CHAPTER 7

System Management Commands

This chapter describes the system management commands available on Cisco Nexus 5000 Series switches.

clear logging nvram

Use the **clear logging nvram** command to clear the NVRAM logs.

clear logging nvram

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to clear the NVRAM logs:

```
switch# clear logging nvram
```

Related Commands

Command	Description
show logging nvram	Displays the NVRAM logs.

clear logging onboard

To clear the OBFL entries in the persistent log, use the **clear logging onboard** command.

clear logging onboard [**environmental-history**] [**exception-log**] [**obfl-log**] [**stack-trace**]

Syntax Description

environmental-history	(Optional) Clears the OBFL environmental history.
exception-log	(Optional) Clears the OBFL exception log entries.
obfl-log	(Optional) Clears the OBFL (boot-uptime/device-version/obfl-history).
stack-trace	(Optional) Clears the OBFL stack trace entries.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to clear the OBFL environmental history entries:

```
switch# clear logging onboard environmental-history
```

The following example shows how to clear the OBFL exception-log entries:

```
switch# clear logging onboard exception-log
```

The following example shows how to clear the OBFL (boot-uptime/device-version/obfl-history) entries:

```
switch# clear logging onboard obfl-log
```

The following example shows how to clear the OBFL stack trace entries:

```
switch# clear logging onboard stack-trace
```

Related Commands

Command	Description
show logging onboard	Displays onboard failure logs.

clear logging session

Use the **clear logging session** command to clear the current logging session.

clear logging session

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to clear the current logging session:

```
switch# clear logging session
```

Related Commands

Command	Description
show logging session	Displays logging session status.

clear ntp session

To clear the Network Time Protocol (NTP) session, use the **clear ntp session** command.

clear ntp session

Syntax Description

This command has no other arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to discard the NTP CFS distribution session in progress:

```
switch# clear ntp session
```

Related Commands

Command	Description
show ntp	Displays NTP information.

clear ntp statistics

To clear the Network Time Protocol (NTP) session, use the **clear ntp session** command.

clear ntp statistics {**all-peers** | **io** | **local** | **memory**}

Syntax Description

all-peers	Clears all peer transaction statistics.
io	Clears I/O statistics.
local	Clears local statistics.
memory	Clears memory statistics.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to discard the NTP I/O statistics:

```
switch# clear ntp statistics io
```

Related Commands

Command	Description
show ntp	Displays NTP information.

logging console

Use the **logging console** command to enable logging messages to the console session.

To disable logging messages to the console session, use the **no** form of this command.

logging console [*severity-level*]

no logging console

Syntax Description

severity-level	(Optional) The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows: • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition—default level • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to enable logging messages with a severity level of 4 (warning) or higher to the console session:

```
switch# configure terminal
switch(config)# logging console 4
```

Related Commands

Command	Description
show logging console	Displays the console logging configuration.

logging event

Use the **logging event** command to log interface events. To disable logging of interface events, use the **no** form of this command.

logging event port {**link-status** | **trunk-status**} {**default** | **enable**}

no logging event port {**link-status** | **trunk-status**} {**default** | **enable**}

Syntax Description

link-status	Log all UP/DOWN and CHANGE messages.
trunk-status	Log all TRUNK status messages.
default	The default logging configuration is used by interfaces not explicitly configured.
enable	To enable logging overriding port level configuration.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to log interface events:

```
switch# configure terminal
switch(config)# logging event link-status default
```

Related Commands

Command	Description
show logging	Displays the logging status.

logging event port

Use the **logging event port** command to log events on an interface. To disable logging of interface events, use the **no** form of this command.

logging event port {**link-status** | **trunk-status**} [**default**]

no logging event port {**link-status** | **trunk-status**}

Syntax Description

link-status	Log all UP/DOWN and CHANGE messages.
trunk-status	Log all TRUNK status messages.
default	(Optional) The default logging configuration is used by interfaces not explicitly configured.

Command Default

None

Command Modes

Interface configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to log interface events:

```
switch# configure terminal
switch(config)# interface ethernet 1/1
switch(config-if)# logging event port link-status default
```

Related Commands

Command	Description
show interface	Displays the interface configuration information.
show logging	Displays the logging status.

logging level

Use the **logging level** command to enable logging messages from the defined facility that have the specified severity level or higher.

