

# HP Storage Essentials

**Software Version: 9.4.1**

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## CLI Guide

Document Release Date: Friday, July 08, 2011

Software Release Date: July 2011



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This product includes software developed by the Apache Software Foundation (<http://www.apache.org/>).

This product includes software developed by the JDOM Project (<http://www.jdom.org/>).

This product includes cryptographic software written by Eric Young ([eay@cryptsoft.com](mailto:eay@cryptsoft.com)).

This product includes software developed by the OpenSSL Project for use in the OpenSSL Toolkit (<http://www.openssl.org/>).

This product includes software written by Tim Hudson ([tjh@cryptsoft.com](mailto:tjh@cryptsoft.com)).

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# 1 Overview of the CLI

Depending on your license, the Command Line Interface (CLI) might not be available. See the List of Features to determine if you have access to the CLI. The List of Features is accessible from the Documentation Center (**Help > Documentation Center** in HP Storage Essentials).

The CLI provides an alternate way for you to manage elements that the management server monitors. You can use the CLI commands in scripts to manage your storage. For example, you can use the `appiqlist -event -all` command in a script to obtain a listing of the events.

Before you can use the CLI, you must install it. Install the CLI on a remote server. See the *Release Notes* for the version requirements. For more information on how to install the CLI, see [Installing the CLI on page 33](#).

Before you can use the CLI interface, you must make a connection to the management server (see [Before Using the CLI on next page](#)).

The following special characters are not supported:

- %
- ^
- &

To enter parameters that include those characters, enter the values against prompts after invoking the `appiqconfig` command without any parameters; for example:

- C:\cli\bin>appiqconfig
- Username: test\_user
- Password: test^user1
- Server: <IPAddress/DNS name>
- Transport [optional]:
- Port [optional]:
- ErrorOutput [optional]:
- CLI configuration is set; ready to issue commands

On Solaris or AIX, CLI commands must be entered in lowercase letters.

If the UNIX shell environment variable \$PATH is not set with the current directory, prefix the command with `./` when running it on UNIX.

If \$PATH is set to include `/opt/APPQcli/bin`, you can run the CLI commands from any directory.

You must use root permissions to run the CLI on Solaris and Linux operating systems because the CLI was installed with root permissions.

You can run the CLI commands anywhere as long as you provide the path to the bin directory:

**Microsoft Windows:**

C:\\CLI\\bin

**UNIX:**

/opt/APPQcli/bin

Some of the things that CLI commands can do include identifying and managing the following.

Identify:

- Backup information
- Interconnects between the various components in the domain
- Detailed configuration of each component
- Capacity, performance, status, and event information from each device and its components
- Information about zone, zone aliases, and zone sets
- Volume information

Manage:

- Get Details
- Events
- LUNs
- Pools
- Volumes
- Zone aliases
- Zone sets
- Zones

To exit the CLI, enter `exit` or `quit`.

## Before Using the CLI

Before you can use the CLI, you must configure the CLI environment. To connect to the management server, enter the following command on the computer from which you will run the CLI commands. This computer must already have the CLI installed.

Run the CLI only from a remote server. Do not use the CLI that is installed with the management server. The CLI on the management server is intended only for internal use by the software. See [Installing the CLI on page 33](#).

**Microsoft Windows:**

```
appiqconfig -username <name> -password <passwd> -server <ip/name> -  
transport <transport> -erroroutput <erroroutput> -port <port>
```

**UNIX:**

```
./appiqconfig -username <name> -password <passwd> -server <ip/name>  
-transport <transport> -erroroutput <erroroutput> -port <port>
```

In this instance:

- <name> is the user name you use to log on to the management server. Also include its domain name; for example, domain\Administrator, especially if you are using Active Directory or LDAP.
- <passwd> is the password you use to log on to the management server.
- <ip/name> is the IP address or server name of the server running the management server.

*Optional:* <transport> is the transport to be used for the CLI commands. The management server supports the following transport types:

- https – Default setting if the transport type is not specified.
- http
- RMI

*Optional:* <erroroutput> determines how much information is provided in error messages. The options are:

- **none** – Withholds information about errors.
- **minimal (min)** – Displays numeric return code, no-exception messaging, or stack trace produced. Use either min or minimal.
- **standard (std)** – The default setting, which displays numeric error return code as well as a brief textual message (if available) describing the error. You can also use std for standard.
- **maximum (max)** – The “debug” level setting, which, aside from the numeric error code, dumps a stack trace for any thrown exception. Use either max or maximum.

*Optional:* <port> sets the port for the CLI. Use this when you want to use a nonstandard port for the CLI. If you do not set this option, the management server uses the following standard communication ports:

- HTTP – 80
- HTTPS – 443
- RMI – 1099

## Accessing the CLI Help from the CLI

Online help for the command line interface (CLI) is accessible not only by clicking the Help button on the management server, but also from the CLI window. Help can be accessed from the CLI window by appending -help or -h to the command. For example, assume you want to list all the statistics for a host, but you don't know the full command. You could enter a portion of the command and append it with -help, as shown in the following example:

**Microsoft Windows:**

```
appiqstats -help
```

**UNIX:**

```
./appiqstats -help
```

The software would provide information about the appiqstats command.

To view the overall help for the CLI, enter the following at the command prompt:

```
cli -help
```

Before you can use the CLI, you must make a connection to the management server (see [Before Using the CLI on page 28](#)).

## About Error Codes

The management server provides error codes to help you in determining what went wrong. Each error code corresponds to one of the descriptions listed in the following table:

Error Code	Description
0	No Error
1	Unknown Operation
2	Unsupported Operation
3	Bad Parameter List
4	Bad ID Parameter
5	Bad Parameter Value
6	Bad Command
7	API Error
8	CLI Configuration Error
9	Help Error
10	General Error

## Accessing Error Codes

To access error codes, enter one of the following at the command prompt after you enter a CLI command:

**Microsoft Windows:**

```
echo %errorlevel%
```

**UNIX (C shell):**

```
echo $status
```

**UNIX (Bourne shell, Bourne Again shell, and Korn shell)**

```
echo $?
```

The error code is returned, for example 0, which means there is no error.



## 2 Installing the CLI

Install the CLI on a remote server that can access the management server.

