C Commands

This chapter describes the basic Cisco NX-OS system commands that begin with C.

cd

To change the current working directory in the device file system, use the **cd** command.

cd [*filesystem*:] [*//server/*] *directory*

Syntax Description

filesystem:	(Optional) Name of the file system. Valid values are **bootflash** or **volatile**.
//server/	(Optional) Name of the server. Valid values are **///**, **//module-1/**, **//sup-1/**, **//sup-active/**, or **//sup-local/**. The double slash (**//**) is required.
directory	Name of the destination directory. The directory name is case sensitive.

Note There can be no spaces in the *filesystem://server/directory* string. Individual elements of this string are separated by colons (:) and slashes (/).

Command Default

None

Command Modes

EXEC mode

Command History

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

Usage Guidelines

Use the **pwd** command to verify the current working directory.

Examples

This example shows how to change the current working directory on the current file system:

```
switch# cd my-scripts
```

This example shows how to change the current working directory to another file system:

```
switch# cd volatile:
```

Related Commands

Command	Description
pwd	Displays the current working directory name.

clear cli history

To clear the command history, use the **clear cli history** command.

clear cli history

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

Use the **show cli history** command to display the history of the commands that you entered at the command-line interface (CLI).

Examples

This example shows how to clear the command history:

```
switch# clear cli history
```

Related Commands

Command	Description
show cli history	Displays the command history.

clear cores

To clear the core files, use the **clear cores** command.

clear cores

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

Use the **show system cores** command to display information about the core files.

Examples

This example shows how to clear the core file:

```
switch# clear cores
```

Related Commands

Command	Description
show system cores	Displays the core filename.
system cores	Configures the core filename.

clear debug-logfile

To clear the contents of the debug log file, use the **clear debug-logfile** command.

clear debug-logfile *filename*

Syntax Description

filename	Name of the debug log file to clear.

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 debug log file:

```
switch# clear debug-logfile syslogd_debugs
```

Related Commands

Command	Description
debug logfile	Configures a debug log file.
debug logging	Enables debug logging.
show debug logfile	Displays the contents of the debug log file.

clear install failure-reason

To clear the reason for software installation failures, use the **clear install failure-reason** command.

clear install failure-reason

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 reason for software installation failures:

```
switch# clear install failure-reason
```

Related Commands

Command	Description
show install all	Displays status information for the software installation.

clear license

To uninstall a license, use the **clear license** command.

clear license *filename*

Syntax Description		
	filename	Name of the license file to be uninstalled.

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 a specific license:

```
switch# clear license fm.lic
```

Related Commands	Command	Description
	show license	Displays license information.

clear user

To log out a particular user, use the **clear user** command.

clear user *username*

Syntax Description		
	username	Name of the user to be logged out.

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 log out a specific user:

```
switch# clear user admin
```

Related Commands	Command	Description
	show users	Displays the users currently logged on the switch.

cli var name

To define a command-line interface (CLI) variable for a terminal session, use the **cli var name** command. To remove the CLI variable, use the **no** form of this command.

cli var name *variable-name variable-text*

no cli var name *variable-name*

Syntax Description

variable-name	Name of the variable. The name is alphanumeric, case sensitive, and has a maximum of 31 characters.
variable-text	Variable text. The text is alphanumeric, can contain spaces, and has a maximum of 200 characters.

Command Default

None

Command Modes

EXEC mode

Command History

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

Usage Guidelines

You can reference a CLI variable using the following syntax:

`$(variable-name)`

Instances where you can use variables include the following:

- Command scripts
- Filenames

You cannot reference a variable in the definition of another variable.

The Cisco NX-OS software provides a predefined variable, TIMESTAMP, that you can use to insert the time of day. You cannot change or remove the TIMESTAMP CLI variable.

You cannot change the definition of a CLI variable. You must remove the variable and then create it again with the new definition.

Examples

This example shows how to define a CLI variable:

```
switch# cli var name testvar interface ethernet 1/3
```

This example shows how to reference a CLI variable:

```
switch# show $(testvar)
```

This example shows how to reference the TIMESTAMP variable:

```
switch# copy running-config > bootflash:run-config-$(TIMESTAMP).cnfg
```

This example shows how to remove a CLI variable:

```
switch# cli no var name testvar
```

Related Commands

Command	Description
run-script	Runs command scripts.
show cli variables	Displays the CLI variables.

clock protocol

To set the synchronization protocol for the clock to a protocol, use the **clock protocol** command. To remove the clock protocol, use the **no** form of this command.

clock protocol {**none** | **ntp**}

no clock protocol {**none** | **ntp**}

Syntax Description

none	Specifies that the clock can be set manually.
ntp	Specifies that the clock be set to the Network Time Protocol (NTP).