To disable logging messages from the defined facility, use the **no** form of this command.

logging level *facility severity-level*

no logging level *facility severity-level*

Syntax Description

facility	Defines the appropriate *facility*. The facilities are listed in the "System Message Logging Facilities" section on page 45. To apply the same severity level to all facilities, use the **all** facility.
severity-level	The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows: • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition—default level • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to enable logging messages from the AAA facility that have a severity level of 2 or higher:

```
switch(config)# logging level aaa 2
```

Related Commands

Command	Description
show logging level	Displays the facility logging level configuration.

logging logfile

Use the **logging logfile** command to configure the name of the log file used to store system messages and the minimum severity level to log.

To disable logging to the log file, use the **no** form of this command.

logging logfile *logfile-name severity-level* [**size** *bytes*]

no logging logfile [*logfile-name severity-level* [**size** *bytes*]]]

Syntax Description

logfile-name	Configure the name of the log file to be used to store system messages.
severity-level	The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows: • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition—default level • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only
size *bytes*	(Optional) Specifies a maximum file size. The default file size is 4194304 bytes and can be configured from 4096 to 4194304 bytes.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to configure a log file called *logfile* to store system messages and set its severity level to 4:

```
switch(config)# logging logfile logfile 4
```

Related Commands

Command	Description
show logging logfile	Displays the log file.

logging module

Use the **logging module** command to enable module log messages. Set a specified severity level or use the default.

To disable module log messages, use the **no** form of this command.

logging module [*severity-level*]

no logging module

Syntax Description

severity-level	(Optional) The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows*:* • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition—default level • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to enable module log messages:

```
switch(config)# logging module
```

Related Commands

Command	Description
show logging module	Displays the module logging status.

logging monitor

Use the **logging monitor** command to enable the device to log messages to the monitor (terminal line). This configuration applies to Telnet and SSH sessions.

To disable monitor log messages, use the **no** form of this command.

logging monitor [*severity-level*]

no logging monitor

Syntax Description

severity-level	(Optional) The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows: • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition—default level • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to enable monitor log messages:

```
switch(config)# logging monitor
```

Related Commands

Command	Description
show logging monitor	Displays the status of monitor logging.

logging server

Use the **logging server** command to configure a remote syslog server at the specified host name or IPv4/IPv6 address.

To disable the remote syslog server, use the **no** form of this command.

logging server *host* [*severity-level*] [**facility** {**auth | authpriv | cron | daemon | ftp | kernel | local0 | local1 | local2 | local3 | local4 | local5 | local6 | local7 | lpr | mail | news | syslog | user | uucp**}]

no logging server *host*

Syntax Description

host	Configure the host name or IPv4/IPv6 address of the Remote Syslog Server.
severity-level	(Optional) The number of the desired severity level at which messages should be logged. Messages at or numerically lower than the specified level are logged. Severity levels are as follows: • **0**—emergency: System unusable • **1**—alert: Immediate action needed • **2**—critical: Critical condition—default level • **3**—error: Error condition • **4**—warning: Warning condition • **5**—notification: Normal but significant condition • **6**—informational: Informational message only • **7**—debugging: Appears during debugging only
facility *facility*	(Optional) Define the appropriate outgoing *facility*. The facilities are listed in the System Message Logging Facilities section. The default outgoing facility is **local7**.

Command Default

The default outgoing facility is **local7**.

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to configure a remote syslog server at a specified IPv4 address, using the default outgoing facility:

```
switch(config)# logging server 172.28.254.253
```

This example shows how to configure a remote syslog server at a specified host name, with severity level 5 or higher:

```
switch(config)# logging server syslogA 5
```

Related Commands

Command	Description
show logging server	Displays the configured syslog servers.

logging timestamp

Use the **logging timestamp** command to set the logging timestamp units. By default, the units are seconds.