If you have a previous version of the CLI, you must upgrade it to match the current version of the management server. See [Upgrading the CLI on page 38](#) for more information.

Related Topics:

[Installing the CLI on Microsoft Windows below](#)

[Installing the CLI on Sun Solaris on next page](#)

[Installing the CLI on Linux on page 35](#)

[Installing the CLI on IBM AIX on page 36](#)

[Upgrading the CLI on page 38](#)

### Installing the CLI on Microsoft Windows

To install the CLI on Microsoft Windows:

1. Go to the Windows directory on the Utilities CD-ROM.
2. Double-click **InstallCli.exe**.

When you see the introduction screen, click **Next**.

3. When you are asked for an installation directory, you can select the default or choose your own. To choose your own directory, click **Choose**. You can always display the default directory by clicking **Restore Default Folder**.

When you are done, click **Next**.

4. Check the notes for any information that applies to your installation. Click **Next**.
5. Check the pre-installation summary. You are shown the following:

- Product Name
- Installation Folder
- Disk Space Required
- Disk Space Available

6. Do one of the following:

- Click **Install** if you agree with the pre-installation summary.  
*Or*
- Click **Previous** if you want to modify your selections.

The CLI is installed.

7. When you are told the installation was successful, click **Done** to quit the installation.
8. Go to the following directory:  
C:\APPQ\CLI\bin
9. Configure the CLI workstation to point to the management server. See [Before Using the CLI on page 28](#).

## Installing the CLI on Sun Solaris

You must have root privileges to install this software.

There are several installation options. One is an interactive option, which lets you select the installation directory. Another is a silent installation, which installs with no user input. The silent installation assumes the default installation directory. Both options install on computers with or without X Windows.

To install the CLI on Sun Solaris:

1. Go to the /Solaris directory on the Utilities CD-ROM by entering the following at the command prompt:

```
# cd /cdrom/Solaris
```

In this instance, /cdrom is the directory where you mounted the CD-ROM.

2. To install the software, do one of the following:

If you receive a message saying there is not enough room in the temp directory to perform the installation, set the IATEMPDIR variable to another directory. The installation uses this directory to extract the installation files. See the documentation for your operating system for information on how to set this variable.

### **Interactive installation (without X Windows or Telnet terminal session)**

You must enter `-i console`; otherwise, you are shown a traceback error. Enter the following at the command prompt:

```
# ./InstallCli.bin -i console
```

### **Interactive installation (with X Windows)**

Enter the following at the command prompt:

```
# ./InstallCli.bin
```

### **Silent installation (X Windows not required)**

Enter the following at the command prompt, and then go to step 6. You cannot change the installation directory.

```
# ./InstallCli.bin -i silent
```

The CLI is automatically installed in the /opt/APPQcli directory.

3. During the installation, you are asked for the installation directory. For best results, select the default installation directory.

4. Go to a directory other than one on the CD-ROM.

5. Unmount the CD-ROM by entering the following at the command prompt:

```
# umount /cdrom
```

In this instance, /cdrom is the name of the directory where you mounted the CD-ROM.

6. Go to the [*CLI\_installation\_directory*]/bin directory. In this instance, [*CLI\_installation\_directory*] is the directory that contains the CLI program.

7. Configure the CLI workstation to point to the management server (see [Before Using the CLI on page 28](#)).

## Installing the CLI on Linux

You must have root privileges to install this software.

You are provided several installation options. One is an interactive option, which lets you select the installation directory. Another is a silent installation, which installs with no user input. The silent installation assumes the default installation directory. Both options install on computers with or without X Windows.

To install the CLI on Linux:

1. Insert the Utilities CD into the CD-ROM drive.

2. Mount the CD-ROM drive by entering the following commands at the command prompt:

```
# mkdir -p /mnt/extensions  
# mount /dev/cdrom /mnt/extensions
```

In this instance, /dev/cdrom is the CD device.

3. Go to the /linux directory on the Utilities CD by entering the following at the command prompt:

```
# cd /mnt/extensions/linux
```

In this instance, /mnt/extensions is the directory where you mounted the CD-ROM.

4. To install the software, do one of the following:

If you receive a message saying there is not enough room in the temp directory to perform the installation, set the IATEMPDIR variable to another directory. The installation uses this directory to extract the installation files. See the documentation for your operating system for information on how to set this variable.

### Interactive installation (without X Windows or Telnet terminal session)

You must enter `-i console`; otherwise, you are shown a traceback error. Enter the following at the command prompt:

```
# ./InstallCli.bin -i console
```

### **Interactive installation (with X Windows)**

Set the DISPLAY environment variable using the following commands:

```
# DISPLAY=<ip-address>:displaynumber.screennumber
```

In this instance, `<ip-address>` is the address of the client from where the Installer script is launched.

```
# export DISPLAY
```

For example: # `DISPLAY=172.168.10.15:0.0`

```
# export DISPLAY
```

Enter the following at the command prompt:

```
# ./InstallCli.bin
```

### **Silent installation (X Windows not required)**

Enter the following at the command prompt, and then go to step 6. You cannot change the installation directory.

```
# ./InstallCli.bin -i silent
```

The CLI is automatically installed in the `/opt/APPQcli` directory.

5. During the installation, you are asked for the installation directory. For best results, select the default installation directory.
6. Go to a directory other than one on the CD-ROM.
7. Unmount the CD-ROM by entering the following at the command prompt:

```
# umount /mnt/extensions
```

8. Go to the `[CLI_installation_directory]/bin` directory.

In this instance, `[CLI_installation_directory]` is the directory that contains the CLI program.

9. Configure the CLI workstation to point to the management server. See [Before Using the CLI on page 28](#).

## **Installing the CLI on IBM AIX**

You are provided several installation options. One is an interactive option, which lets you select the installation directory. Another is a silent installation, which installs with no user input. The silent installation assumes the default installation directory. Both options install on computers with or without X Windows.

To install the CLI on IBM AIX:

1. Insert the Utilities CD-ROM into the CD-ROM drive.
2. Mount the CD-ROM drive by entering the following at the command prompt:

```
# mount -rv cdrfs /dev/cd0 /cdrom
```

In this instance, /dev/cd0 is the name of the CD-ROM drive.

If necessary, create a /cdrom directory first.