Command Default

None

Command Modes

Global configuration mode

Command History

Release	Modification
5.1(3)N1(1)	This command was introduced.

Usage Guidelines

This command does not require a license.

Examples

This example shows how to set the synchronization protocol for the clock to NTP:

```
switch# configure terminal
switch(config)# clock protocol ntp
switch(config)#
```

Related Commands

Command	Description
show running-config	Displays the running system configuration information.

clock set

To manually set the clock on a Cisco Nexus 5000 Series switch, use the **clock set** command.

clock set *time day month year*

Syntax Description

time	Time of day. The format is *HH*:*MM*:*SS*.
day	Day of the month. The range is from 1 to 31.
month	Month of the year. The values are **January**, **February**, **March**, **April**, **May**, **June**, **July**, **August**, **September**, **October**, **November**, and **December**.
year	Year. The range is from 2000 to 2030.

Command Default

None

Command Modes

EXEC mode

Command History

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

Usage Guidelines

Use this command when you cannot synchronize the switch with an outside clock source, such as an NTP server.

Examples

This example shows how to manually configure the clock:

```
switch# clock set 12:00:00 04 July 2008
```

Related Commands

Command	Description
show clock	Displays the clock time.

clock summer-time

To configure the summer-time (daylight saving time) offset, use the **clock summer-time** command. To revert to the default, use the **no** form of this command.

clock summer-time *zone-name start-week start-day start-month start-time end-week end-day end-month end-time offset-minutes*

no clock summer-time

Syntax Description

zone-name	Time zone string. The time zone string is a three-character string.
start-week	Week of the month to start the summer-time offset. The range is from 1 to 5.
start-day	Day of the month to start the summer-time offset. Valid values are **Monday**, **Tuesday**, **Wednesday**, **Thursday**, **Friday**, **Saturday**, or **Sunday**.
start-month	Month to start the summer-time offset. Valid values are **January**, **February**, **March**, **April**, **May**, **June**, **July**, **August**, **September**, **October**, **November**, and **December**.
start-time	Time to start the summer-time offset. The format is *HH*:*MM*.
end-week	Week of the month to end the summer-time offset. The range is from 1 to 5.
end-day	Day of the month to end the summer-time offset. Valid values are **Monday**, **Tuesday**, **Wednesday**, **Thursday**, **Friday**, **Saturday**, or **Sunday**.
end-month	Month to end the summer-time offset. Valid values are **January**, **February**, **March**, **April**, **May**, **June**, **July**, **August**, **September**, **October**, **November**, and **December**.
end-time	Time to end the summer-time offset. The format is *HH*:*MM*.
offset-minutes	Number of minutes to offset the clock. The range is from 1 to 1440.

Command Default

None

Command Modes

Global configuration mode
Interface configuration mode

Command History

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

Examples

This example shows how to configure the offset for summer-time or daylight saving time:

```
switch(config)# clock summer-time PDT 1 Sunday March 02:00 5 Sunday November 02:00 60
```

This example shows how to revert to the default offset for summer-time:

```
switch(config)# no clock summer-time
```

Related Commands

Command	Description
show clock	Displays the clock summer-time offset configuration.

clock timezone

To configure the time zone offset from Coordinated Universal Time (UTC), use the **clock timezone** command. To revert to the default, use the **no** form of this command.

clock timezone *zone-name offset-hours offset-minutes*

no clock timezone

Syntax Description

zone-name	Zone name. The name is a 3-character string for the time zone acronym (for example, PST or EST).
offset-hours	Number of hours offset from UTC. The range is from –23 to 23.
offset-minutes	Number of minutes offset from UTC. The range is from 0 to 59.

Command Default

None

Command Modes

Global configuration mode
Interface configuration mode

Command History

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

Usage Guidelines

Use this command to offset the device clock from UTC.

Examples

This example shows how to configure the time zone offset from UTC:

```
switch(config)# clock timezone PST -8 0
```

This example shows how to revert the time zone offset to the default:

```
switch(config)# no clock timezone
```

Related Commands

Command	Description
show clock	Displays the clock time.

configure session

To create or modify a configuration session, use the **configure session** command.

configure session *name*

Syntax Description

name	Name of the session. The name is a case-sensitive, alphanumeric string up to 63 characters.