To reset the logging timestamp units to the default, use the **no** form of this command.

logging timestamp {**microseconds** | **milliseconds** | **seconds**}

no logging timestamp {**microseconds** | **milliseconds** | **seconds**}

Syntax Description

microseconds | **milliseconds** | **seconds**	Selects the units to use for logging timestamps. The default units are **seconds**.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to set the logging timestamp units to microseconds:

```
switch(config)# logging timestamp microseconds
```

Related Commands

Command	Description
show logging timestamp	Displays the logging timestamp configuration.

ntp

To configure the NTP peers and servers for the switch, use the **ntp** command. Use the **no** form of this command to remove configured peers and servers.

ntp {**peer** *hostname* | **server** *hostname*} [**prefer**] [**use-vrf** *vrf-name*]

no ntp {**peer** *hostname* | **server** *hostname*}

Syntax Description

peer *hostname*	The hostname or IP address of an NTP peer.
server *hostname*	The hostname or IP address of the NTP server.
prefer	(Optional) Specifies this peer/server as the preferred peer/server.
use-vrf *vrf-name*	(Optional) Specifies the virtual routing and forwarding (VRF) used to reach this peer/server.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.
4.0(1a)N1(1)	The keyword use-vrf replaces the keyword vrf. The keyword vrf is retained for backwards compatibility.

Examples

This example forms a server association with a server:

```
switch(config)# ntp server ntp.cisco.com
```

You can specify multiple associations. This example forms a peer association with a peer:

```
switch(config)# ntp peer 10.20.10.0
```

This example deletes an association with a peer:

```
switch(config)# no ntp peer 10.20.10.0
```

Related Commands

Command	Description
ntp distribute	Enables CFS distribution for NTP.
show ntp	Displays NTP information.

ntp abort

To discard the Network Time Protocol (NTP) Cisco Fabric Services (CFS) distribution session in progress, use the **ntp abort** command.

ntp abort

Syntax Description

This command has no other arguments or keywords.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to discard the NTP CFS distribution session in progress:

```
switch(config)# ntp abort
```

Related Commands

Command	Description
ntp distribute	Enables CFS distribution for NTP.
show ntp	Displays NTP information.

ntp commit

To apply the pending configuration pertaining to the Network Time Protocol (NTP) Cisco Fabric Services (CFS) distribution session in progress in the fabric, use the **ntp commit** command.

ntp commit

Syntax Description

This command has no other arguments or keywords.

Command Default

None

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to commit changes to the active NTP configuration:

```
switch(config)# ntp commit
```

Related Commands

Command	Description
ntp distribute	Enables CFS distribution for NTP.
show ntp	Displays NTP information.

ntp distribute

To enable Cisco Fabric Services (CFS) distribution for Network Time Protocol (NTP), use the **ntp distribute** command. To disable this feature, use the **no** form of the command.

ntp distribute

no ntp distribute

Syntax Description

This command has no other arguments or keywords.

Command Default

Disabled.

Command Modes

Configuration mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Usage Guidelines

Before distributing the Fibre Channel timer changes to the fabric, the temporary changes to the configuration must be committed to the active configuration using the **ntp commit** command.

Examples

The following example shows how to distribute the active NTP configuration to the fabric:

```
switch(config)# ntp distribute
```

Related Commands

Command	Description
ntp commit	Commits the NTP configuration changes to the active configuration.
show ntp	Displays NTP information.

ntp sync-retry

To retry synchronization with the configured NTP servers, use the **ntp sync-retry** command.

ntp sync-retry

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

The following example shows how to retry synchronization with the configured NTP servers:

```
switch# ntp sync-retry
```

Related Commands

Command	Description
ntp distribute	Enables CFS distribution for NTP.
show ntp	Displays NTP information.

show logging console

Use the **show logging console** command to display the console logging configuration.

show logging console

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the console logging configuration:

```
switch# show logging console
```

Related Commands

Command	Description
logging console	Configures logging to the console.

show logging info

Use the **show logging info** command to display the logging configuration.

show logging info

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the logging configuration:

```
switch# show logging info
```

show logging last

Use the **show logging last** command to display the last number of lines of the logfile.

show logging last *number*

Syntax Description		
	number	Enters the number of lines to display from 1 to 9999.

Command Default None

Command Modes EXEC mode

Command History	Release	Modification
	4.0(0)N1(1a)	This command was introduced.