3. Go to the /aix directory on the CD-ROM by entering the following at the command prompt:

```
# cd /cdrom/aix
```

In this instance, /cdrom is the directory where you mounted the CD-ROM.

4. To install the software, do one of the following:

If you receive a message saying there is not enough room in the temp directory to perform the installation, set the IATEMPDIR variable to another directory. The installation uses this directory to extract the installation files. See the documentation for your operating system for information on how to set this variable.

#### **Interactive installation (without X Windows or Telnet terminal session)**

You must enter `-i console`; otherwise, you are shown a traceback error. Enter the following at the command prompt:

```
# ./InstallCli.bin -i console
```

#### **Interactive installation (with X Windows)**

Enter the following at the command prompt:

```
# ./InstallCli.bin
```

#### **Silent installation (X Windows not required)**

Enter the following at the command prompt, and then go to step 6. You cannot change the installation directory.

```
# ./InstallCli.bin -i silent
```

The CLI is automatically installed in the /opt/APPQcli directory.

5. During the installation, you are asked for the installation directory. For best results, select the default installation directory.
6. Go to a directory other than one on the CD-ROM.
7. Unmount the CD-ROM by entering the following at the command prompt:

```
# umount /cdrom
```

In this instance, /cdrom is the name of the directory where you mounted the CD-ROM.

8. Go to the [CLI\_installation\_directory]/bin directory. In this instance, [CLI\_installation\_directory] is the directory that contains the CLI program.

9. Configure the CLI workstation to point to the management server. See [Before Using the CLI on page 28](#).

## Upgrading the CLI

You can upgrade the CLI by running the installation as described in the previous sections. The installation detects an existing version, and it upgrades the CLI to the same location.

## Removing the CLI

To remove the CLI from Microsoft Windows:

1. Go to Add/Remove Programs.
2. Select the CLI program from the list.
3. Click **Change/Remove**.
4. When you are told the product is about to be uninstalled, click **Uninstall**.
5. When the program is done with removing the product, click **Done**.

The CLI is removed from Microsoft Windows.

To remove the CLI from UNIX:

1. Go to the following directory by entering the following at the command prompt:

```
# cd [InstallationDirectory]/Uninstall_[company_name]_CLI
```

In this instance, [InstallationDirectory] is the directory that contains the CLI.

2. Remove the CLI by entering the following at the command prompt:

```
# ./Uninstall_[company_name]_CLI
```

# 3 CLI Commands

Before you can use the CLI, you must make a connection to the management server. See [Before Using the CLI on page 28](#) for more information.

HP recommends that you use the CLI prompt to enter your commands instead of typing the “appiq” prefix in the CLI commands. You can avoid typing the “appiq” prefix in the CLI commands by entering **cli** at the command prompt.

Each time you use the appiq prefix in a command at the command prompt, the CLI client must reestablish a connection with the management server. In comparison, when you use the CLI command prompt, a connection with the management server is established only once, not each time you enter a command. Because the CLI command prompt only establishes a connection once, it uses fewer resources and runs faster than entering commands at the command prompt. Using the CLI command prompt to enter commands is sometimes referred to as interactive mode.

To access the CLI prompt and enter a command:

1. Enter the following:

```
cli
```

2. Enter the following:

```
cli> list -event -all
```

The appiq prefix is removed.

## CLI Version

You can find the version of the CLI by entering the following:

### **Microsoft Windows:**

```
cli -version
```

### **UNIX:**

```
./cli -version
```

At the CLI prompt you can enter **-version** or **version**, as in the following example:

```
CLI> -version (or) version
```

## Applications

Use the following CLI commands for applications:

- [appiqlist -application -all on next page](#)
- [appiqlist -application <id> on next page](#)
- [appiqlist -application -database -all on next page](#)

- appiqlist -application -exchange -all below
- appiqlist -application -virtual -all below
- appiqshow -application <id> below
- appiqshow -application -all below
- appiqshow -application -database -all below
- appiqshow -application -exchange -all on the facing page
- appiqshow -application -virtual -all on the facing page
- appiqstats -application -all on the facing page
- appiqstats -application <id> on the facing page

### appiqlist -application -all

**Description:** Provides a short description of all the applications.

### appiqlist -application <id>

**Description:** Provides a short description of the specified application identifier. In this instance, <id> is the identifier for the application. The identifier for the application can be obtained using several methods, such as the appiqlist -application -all command.

### appiqlist -application -database -all

**Description:** Lists all the database applications.

### appiqlist -application -exchange -all

**Description:** Lists all the Microsoft Exchange applications.

### appiqlist -application -virtual -all

**Description:** Lists all the virtual applications.

### appiqshow -application <id>

**Description:** Displays detailed information about the specified application. In this instance, <id> is the identifier for the application. The identifier for the application can be obtained using several methods, such as the appiqlist -application -all command.

### appiqshow -application -all

**Description:** Displays detailed information about all the applications.

### appiqshow -application -database -all

**Description:** Displays detailed information about all the database applications.

## appiqshow -application -exchange -all

**Description:** Displays detailed information about all the Microsoft Exchange applications.

## appiqshow -application -virtual -all

**Description:** Displays detailed information about all the virtual applications.

## appiqstats -application -all

**Description:** Shows the statistical information about all the applications.

## appiqstats -application <id>

**Description:** Shows the statistical information about the specified applications.

In this instance, <id> is the identifier for the application. The identifier for the application can be obtained using several methods, such as the appiqlist -application -all command.