Command Default

None

Command Modes

EXEC mode

Command History

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

Examples

This example shows how to create a configuration session:

```
switch# configure session MySession
switch(config-s)#
```

Related Commands

Command	Description
show configuration session	Displays information about the configuration sessions.

configure terminal

To enter configuration mode, use the **configure terminal** command.

configure terminal

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

Use this command to enter configuration mode. Commands in this mode are written to the running configuration file as soon as you enter them (using the **Enter** key/**Carriage Return**).

After you enter the **configure terminal** command, the system prompt changes from switch# to switch(config)#, indicating that the switch is in configuration mode. To leave configuration mode and return to EXEC mode, type **end** or press **Ctrl-Z**.

To view the changes to the configuration that you have made, use the **show running-config** command.

Examples

This example shows how to enter configuration mode:

```
switch# configure terminal
switch(config)#
```

Related Commands

Command	Description
copy running-config startup-config	Saves the running configuration as the startup configuration file.
end	Ends your configuration session by exiting to EXEC mode.
exit (global)	Exits from the current configuration mode to the next highest configuration mode.
show running-config	Displays the current running configuration.

copy

To copy any file from a source to a destination, use the **copy** command.

copy *source-url destination-url*

Syntax Description

source-url	Location URL (or variable) of the source file or directory to be copied. The source can be either local or remote, depending upon whether the file is being downloaded or uploaded. For more information, see the "Usage Guidelines" section.
destination-url	Destination URL (or variable) of the copied file or directory. The destination can be either local or remote, depending upon whether the file is being downloaded or uploaded. For more information, see the "Usage Guidelines" section.

Command Default

The default name for the destination file is the source filename.

Command Modes

EXEC mode

Command History

Release	Modification
4.0(0)N1(1a)	This command was introduced.
5.0(2)N2(1)	Support for this command was introduced on external Universal Serial Bus (USB) Flash memory devices.

Usage Guidelines

The **copy** command allows you to copy a file (such as a system image or configuration file) from one location to another location. The source and destination for the file is specified using a Cisco NX-OS file system URL, which allows you to specify a local or remote file location. The file system being used (such as a local memory source or a remote server) determines the syntax used in the command.

You can enter on the command line all necessary source- and destination-URL information and the username to use, or you can enter the **copy** command and have the CLI prompt you for any missing information.

The entire copying process may take several minutes, depending on the network conditions and the size of the file, and differs from protocol to protocol and from network to network.

The colon character (**:**) is required after the file system URL prefix keywords (such as **bootflash**).

In the URL syntax for **ftp:**, **scp:**, **sftp:**, and **tftp:**, the server is either an IPv4 address or a hostname.

Format of Source and Destination URL

The format of the source and destination URLs varies according to the file or directory location. You can enter either a command-line interface (CLI) variable for a directory or a filename that follows the Cisco NX-OS file system syntax (*filesystem*:[*/directory*][*/filename*]).

The following tables list URL prefix keywords by the file system type. If you do not specify a URL prefix keyword, the switch looks for a file in the current directory.

Table 1 lists URL prefix keywords for local writable storage file systems. Table 2 lists the URL prefix keywords for remote file systems. Table 3 lists the URL prefix keywords for nonwritable file systems.

Table 1 URL Prefix Keywords for Local Writable Storage File Systems

Keyword	Source or Destination
bootflash:[*//server/*]	Source or destination URL for boot flash memory. The *server* argument value is **module-1**, **sup-1**, **sup-active**, or **sup-local**.
volatile:[*//server/*]	Source or destination URL of the default internal file system. Any files or directories stored in this file system will be erased when the switch reboots. The *server* argument value is **module-1**, **sup-1**, **sup-active**, or **sup-local**.