Examples This example shows how to display the last 42 lines of the log file:

```
switch# show logging last 42
```

show logging level

Use the **show logging level** command to display the facility logging severity level configuration.

show logging level [*facility*]

Syntax Description

facility	(Optional) Defines the appropriate logging *facility*. The facilities are listed in the System Message Logging Facilities section.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the EtherChannel logging severity level configuration:

```
switch# show logging level port-channel
```

Related Commands

Command	Description
logging level	Configures the facility logging level.

show logging logfile

Use the **show logging logfile** command to display the messages in the log file that were timestamped within the span entered. If you do not enter an end time, the current time is used.

show logging logfile [**start-time** *yyyy mmm dd hh:mm:ss*] [**end-time** *yyyy mmm dd hh:mm:ss*]

Syntax Description

start-time	(Optional) Enter a start time in the format *yyyy mmm dd hh:mm:ss*. Use three characters for the month (*mmm*) field, digits for the year (*yyyy*) and day (*dd*) fields, and digits separated by colons for the time (*hh:mm:ss*) field.
end-time	(Optional) Enter an end time in the format *yyyy mmm dd hh:mm:ss*. Use three characters for the month (*mmm*) field, digits for the year (*yyyy*) and day (*dd*) fields, and digits separated by colons for the time (*hh:mm:ss*) field.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the messages in the log file that were timestamped within the span shown:

```
switch# show logging logfile start-time 2008 mar 11 12:10:00
```

Related Commands

Command	Description
logging logfile	Configures logging to a log file.

show logging module

Use the **show logging module** command to display the module logging configuration.

show logging module

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the module logging configuration:

```
switch# show logging module
```

Related Commands

Command	Description
logging module	Configures module logging.

show logging monitor

Use the **show logging monitor** command to display the monitor logging configuration.

show logging monitor

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the monitor logging configuration:

```
switch# show logging monitor
```

Related Commands

Command	Description
logging monitor	Configures logging on the monitor.

show logging nvram

Use the **show logging nvram** command to display the messages in the NVRAM log.

show logging nvram [**last** *number-lines*]

Syntax Description

last *number-lines*	(Optional) Enters the number of lines to display. The specified number of lines is displayed. Specify from 1 to 100 lines.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the last 20 messages in the NVRAM log:

```
switch# show logging nvram last 20
```

show logging onboard

To display the onboard logging information based on the error type, use the **show logging onboard** command.

show logging onboard {**boot-uptime** | **device-version** | **endtime** | **environmental-history** | **exception-log** | **kernel-trace** | **obfl-history** | **obfl-logs** | **stack-trace** | **starttime** | **status**} [**>** *file* | | *type*]

Syntax Description

boot-uptime	Displays the OBFL boot and uptime information.
device-version	Displays the OBFL device version information.
endtime	Displays the OBFL logs until the specified end time.in the following format: *mm*/*dd*/*yy*-*HH*:*MM*:*SS*
environmental-history	Displays the OBFL environmental history.
exception-log	Displays the OBFL exception log.
kernel-trace	Displays the OBFL kernel trace information.
obfl-history	Displays the OBFL history information.
obfl-logs	Displays the OBFL technical support log information.
stack-trace	Displays the OBFL kernel stack trace information.
starttime	Displays the OBFL logs from the specified start time in the following format: *mm*/*dd*/*yy*-*HH*:*MM*:*SS*
status	Displays the OBFL status enable or disable.
> *file*	(Optional) Redirects the output to a file. See the "Usage Guidelines" section for additional information.
| *type*	(Optional) Filters the output. See the "Usage Guidelines" section for additional information.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Usage Guidelines

The date and time arguments for the **starttime** and **endtime** keywords are entered as the date month/day/year (*mm*/*dd*/*yy*), followed by a hyphen, and the time in 24-hour format in hours:minutes:seconds (*HH:MM:SS*). For example:

- **starttime** 03/17/08-15:01:57
- **endtime** 03/18/08-15:04:57

The valid values for *file* are as follows:

- **bootflash:**
- **ftp:**
- **scp:**
- **sftp:**
- **tftp:**
- **volatile:**

The valid values for *type* are as follows:

