1/29      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS16061XA0
fc1/30      sfp-with-serial-id
              short-wave-laser CISCO-FINISAR
                                      FTLF8528P2BCV-CS

FNS16061X9S
fc1/31      unknown          unknown

```


fc1/32	unknown	unknown	
fc1/33	sfp-with-serial-id		
		short-wave-laser	CISCO-FINISAR
			FTLF8528P2BCV-CS
FNS16061NL7			
fc1/34	unknown	unknown	
fc1/35	sfp-with-serial-id		
		short-wave-laser	CISCO-FINISAR
			FTLF8528P2BCV-CS
FNS160629M8			
fc1/36	sfp-with-serial-id		
		short-wave-laser	CISCO-FINISAR
			FTLF8528P2BCV-CS
FNS160629KH			
fc1/37	unknown	unknown	
fc1/38	unknown	unknown	
fc1/39	unknown	unknown	
fc1/40	unknown	unknown	
fc1/41	unknown	unknown	
fc1/42	unknown	unknown	
fc1/43	unknown	unknown	
fc1/44	unknown	unknown	
fc1/45	unknown	unknown	
fc1/46	unknown	unknown	
fc1/47	unknown	unknown	
fc1/48	unknown	unknown	
port-channel 1			
	unknown	unknown	
port-channel 2			
	unknown	unknown	
port-channel 3			
	unknown	unknown	
port-channel 4			
	unknown	unknown	
port-channel 5			
	unknown	unknown	
port-channel 6			
	unknown	unknown	
port-channel 7			
	unknown	unknown	
port-channel 8			
	unknown	unknown	
port-channel 9			

```

unknown          unknown
port-channel 10
unknown          unknown
port-channel 11
unknown          unknown
port-channel 12
unknown          unknown
sup-fc0

```

The following command displays port statistics information about all storage switches:

```

cluster::> storage switch show -stats
Switch Name: Cisco_10.226.197.34
Switch WWN: 2000547fee78f088
Fabric WWN: 2001547fee78efb1
Vendor: Cisco
Model: DS-C9148-16P-K9
Errors: -
Last Update Time: 7/31/2014 14:41:49 -04:00
Port Statistics:

```

Error	Port Name	Rx Frames	Rx Octets	Tx Frames	Tx Octets
0	fc1/1	2116207233	3710682580	3906335374	859905888
0	fc1/2	1	208	1	208
0	fc1/3	3238899002	903116292	3079548736	4014304952
0	fc1/4	1888758418	1643379900	2434821325	2997002344
0	fc1/5	3719731908	1808138824	1878240211	3421335100
0	fc1/6	2644430347	1042009564	249190625	2003353056
0	fc1/7	1	228	1	228
0	fc1/8	1	156	1	156
0	fc1/9	1	148	1	148
0	fc1/10	1	224	1	224

0					
	fc1/11	3617142898	4129927136	39089396	2595464620
0					
	fc1/12	473603889	1560909460	2797562521	2833496016
0					
	fc1/13	1852255936	1091902804	180309704	1769859928
0					
	fc1/14	1	140	1	140
0					
	fc1/15	4997082	3519688264	4283938	3370856432
0					
	fc1/16	4995287	3519577592	4282173	3370732136
0					
	fc1/17	55146756	178045212	1733567096	3030415436
0					
	fc1/18	63005788	4287094736	1726651844	2640371212
0					
	fc1/19	1	200	1	200
0					
	fc1/20	1	104	1	104
0					
	fc1/21	1	108	1	108
0					
	fc1/22	1	108	1	108
0					
	fc1/23	1	164	1	164
0					
	fc1/24	1	216	1	216
0					
	fc1/25	2810698819	1611009260	471527156	1900246656
0					
	fc1/26	1	104	1	104
0					
	fc1/27	4165019838	887421780	3848122102	2581891136
0					
	fc1/28	58607737	1015197080	101621078	3482734024
0					
	fc1/29	4266270960	222242144	3766674764	2400640552
0					
	fc1/30	3984658378	1443835508	152597387	678837848
0					
	fc1/31	1	220	1	220
0					
	fc1/32	1	120	1	120
0					
	fc1/33	1	132	1	132

0	fc1/34	1	144	1	144
0	fc1/35	1	160	1	160
0	fc1/36	1	104	1	104
0	fc1/37	1	148	1	148
0	fc1/38	1	184	1	184
0	fc1/39	1	160	1	160
0	fc1/40	1	136	1	136
0	fc1/41	1	196	1	196
0	fc1/42	1	128	1	128
0	fc1/43	1	168	1	168
0	fc1/44	1	212	1	212
0	fc1/45	1	136	1	136
0	fc1/46	1	224	1	224
0	fc1/47	1	104	1	104
0	fc1/48	1	104	1	104

Related Links

- [storage switch add](#)

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