Table 2 URL Prefix Keywords for Remote File Systems

Keyword	Source or Destination
ftp:	Source or destination URL for a FTP network server. The syntax for this alias is as follows: **ftp:**[*//server*][*/path*]*/filename*
scp:	Source or destination URL for a network server that supports Secure Shell (SSH) and accepts copies of files using the secure copy protocol (scp). The syntax for this alias is as follows: **scp:**[*//*[*username@*]*server*][*/path*]*/filename*
sftp:	Source or destination URL for an SSH FTP (SFTP) network server. The syntax for this alias is as follows: **sftp:**[*//*[*username@*]*server*][*/path*]*/filename*
tftp:	Source or destination URL for a TFTP network server. The syntax for this alias is as follows: **tftp:**[*//server*[**:***port*]][*/path*]*/filename*

Table 3 URL Prefix Keywords for Special File Systems

Keyword	Source or Destination
core:	Local memory for core files. You can copy core files from the core file system.
debug:	Local memory for debug files. You can copy core files from the debug file system.
log:	Local memory for log files. You can copy log files from the log file system.
modflash:	External memory for mod files. You can copy mod files from modflash file system.
system:	Local system memory. You can copy the running configuration to or from the system file system. The system file system is optional when referencing the running-config file in a command.

Table 3 URL Prefix Keywords for Special File Systems (continued)

Keyword	Source or Destination
usb1:	Source or destination URL for the external Universal Serial Bus (USB) Flash memory devices. You can copy the kickstart and system image to bootflash. **Note** This is applicable only to the Cisco Nexus 5500 Series switches.
volatile:	Local volatile memory. You can copy files to or from the volatile file system. All files in the volatile memory are lost when the physical device reloads.

This section contains usage guidelines for the following topics:

- Copying Files from a Server to Bootflash Memory, page 24
- Copying a Configuration File from a Server to the Running Configuration, page 24
- Copying a Configuration File from a Server to the Startup Configuration, page 24
- Copying the Running or Startup Configuration on a Server, page 24

Copying Files from a Server to Bootflash Memory

Use the **copy** *source-url* **bootflash:** command (for example, **copy tftp:***source-url* **bootflash:**) to copy an image from a server to the local bootflash memory.

Copying a Configuration File from a Server to the Running Configuration

Use the **copy** {**ftp:** | **scp:** | **sftp:** | **tftp:**}*source-url* **running-config** command to download a configuration file from a network server to the running configuration of the device. The configuration is added to the running configuration as if the commands were typed in the CLI. The resulting configuration file is a combination of the previous running configuration and the downloaded configuration file. The downloaded configuration file has precedence over the previous running configuration.

You can copy either a host configuration file or a network configuration file. Accept the default value of *host* to copy and load a host configuration file containing commands that apply to one network server in particular. Enter *network* to copy and load a network configuration file that contains commands that apply to all network servers on a network.

Copying a Configuration File from a Server to the Startup Configuration

Use the **copy** {**ftp:** | **scp:** | **sftp:** | **tftp:**}*source-url* **startup-config** command to copy a configuration file from a network server to the switch startup configuration. These commands replace the startup configuration file with the copied configuration file.

Copying the Running or Startup Configuration on a Server

Use the **copy running-config** {**ftp:** | **scp:** | **sftp:** | **tftp:**}*destination-url* command to copy the current configuration file to a network server that uses FTP, scp, SFTP, or TFTP. Use the **copy startup-config** {**ftp:** | **scp:** | **stfp:** | **tftp:**}*destination-url* command to copy the startup configuration file to a network server.

You can use the copied configuration file copy as a backup.

Examples

This example shows how to copy a file within the same directory:

```
switch# copy file1 file2
```

This example shows how to copy a file to another directory:

```
switch# copy file1 my-scripts/file2
```

This example shows how to copy a file to another file system:

```
switch# copy file1 bootflash:
```

This example shows how to copy a file to another supervisor module:

```
switch# copy file1 bootflash://sup-1/file1.bak
```

This example shows how to copy a file from a remote server:

```
switch# copy scp://192.168.1.1/image-file.bin bootflash:image-file.bin
```

This example shows how to copy the kickstart and system image to bootflash:

```
switch# copy usb1: bootflash:
```

Related Commands

Command	Description
cd	Changes the current working directory.
delete	Delete a file or directory.
dir	Displays the directory contents.
move	Moves a file.
pwd	Displays the name of the current working directory.

copy running-config startup-config

To save the running configuration to the startup configuration file so that all current configuration details are available after a reboot, use the **copy running-config startup-config** command.

copy running-config startup-config

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

To view the changes to the configuration that you have made, use the **show startup-config** command.

Note Once you enter the **copy running-config startup-config** command, the running and the startup copies of the configuration are identical.

Examples

This example shows how to save the running configuration to the startup configuration:

```
switch# copy running-config startup-config
```

Related Commands

Command	Description
show running-config	Displays the currently running configuration.
show startup-config	Displays the startup configuration file.