- **begin** [**-i**] [**-x**] [*word*]—Begin with the line that matches the text.
  - **-i**—Ignores the case difference when comparing the strings.
  - **-x**—Prints only the lines where the match is a whole line.
  - *word*—Specifies for the expression.
- **count** [**>** *file* | | *type*]—Counts number of lines.
- **egrep** | **grep** *print-match*—Egrep or Grep. Egrep searches for lines of text that match more sophisticated regular expression syntax than grep. Grep searches for lines of text that match one or many regular expressions, and outputs only the matching lines.
  - **-A** *num*—Prints the specifies number of lines of context after every matching line. Range: 1 to 999.
  - **-B** *num*—Prints the specifies number of lines of context before every matching line. Range: 1 to 999.
  - **-c**—Prints a total count of matching lines only.
  - **-i**—Ignores the case difference when comparing the strings.
  - **-n**—Prints each match preceded by its line number.
  - **-v**—Prints only the lines that contain no matches for the *word* argument.
  - **-w**—Prints only lines where the match is a complete word
  - **-x**—Prints only the lines where the match is a whole line.
  - *word*—Specifies for the expression.
- **exclude** [**-i**] [**-x**] [*word*]—Excludes the lines that match.
  - **-i**—Ignores the case difference when comparing the strings.
  - **-x**—Prints only the lines where the match is a whole line.
  - *word*—Specifies for the expression.
- **head** [**-n** *num*]—Stream Editor. The optional **-n** *num* keyword and argument allows you to specify the number of lines to print. Range: 0 to 2147483647.
- **include** [**-i**] [**-x**] [*word*]—Include the lines that match
  - **-i**—Ignores the case difference when comparing the strings.
  - **-x**—Prints only the lines where the match is a whole line.
  - *word*—Specifies for the expression.
- **last** [*num*]—Displays the last lines to print. The optional *num* specifies the number of lines to print. Range: 0 to 9999.
- **less [-E** | **-d**]—Quits at the end of the file.

  - **-E**—(Optional) Quits at the end of the file.
  - **-d**—(Optional) Specifies a dumb terminal.
- **no-more**—Turns-off pagination for command output.
- **sed** *command*—Stream Editor
- **wc**—Counts words, lines, and characters.
  - **-c**—(Optional) Specifies the output character count.
  - **-l**—(Optional) Specifies the output line count.
  - **-w**—(Optional) Specifies the output word count.
  - **>**—Redirects it to a file.
  - **|**—Pipes command output to filter.

Use this command to view OBFL data from system hardware. The OBFL feature is enabled by default and records operating temperatures, hardware uptime, interrupts, and other important events and messages that can assist with diagnosing problems with hardware cards or modules installed in a Cisco router or switch. Data is logged to files stored in nonvolatile memory. When the onboard hardware is started up, a first record is made for each area monitored and becomes a base value for subsequent records.

The OBFL feature provides a circular updating scheme for collecting continuous records and archiving older (historical) records, ensuring accurate data about the system. Data is recorded in one of two formats: continuous information that displays a snapshot of measurements and samples in a continuous file, and summary information that provides details about the data being collected. The message “No historical data to display” is seen when historical data is not available.

Examples

This example shows how to display the OBFL boot and uptime information:

```
switch# show logging onboard boot-uptime
Sun Nov  9 06:11:59 2008:  Boot Record
--------------------------------------------------------------------------------
Boot Time..........:  Sun Nov  9 06:11:58 2008
Slot Number........:  1
Serial Number......:  FLC12280050
Bios Version.......:    v1.2.0(06/19/08)
Firmware Version...:  4.0(1a)N1(1) [build 4.0(1a)N1(1)]
```

Table 7-1 describes the significant fields shown in the display.

Table 7-1 show logging onboard boot-uptime Command Output

Field	Description
Boot Time	Time boot occurred.
Slot Number	Slot number
Serial Number	Serial number of the module.
Bios Version	Primary binary input and output system (BIOS) version.
Firmware Version	Firmware version.

This example shows how to display the OBFL logging device information:

```
switch# show logging onboard device-version
---------------------------
OBFL Data for
    Module:  1
---------------------------

Device Version Record
-------------------------------------------------------------------------
Timestamp                  Device Name      Instance Hardware Software
                                                Num  Version  Version
-------------------------------------------------------------------------
Sun Nov  3 07:07:00 2008   GATOS                 2        2        0
Sun Nov  3 07:07:00 2008   GATOS                 3        2        0
Sun Nov  3 07:07:00 2008   GATOS                 4        2        0
Sun Nov  3 07:07:00 2008   GATOS                 5        2        0
Sun Nov  3 07:07:00 2008   GATOS                 6        2        0
Sun Nov  3 07:07:00 2008   GATOS                 7        2        0
Sun Nov  3 07:07:00 2008   GATOS                 8        2        0
Sun Nov  3 07:07:00 2008   GATOS                 9        2        0
Sun Nov  3 07:07:00 2008   GATOS                10        2        0
Sun Nov  3 07:07:00 2008   GATOS                11        2        0
Sun Nov  3 07:07:00 2008   GATOS                12        2        0
Sun Nov  3 07:07:00 2008   GATOS                13        2        0
Mon Nov  4 00:15:08 2008   ALTOS                 0        2        0
Mon Nov  4 00:15:08 2008   GATOS                 0        2        0
Mon Nov  4 00:15:08 2008   GATOS                 1        2        0
Mon Nov  4 00:15:08 2008   GATOS                 2        2        0
```

Table 7-2 describes the significant fields shown in the display.