# Backups

Use the following CLI commands to manage backups:

- appiqlist -backup -backupmanager -all on next page
- appiqlist -backup -backupmanager <ID> on next page
- appiqlist -backup -backupmanager <ID> -all on next page
- appiqlist -backup -backupmanager <ID> -mediamanager on next page
- appiqlist -backup -backupmanager <ID> -schedule on page 43
- appiqlist -backup -backupmanager <ID> -job -all on page 43
- appiqlist -backup -backupmanager <ID> -job -success on page 43
- appiqlist -backup -backupmanager <ID> -job -failure on page 43
- appiqlist -backup -backupmanager <ID> -job -partial on page 43
- appiqlist -backup -backupmanager <ID> -mediapool on page 43
- appiqlist -backup -backupmanager <ID> -media on page 43
- appiqlist -backup -backupmanager <ID> -policy on page 44
- appiqlist -backup -backupmanager <ID> -client on page 44
- appiqlist -backup -mediamanager <ID> on page 44
- appiqlist -backup -mediamanager <ID> -tapelibrary on page 44
- appiqlist -backup -mom -all on page 44
- appiqlist -backup -mom <ID> on page 44

- appiqshow -backup -backupmanager -all on page 44
- appiqshow -backup -backupmanager <ID> on page 44
- appiqshow -backup -backupmanager <ID> -all on page 44
- appiqshow -backup -backupmanager <ID> -mediamanager on page 45
- appiqshow -backup -backupmanager <ID> -schedule on page 45
- appiqshow -backup -backupmanager <ID> -job -all on page 45
- appiqshow -backup -backupmanager <ID> -job -success on page 45
- appiqshow -backup -backupmanager <ID> -job -failure on page 45
- appiqshow -backup -backupmanager <ID> -job -partial on page 45
- appiqshow -backup -backupmanager <ID> -mediapool on page 45
- appiqshow -backup -backupmanager <ID> -media on page 46
- appiqshow -backup -backupmanager <ID> -policy on page 46
- appiqshow -backup -backupmanager <ID> -client on page 46
- appiqshow -backup -mediamanager <ID> on page 46
- appiqshow -backup -mediamanager <ID> -tapelibrary on page 46
- appiqshow -backup -mom -all on page 46
- appiqshow -backup -mom <ID> on page 46

### **appiqlist -backup -backupmanager -all**

**Description:** Lists all the backup managers.

### **appiqlist -backup -backupmanager <ID>**

**Description:** Provides the name of the backup manager.

You can find the identifier for the specified backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqlist -backup -backupmanager <ID> -all**

**Description:** Lists all the subcomponents of the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqlist -backup -backupmanager <ID> -mediamanager**

**Description:** Lists all the media managers connected to the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -schedule`

**Description:** Lists all the backup schedules of the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -job -all`

**Description:** Lists all the backup jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -job -success`

**Description:** Lists all the successful jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -job -failure`

**Description:** Lists all the failed jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -job -partial`

**Description:** Lists all the partially success jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -mediapool`

**Description:** Lists all the backup media pools configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### `appiqlist -backup -backupmanager <ID> -media`

**Description:** Lists all the available backup media for the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqlist -backup -backupmanager <ID> -policy

**Description:** Lists all the backup policies configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqlist -backup -backupmanager <ID> -client

**Description:** Lists all the backup clients associated with the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqlist -backup -mediamanager <ID>

**Description:** Provides the name of the media manager.

## appiqlist -backup -mediamanager <ID> -tapelibrary

**Description:** Lists all the tape libraries connected to the media manager.

You can find the identifier for the media manager through the `appiqlist -backup -backupmanager <ID> -mediamanager` command.

## appiqlist -backup -mom -all

**Description:** Lists all of the master of master servers.

## appiqlist -backup -mom <ID>

**Description:** Provides the name of the specified master of master server.

## appiqshow -backup -backupmanager -all

**Description:** Provides a detailed description of all the backup managers.

## appiqshow -backup -backupmanager <ID>

**Description:** Provides a detailed description of the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -all

**Description:** Provides a detailed description of all the subcomponents of the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -mediamanager

**Description:** Provides a detailed description of all the media managers connected to the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -schedule

**Description:** Provides a detailed description of all the backup schedules of the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -job -all

**Description:** Provides a detailed description of all the backup jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -job -success

**Description:** Provides a detailed description of all the success jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -job -failure

**Description:** Provides a detailed description of all the failed jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -job -partial

**Description:** Provides a detailed description of all the partially success jobs configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

## appiqshow -backup -backupmanager <ID> -mediapool

**Description:** Provides a detailed description of all the backup media pools configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqshow -backup -backupmanager <ID> -media**

**Description:** Provides a detailed description of all the available backup media for the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqshow -backup -backupmanager <ID> -policy**

**Description:** Provides a detailed description of all the backup policies configured on the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqshow -backup -backupmanager <ID> -client**

**Description:** Provides a detailed description of all the backup clients associated with the backup manager.

You can find the identifier for the backup manager through the `appiqlist -backup -backupmanager -all` command.

### **appiqshow -backup -mediamanager <ID>**

**Description:** Provides a detailed description of the media manager.

You can find the identifier for the media manager through the `appiqlist -backup -backupmanager <ID> -mediamanager` command.

### **appiqshow -backup -mediamanager <ID> -tapelibrary**

**Description:** Provides a detailed description of all the tape libraries connected to the media manager.

You can find the identifier for the media manager through the `appiqlist -backup -backupmanager <ID> -mediamanager` command.

### **appiqshow -backup -mom -all**

**Description:** Provides a detailed description of all the master of master servers.

### **appiqshow -backup -mom <ID>**

**Description:** Provides a detailed description of the specified master of master server.

## Configuration

Use the following CLI commands to configure the management server:

- `appiqadd -configuration -discovery -name <Schedule Name> -description <text> -nextrun <date@time> -interval <frequency@duration> -discoverygrou p <ids> [-infrastructure -backup -refresh -enable]` on next page
- `appiqconfig -logout` on next page
- `appiqconfig -default [-server <IPAddress/DNS name>]` on next page
- `appiqedit -configuration -discovery <id> -name <Schedule Name> -description <text> -nextrun <date@time> -interval <frequency@duration> -discoverygrou p <ids> [-enable]` on page 49
- `appiqedit -configuration -performance -dataaging <id> -nextrun <date@time> -interval <frequency@duration> [-enable]` on page 49
- `appiqedit -configuration -performance -datacollection <id> -nextrun <date@time> -interval <frequency@duration> -enable` on page 49
- `appiqedit -configuration -producthealth -diskspace -nextrun <date@time> -interval <frequency@duration> [-enable]` on page 49
- `appiqedit -configuration -producthealth -logfile -nextrun <date@time> -interval <frequency@duration> [-enable]` on page 49
- `appiqedit -configuration -producthealth -rmanbackup -nextrun <date@time> -interval <frequency@duration> [-enable]` on page 49
- `appiqedit -reports -cache -nextrun <date@time> -interval <frequency@duration> -enable` on page 50
- `appiqlist -configuration -discovery` on page 50
- `appiqlist -configuration -discovery <id>` on page 50
- `appiqlist -configuration -performance -dataaging` on page 51
- `appiqlist -configuration -performance -dataaging <id>` on page 51
- `appiqlist -configuration -performance -datacollection` on page 51
- `appiqlist -configuration -performance -datacollection <id>` on page 51
- `appiqlist -configuration -producthealth -diskspace` on page 51
- `appiqlist -configuration -producthealth -logfile` on page 51
- `appiqlist -configuration -producthealth -rmanbackup` on page 51
- `appiqlist -configuration -reports -cache` on page 51
- `appiqlist -configuration -server -address` on page 51
- `appiqrun -configuration -performance -datacollection <ids>` on page 52