Table 7-2 show logging onboard device-version Command Output

Field	Description
Timestamp	Day, date, and time.
Device Name	Device name.
Instance Num	Number of instances.
Hardware Version	Hardware device version.
Software Version	Software device version.

This example shows how to display the OBFL history information:

```
switch# show logging onboard obfl-history
```

The **show logging onboard obfl-history** command displays the following information:

- Timestamp when OBFL is manually disabled.
- Timestamp when OBFL is manually enabled.
- Timestamp when OBFL data is manually cleared.

This example shows how to display the OBFL kernel stack trace information:

```
switch# show logging onboard stack-trace
```

The **show logging onboard stack-trace** command displays the following information:

- Time in seconds
- Time in microseconds
- Error description string
- Current process name and identification
- Kernel jiffies
- Stack trace

Related Commands

clear logging onboard	Clears the OBFL entries in the persistent log.
hw-module logging onboard	Enables or disabled OBFL entries based on the error type.

show logging server

Use the **show logging server** command to display the syslog server configuration.

show logging server

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the syslog server configuration:

```
switch# show logging server
```

Related Commands

Command	Description
logging server	Configures a remote syslog server.

show logging session status

Use the **show logging session status** command to display the logging session status.

show logging session status

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the logging session status:

```
switch# show logging session status
```

show logging status

Use the **show logging status** command to display the logging status.

show logging status

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the logging status:

```
switch# show logging status
```

show logging timestamp

Use the **show logging timestamp** command to display the logging timestamp configuration.

show logging timestamp

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example shows how to display the logging timestamp configuration:

```
switch# show logging timestamp
```

Related Commands

Command	Description
logging timestamp	Configures the logging timestamp granularity.

show ntp peer-status

To do display the status of the Network Time Protocol peers, use the **show ntp peer-status** command.

show ntp peer-status

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Usage Guidelines

This command does not require a license.

Examples

This example shows how to display the peer status for NTP:

```
switch(config)# show ntp peer-status
```

Related Commands

Command	Description
show ntp peers	Displays information about NTP peers.

show ntp peers

To display information about Network Time Protocol (NTP) peers, use the **show ntp peers** command.

show ntp peers

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example displays information about NTP peers:

```
switch(config)# show ntp peers
```

Related Commands

Command	Description
show ntp peer-status	Displays status information about NTP peers.

show ntp statistics

To display Network Time Protocol (NTP) statistics, use the **show ntp statistics** command.

show ntp statistics {**io** | **local** | **memory** | **peer** {**ipaddr** *address* | **name** *name1* [**..***nameN*]}

Syntax Description

io	Show the input-output statistics.
local	Show the counters maintained by the local NTP.
memory	Show the statistics counters related to memory code.
peer	Show the per-peer statistics counter of a peer.
ipaddr *address*	Displays statistics for the peer with the configured IPv4 or IPv6 address. The IPv4 address format is dotted decimal, x.x.x.x. The IPv6 address format is hexadecimal A:B::C:D.
name *name1* [*..nameN*]	Displays statistics for one or more named peers.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example displays statistics for NTP:

```
switch(config)# show ntp statistics local
```

Related Commands

Command	Description
clear ntp statistics	Clears NTP statistics

show ntp timestamp-status

To display the Network Time Protocol timestamp information, use the **show ntp timestamp-status** command.

show ntp timestamp-status

Syntax Description

This command has no arguments or keywords.

Command Default

None

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.

Examples

This example displays the NTP timestamp status:

```
switch(config)# show ntp timestamp-status
```

System Message Logging Facilities

Table 7-3 lists the facilities that you can use in system message logging configuration.