- appiqrun -configuration -reports -cache on page 52
- appiqshow -configuration -discovery on page 52
- appiqshow -configuration -discovery <id> on page 52
- appiqshow -configuration -performance -dataaging on page 52
- appiqshow -configuration -performance -dataaging <id> on page 52
- appiqshow -configuration -performance -datacollection on page 52
- appiqshow -configuration -producthealth -diskspace on page 53
- appiqshow -configuration -producthealth -logfile on page 53
- appiqshow -configuration -producthealth -rmanbackup on page 53
- appiqshow -configuration -reports -cache on page 53
- appiqshow -configuration -server -address on page 53
- appiqstop -configuration -performance -datacollection <ids> on page 53

**appiqadd -configuration -discovery -name <Schedule Name> -description <text> -nextrun <date@time> -interval <frequency@duration> - discoverygroup <ids> [-infrastructure -backup -refresh -enable]**

**Description:** Adds a new schedule for discovery.

**Note:** `-disable` option is not available for this command.

**appiqconfig -logout**

**Description:** Ends the CLI session with management server.

**appiqconfig -default [-server <IPAddress/DNS name>]**

**Description:** Sets the default configuration in the `cli.cfg` file, and connects to the management server with the default configuration.

The `-server` identifier is optional. If the `-server` identifier is not listed, the CLI uses “localhost” as the server name. The default values for admin and password are “admin” and “password.”

**appiqedit -configuration -backup -imagecollection <id> -nextrun <date@time> -interval <frequency@duration> -enable**

**Description:** Edits the Backup Image Collection schedule.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

**Note:** `-disable` option is not available for this command.

```
appiqedit -configuration -discovery <id> -name <Schedule Name> -  
description  
<text> -nexrun date@time -interval <frequency@duration> -  
discoverygroup <ids> [-enable]
```

**Description:** Edits the discovery schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -performance -dataaging <id> -nexrun  
<date@time> -interval <frequency@duration> [-enable]
```

**Description:** Edits the performance data aging schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -performance -datacollection <id> -nexrun  
date@time -interval <frequency@duration> -enable
```

**Description:** Edits the performance data collection schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -producthealth -diskspace -nexrun  
date@time -interval <frequency@duration> [-enable]
```

**Description:** Edits the product health disk space schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -producthealth -logfile -nexrun  
<date@time> -interval <frequency@duration> [-enable]
```

**Description:** Edits the product health log file schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -producthealth -rmanbackup -nexrun  
date@time -interval <frequency@duration> [-enable]
```

**Description:** Edits the product health rmanbackup schedule.

**Note:** -disable option is not available for this command.

```
appiqedit -configuration -reports -cache -nextrun <date@time>
-interval <frequency@duration> -enable
```

**Description:** Resets report cache schedule parameters.

**Note:** -disable option is not available for this command.

**Note:** -disable option is not available for this command.

```
appiqedit -domaindiscovery -application -databaseinfo -address <IP/DNS
Name> -managementaddress <IP/DNS Name> -server <name> -port
<number> -type <oracle/sybase/cache/sqlserver/db2/informix> -
username
<name> [-serviceprincipalname <name>]
```

**Description:** Edits database information. If you are using SQL Server in Windows authentication mode, use the optional -serviceprincipalname tag to specify the service principal name.

In this instance:

-password, -description, and -serviceprincipalname are editable tags.

```
appiqlist -configuration -backup -imagecollection
```

**Description:** Lists all image collection schedules.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

```
appiqlist -configuration -backup -imagecollection <id>
```

**Description:** Lists the specified image collection schedule.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

```
appiqlist -configuration -discovery
```

**Description:** Lists all discovery schedules. This command works in the same way as the Discovery tab on the Configuration tab on the main page of the management server's user interface.