Table 7-3 System Message Logging Facilities

Facility	Description
aaa	Sets level for aaa syslog messages.
aclmgr	Sets level for aclmgr syslog messages.
adjmgr	Sets syslog filter level for Adjacency Manager.
afm	Sets level for afm syslog messages.
all	Sets level for all facilities.
altos	Altos syslog level.
arp	Sets syslog filter level for ARP.
auth	Sets level for Authorization System.
authpriv	Sets level for Authorization (Private) system.
bootvar	Sets level for bootvar.
callhome	Callhome syslog level.
capability	Sets syslog level for mig utils daemon.
cdp	Sets logging level for CDP.
cert-enroll	Cert-enroll syslog level.
cfs	Sets logging level for CFS.
clis	Sets syslog filter level for CLIS.
core	core daemon syslog level.
cron	Sets level for Cron/at facility.
daemon	Sets level for System daemons.
dcbx	Sets level for dcx syslog messages.
device-alias	Sets syslog level for Device Alias Distribution Service.
dstats	delta statistics syslog level.
epp	Sets level for EPP syslog messages.
ethpc	Sets level for ethpc syslog messages.
ethpm	Sets level for ethpm syslog messages.
evmc	Sets level for evmc syslog messages.
fabric_start_cfg_mgr	fabric start cfg mgr syslog level.
fc2d	Sets level for fc2d syslog messages.
fcdomain	set level for fcdomain syslog messages.
fcns	Sets syslog filter level for name server.
fcpc	Sets level for fcpc syslog messages.
fcs	Sets syslog filter level for FCS.
fdmi	Sets logging level for fdmi.

Table 7-3 System Message Logging Facilities (continued)

Facility	Description
feature-mgr	Feature manager syslog level.
flogi	Configure level for flogi syslog messages.
fs-daemon	fs daemon syslog level.
fspf	FSPF syslog level.
ftp	Sets level for File Transfer System.
fwm	Sets level for fwm syslog messages.
gatos	Gatos syslog level.
im	Sets level for im syslog messages.
kernel	Sets level for kernel.
l3vm	Sets syslog filter level for L3VM.
license	Licensing syslog level.
local0	Sets level for Local use daemons.
local1	Sets level for Local use daemons.
local2	Sets level for Local use daemons.
local3	Sets level for Local use daemons.
local4	Sets level for Local use daemons.
local5	Sets level for Local use daemons.
local6	Sets level for Local use daemons.
local7	Sets level for Local use daemons.
lpr	Sets level for Line Printer System.
mail	Sets level for Mail system.
monitor	Sets level for ethernet span syslog messages.
news	Sets level for USENET news.
nohms	Sets level for nohms syslog messages.
nqosm	Sets level for nqosm syslog messages.
ntp	Sets syslog filter level for NTP.
pfm	Sets level for pfm syslog messages.
pktmgr	Sets syslog filter level for Packet Manager.
plugin	Sets level for plugin syslog messages.
port	Sets level for port syslog messages.
port-channel	Sets level for EtherChannel syslog messages.
qd	Sets level for qd syslog messages.
radius	RADIUS syslog level.
rdl	Sets logging level for RDL.
res_mgr	Set slevel for res_mgr syslog messages.
rib	Sets level for rib.

Table 7-3 System Message Logging Facilities (continued)

Facility	Description
rlir	Sets level for RLIR.
rscn	sets level for RSCN.
san-port-channel	Sets level for san-port-channel syslog messages.
scsi-target	scsi target daemon syslog level.
security	Security syslog level.
session	Sets level for session-manager syslog messages.
sifmgr	Sets level for sifmgr syslog messages.
spanning-tree	Sets level for stp syslog messages.
stp	Sets level for stp syslog messages.
syslog	Sets level for Internal Syslog Messages.
sysmgr	System Manager syslog level.
tcpudp	Sets syslog filter level for TCPUDP.
track	Sets level for track syslog messages.
urib	Sets syslog filter level for URIB.
user	Sets level for User Process.
uucp	Sets level for Unix-to-Unix copy system.
vlan_mgr	Sets level for VLAN syslog messages.
vmm	Sets level for vmm syslog messages.
vsan	VSAN syslog level.
vshd	Sets logging level for vshd.
wwnm	Sets WWN Manager syslog level.
xml	XML agent syslog level.
zone	Sets syslog filter level for zone server.
zschk	Sets level for zschk syslog messages.