```
appiqlist -configuration -discovery <id>
```

**Description:** Lists the specified discovery schedule. This command works in the same way as the Discovery tab on the Configuration tab on the main page of the management server's user interface.

## appiqlist -configuration -performance -dataaging

**Description:** Lists performance data aging schedules. This command works the same was as the Data Aging tab on the Performance tab in the management server's user interface.

## appiqlist -configuration -performance -dataaging <id>

**Description:** Lists the specified performance data aging schedule. This command works the same was as the Data Aging tab on the Performance tab in the management server's user interface.

## appiqlist -configuration -performance -datacollection

**Description:** Lists performance data collection for all schedules. This command works in the same way as the Data Collection tab on the Performance tab in the management server's user interface.

## appiqlist -configuration -performance -datacollection <id>

**Description:** Lists the specified data collection schedules. This command works in the same way as the Data Collection tab on the Performance tab in the management server's user interface.

## appiqlist -configuration -producthealth -diskspace

**Description:** Lists all product health disk space schedules.

## appiqlist -configuration -producthealth -logfile

**Description:** Lists the product health log file schedule.

## appiqlist -configuration -producthealth -rmanbackup

**Description:** Lists the product health rmanbackup schedule.

## appiqlist -configuration -reports -cache

**Description:** Lists report cache schedule basic details.

## appiqlist -configuration -server -address

**Description:** Displays the IP address of the management server connected to the CLI.

## appiqlist -configuration -backup -imagecollection <ids>

**Description:** Runs the Backup Image Collection schedule.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

## appiqrun -configuration -performance -datacollection <ids>

**Description:** Runs performance data collection schedules. The Schedule ID may be one or many.

## appiqrun -configuration -reports -cache

**Description:** Refreshes the report cache.

## appiqshow -configuration -backup -imagecollection

**Description:** Shows details of all image collection schedules.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

## appiqshow -configuration -backup -imagecollection <id>

**Description:** Shows details of the specified image collection schedule.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

## appiqshow -configuration -discovery

**Description:** Shows details of all discovery schedules. This command works in the same way as the Discovery tab on the Configuration tab on the main page of the management server's user interface.

## appiqshow -configuration -discovery <id>

**Description:** Shows details of the specified discovery schedule.

## appiqshow -configuration -performance -dataaging

**Description:** Shows details of all performance data aging schedules. The same information is provided as resides on the Data Collection tab in the user interface.

## appiqshow -configuration -performance -dataaging <id>

**Description:** Shows details of the specified performance data aging schedule.

## appiqshow -configuration -performance -datacollection

**Description:** Shows details of performance datacollection for all schedules. This command works in the same way as the Data Collection tab on the Performance tab in the management server's user interface.

## appiqshow -configuration -performance -datacollection <id>

**Description:** Shows details of the specified data collection schedule.

**appiqshow -configuration -producthealth -diskspace**

**Description:** Shows details of product health disk space schedules.

**appiqshow -configuration -producthealth -logfile**

**Description:** Shows details of the product health log file schedule.

**appiqshow -configuration -producthealth -rmanbackup**

**Description:** Shows details of the product health rmanbackup schedule.

**appiqshow -configuration -reports -cache**

**Description:** Shows details of the report cache schedule.

**appiqshow -configuration -server -address**

**Description:** Displays the IP address and user name of the management server connected to the CLI.

**appiqstop -configuration -backup -imagecollection <ids>**

**Description:** Stops the Backup Image Collection schedule.

Image collection is not applicable to EMC NetWorker and to IBM Tivoli Storage Manager (TSM).

**appiqstop -configuration -performance -datacollection <ids>**

**Description:** Stops running performance data collection schedules. The schedule ID may be one or many.

## Discovery

Use the following CLI commands to perform discovery, obtain the topology, and gather details from elements. For additional information about discovery, refer to “Discovering NAS Devices, Tape Libraries, Switches and Storage Systems” and “Discovering Applications, BackupServers and Hosts” in the *User Guide*.

Some of the commands have an optional -sync flag. If you specify the –sync flag, the command will be in synchronous mode, meaning the management server will not accept new commands until it is done with discovery.

For a complete list of discovery commands, see the table of contents.

```
appiqadd -domainDiscovery -address <IP/DNS Name> -username  
<name>  
-password <pwd> -Comment <text>
```

**Description:** Adds the address of an element in the same way as the **Add Address** button does in discovery Step 1 of the management server's user interface

```
appiqadd -domainDiscovery -iprange -fromaddress <IP/DNS Name>  
-toaddress <IP/DNS Name> -username <name> -password <pwd> -  
comment <text>
```

**Description:** Adds the IP address range to the domain discovery address list.

```
appiqcreate -domainDiscovery -application -databaseinfo -address  
<IP/DNS Name> -managementaddress <IP/DNS Name> -server <name>  
-port <number> -type <oracle/sybase/cache/sqlserver/db2/informix> -  
username <name> -databasename <db name> -db2path <path name>
```

**Description:** Creates a new entry for database information.

Add `-db2path <path name>` to the end of the command only if you are using DB2.

If you are using SQL Server in Windows authentication mode, use the optional `-serviceprincipalname` tag to specify the service principle name.

```
appiqcreate -domainDiscovery -application -domaincontrollerinfo -  
domain <Name>  
-domaincontroller <name> -username <name> -password <pwd> [-  
primary]
```

**Description:** Creates a new entry for the exchange domain controller. The `-primary` tag is required if the domain controller is primary.

```
appiqcreate -domainDiscovery -application -tnslistenerport <port number>
```

**Description:** Creates a new entry for the Oracle TNS Listener Port.

```
appiqcreate -domaindiscovery -application -usercredentials -username <name>
             -password <password> -description <text> -type <oracle/sybase/cache/
sqlserver/db2/informix> [-authentication <mixed/windows> [-domaincontroller <name>]]
```

**Description:** Creates user credentials. If the database type is SQL Server, use the optional `-authentication` tag to specify mixed mode or Windows mode. If you specify Windows mode, use the optional `-domaincontroller` tag to specify the domain controller.

```
appiqdelete -domaindiscovery -accesspoint <ids>
```

**Description:** Removes the specified access points from the discovery Step 2 and Step 3 list.

```
appiqdelete -domaindiscovery -accesspoint -all
```

**Description:** Removes all access points from the discovery Step 2 and Step 3 list.

```
appiqdelete -domaindiscovery -address <ids>
```

**Description:** Removes the specified discovery addresses from the discovery Step 1 list.

```
appiqdelete -domaindiscovery -address -all
```

**Description:** Removes all discovery addresses from the discovery Step 1 list.

```
appiqdelete -domaindiscovery -application -databaseinfo -address <IP/DNS name> -server <Instance_name/database_name> -port <port number> -type db2
```

**Description:** Removes database information. All of the parameters are mandatory.

```
appiqdelete -domaindiscovery -application -domaincontrollerinfo <id>
```

**Description:** Removes the specified domain controller from the list.

```
appiqdelete -domaindiscovery -application -tnslistenerport <port number>
```

**Description:** Removes the specified port number from from the TNS Listener Port list.

```
appiqdelete -domaindiscovery -application -usercredentials -username <id>
             -type <oracle/sybase/cache/sqlserver/db2/informix>
```

**Description:** Deletes user credentials for managed databases.

## appiqdelete -domaindiscovery -credential -username

**Description:** Removes credentials from the default list. Credentials are identified by user name.

## appiqdelete -domaindiscovery -credential -all

**Description:** Removes all credentials.

## appiqdiscover -domaindiscovery -address <ids> [-sync]

**Description:** Performs discovery Step 1 for the specified discovery addresses. To find the ID of an address, you must have previously discovered the device either through the discovery Step 1 window or through the following CLI command:

```
appiqdiscover -domaindiscovery -address -all [-sync]
```

See [appiqdiscover -domaindiscovery -address -all \[-sync\]](#) below for more information.

To find the ID for a device previously discovered, run the following command:

```
appiqlist -domaindiscovery -address -all
```

See [appiqlist -domaindiscovery -address -all](#) on page 58 for more information.

## appiqdiscover -domaindiscovery -address -all [-sync]

**Description:** Performs discovery Step 1 for all discovery addresses.

## appiqdiscover -domaindiscovery -details -all -infrastructure -backup

**Description:** Collects infrastructure and backup data during Get Details.

## appiqdiscover -domaindiscovery -details -backup

**Description:** Collects only backup data during Get Details.

## appiqdiscover -domaindiscovery -details -infrastructure

**Description:** Collects only infrastructure data during Get Details.

## appiqdiscover -domaindiscovery -details -discoverygroup <ids> [-infrastructure -backup -refresh -sync]

**Description:** Collects element details for the specified discovery groups. The `-infrastructure` tag collects infrastructure details, and the `-backup` tag collects backup details. One of these options must be used. The `-refresh` tag forces the device manager to refresh.

## appiqdiscover -domaindiscovery -details -stop

**Description:** Stops the collection of infrastructure and backup data during Get Details.

**appiqdiscover -domaindiscovery -refresh -fabric <fabric id>**

**Description:** Refreshes details of all the elements in a fabric. The fabric identifier can be obtained using several methods, such as the `appiqlist -fabric -all` command.

**appiqdiscover -domaindiscovery -refresh -host <host id>**

**Description:** Collects infrastructure data during Get Details for a specified host, but does not delete components that no longer exist. The host identifier can be obtained using several methods, such as the `appiqlist -device -host -all` command.

**appiqdiscover -domaindiscovery -refresh -storagesystem <storage system id>**

**Description:** Collects infrastructure data during Get Details for a specified storage system, but does not delete components that no longer exist. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

**appiqdiscover -domaindiscovery -refresh -switch <switch id>**

**Description:** Collects infrastructure data during Get Details for a specified switch, but does not delete components that no longer exist. The switch identifier can be obtained using several methods, such as the `appiqlist -device -switch -all` command.

**appiqdiscover -domaindiscovery -test -address <id> [-sync]**

**Description:** Works like the discovery Step 1 test button in the management server's user interface.

**appiqdiscover -domaindiscovery -topology [-sync]**

**Description:** Obtains the topology. This command assumes you already performed a discovery.

**appiqdiscover -domaindiscovery -topology -discoverygroup <ids> [-sync]**

**Description:** Obtains topology information for the specified discovery groups.

```
appiqedit -domaindiscovery -application -usercredentials -username <id>
-pw
<password> -description <text> -type
<oracle/sybase/cache/sqlserver/db2/
informix/db2/informix> [-authentication <mixed/windows> [-
domaincontroller <name>]]
```

**Description:** Edits user credentials. If the database type is SQL Server, use the optional `-authentication` tag to specify mixed mode or Windows mode. If you specify Windows mode, use the optional `-domaincontroller` tag to specify the domain controller.

In this instance, `-password`, `-description`, and `-domaincontroller` are editable tags.

**appiqfetch -domaindiscovery -file <file name> [-password <password>]**

**Description:** Imports discovery settings from file. Only the file name is required if the file is in the same directory. Otherwise, the full path of the file must be entered. The password is optional if the password is blank.

**appiqlist -domaindiscovery -accesspoint <id>**

**Description:** Lists the specified access points listed in discovery Step 2 and Step 3.

**appiqlist -domaindiscovery -accesspoint -all**

**Description:** Lists all of the access points listed in discovery Step 2 and Step 3.

**appiqlist -domaindiscovery -address <id>**

**Description:** Lists the specified addresses listed in discovery Step 1.

**appiqlist -domaindiscovery -address -all**

**Description:** Lists all of the addresses listed in discovery Step 1.

**appiqlist -domaindiscovery -application -all**

**Description:** Lists the TNS Listener ports, Microsoft Exchange domain controllers, database information, and user credentials for managed databases.

**appiqlist -domaindiscovery -application -databaseinfo**

**Description:** Lists details of database information.

**appiqlist -domaindiscovery -application -DomainControllerinfo**

**Description:** Lists all of the Exchange server domain controller information.

**appiqlist -domaindiscovery -application -tnslistenerport**

**Description:** Lists all of the Oracle TNS Listener ports.

**appiqlist -domaindiscovery -application -usercredentials**

**Description:** Lists all of the user credentials information for managed database applications.

**appiqlist -domaindiscovery -credentials**

**Description:** Lists all default user names.

**appiqlist -domaindiscovery -discoverygroup <id>**

**Description:** Lists basic details of the specified discovery group.

**appiqlist -domaindiscovery -discoverygroup -all**

**Description:** Lists all discovery groups.

**appiqmove -domaindiscovery -discoverygroup <id> -accesspoint <id>**

**Description:** Moves the access point in a discovery group.

**appiqsave -domaindiscovery -password <password>[-path <directory path name>]**

**Description:** Saves discovery settings to file. The password is required and the path must follow file system rules. If the path is not specified, the settings are saved to the `env<CLI_DIR>/DiscoverySetting.xml` file.

**appiqset -domaindiscovery -address <id> -username <name> -password <pwd> -Comment <text>**

**Description:** Resets the username, password, and comment for the specific address.

**appiqset -domaindiscovery -credential -username <name> -password <password>**

**Description:** Sets the default credentials in the same way that the Set Default User Name and Password link does on discovery Step 1 of the management server's user interface. If the credential name exists, the password is reset for the specified user name. The user name and password must be separated by “/”.

**appiqshow -domaindiscovery -accesspoint <id>**

**Description:** Shows details of the specified access point listed in discovery Step 2 and Step 3.

**appiqshow -domaindiscovery -accesspoint -all**

**Description:** Show details of all access points listed in discovery Step 2 and Step 3.

**appiqshow -domaindiscovery -address <id>**

**Description:** Shows details of the specified address listed in discovery Step 1.

**appiqshow -domaindiscovery -address -all**

**Description:** Shows details of all of the addresses listed in discovery Step 1.

**appiqshow -domaindiscovery -application -all**

**Description:** Shows details of TNS Listener ports, exchange controllers, database information, and user credentials for managed databases.

**appiqshow -domaindiscovery -application -databaseinfo**

**Description:** Shows details of database information.

**appiqshow -domaindiscovery -application -DomainControllerinfo**

**Description:** Shows details of exchange domain controllers.

**appiqshow -domaindiscovery -application -tnslistnerport**

**Description:** Shows details of TNS Listener ports.

**appiqshow -domaindiscovery -application -usercredentials**

**Description:** Shows details of user credentials for managed databases.

**appiqshow -domaindiscovery -credentials**

**Description:** Shows details of credentials (default UserName and password).

**appiqshow -domaindiscovery -discoverygroup <id>**

**Description:** Shows details of the specified discovery group.

**appiqshow -domaindiscovery -discoverygroup -all**

**Description:** Shows details of all discovery groups, such as id, name, and accesspoints.

**appiqset -domaindiscovery -quarantine -all**

**Description:** Sets the quarantine flag on all elements discovered in Step 3. This CLI works on Windows, Linux and Solaris.

## appiqset -domaindiscovery -quarantine <id>

**Description:** Sets the quarantine flag on the specified access point. This CLI works on Windows, Linux and Solaris.

The substitute for <id> can be either the access point ID or the string shown in the IP Address / DNS Name column of the **Discovery > Details** page in Storage Essentials. It can be a single string or a comma delimited list of either of the two types of identifiers.

## appiqset -domaindiscovery -quarantine <id1,id2,id3..>

**Description:** Sets the quarantine flag on the specified access points. This CLI works on Windows, Linux and Solaris.

The substitute for <id> can be either the access point ID or the string shown in the IP Address / DNS Name column of the **Discovery > Details** page in Storage Essentials. It can be a single string or a comma delimited list of either of the two types of identifiers.

## appiqset -domaindiscovery -unquarantine -all

**Description:** Clears the quarantine flags on all elements. This command works on Windows, Linux and Solaris.

## appiqset -domaindiscovery -unquarantine <id>

**Description:** Clears the quarantine flag on the specified access points. This command works on Windows, Linux and Solaris.

The substitute for <id> can be either the access point ID or the string shown in the IP Address / DNS Name column of the **Discovery > Details** page in HP Storage Essentials can be a single string or a comma delimited list of either of the two types of identifiers.

## appiqstatus -managementserver

**Description:** Displays the status of management server.

The following statuses are possible:

- Discovering – If the management server is running Step 1.
- Getting Topology – If the management server is running Step 2.
- Getting Details – If the management server is running Step 3.
- Normal – If the management server is idle.

## Domains

Use the following CLI commands to manage domains:

- appiqlist -domain -path below
- appiqshow -domain -path below

## appiqlist -domain -path

**Description:** Lists the domains detected by the management server and its paths.

## appiqshow -domain -path

**Description:** Provides a detailed description of the domains detected by management server and their paths.

# Events

Use the following CLI commands to manage and obtain information about events:

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- appiqlist -event -all -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now> on page 64
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- appiqlist -event -all -type <eventType> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now> on page 65
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- appiqlist -event -elementid <element id> -type <eventtype> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now> on page 69

- [appiqlist -event -elementid <element id> -severity <severity> -type <eventtype> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now>](#) on page 70
- [appiqshow -event <event id>](#) on page 70
- [appiqshow -event -all -elementtype <element type>](#) on page 70
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- [appiqshow -event -all -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now>](#) on page 71
- [appiqshow -event -all -severity <severity> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now>](#) on page 72
- [appiqshow -event -all -type <eventtype> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now>](#) on page 72
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- [appiqshow -event -elementid <element id> -severity <severity> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now>](#) on page 73
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- appiqdelete -event -elementid <element id> -severity <severity> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd|today> -endtime <hh:mm|now> on page 77

## appiqlist -event -all

**Description:** Provides a short description of the events.

## appiqlist -event <event id>

**Description:** Lists events specified by <event id> along with a short description of each event. You can obtain <event id> from the appiqlist -event -all command.

appiqlist -event -all -startdate <yyyy-mm-dd | today> -starttime  
<hh:mm | now> -enddate  
<yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description:** Lists the events from the elements monitored by the management server that fall within the time specified

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh : mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

## appiqlist -event -all -severity <severity>

**Description:** Lists the events from the elements monitored by the management server that fall within the severity specified. In this instance, <severity> is the severity of the event. All severities are included if you do not include the severity flag.

To specify the severity, enter the appropriate number from the following table. If you do not include the severity flag, all severities are included. The definition for each severity level varies according to the type of element.

### Severity Definitions

Severity	Definition
1	<b>unknown severity, minimum severity</b>
2	<b>information notices</b>
4	<b>warning</b> – For example, for a Brocade switch, one or more new physical fabric objects (device port, switch, or fabric) have appeared
8	<b>minor severity</b> – For example, for a Brocade switch, a physical fabric object (switch port or fabric) has changed state
16	<b>major severity</b> – For example, for a Brocade switch, one or more physical fabric objects (device port, switch, or fabric) have disappeared
32	<b>critical severity</b> – For example, for a Brocade switch, a device connected to the switch has gone off line
64	<b>clear</b>

`appiqlist -event -all -severity <severity> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>`

**Description:** Lists the events from the elements monitored by the management server that fall within the time and severity specified.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on previous page](#) for more information. All severities are included if you do not include the severity flag.

`appiqlist -event -all -type <eventType> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>`

**Description:** Lists the events from the elements monitored by the management server that fall within the time and event type specified.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventType> is the event type. Events of all types are shown if you do not specify the event type.

```
appiqlist -event -all -severity <severity> -type <eventType> -startdate  
<yyyy-mm-dd | today>  
-starttime <hh:mm | now> -enddate <yyyy-mm-dd today> -endtime  
<hh:mm | now>
```

**Description:** Lists the events from the elements monitored by the management server that fall within the severity, event type, and time specified.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventType> is the event type. See the following table for a listing of available event types.
- <severity> is the severity of the event.

Enter one of the following for the event type.

### Event Types

Severity	Event Type	An Event Regarding the Following
1	unknown	An unknown event
2	cimevent	CIMOM
3	cimalert	CIMOM alert
4	cimprocess	A process with the CIMOM
5	appiqalert	An alert from the management server
6	appiqevent	An event from the management server
7	policy	Policies
8	provisioning	Provisioning
9	discovery	Discovery
10	synchronizer	Get Details
11	monitoring	Performance Manager
12	reporting	Report Optimizer

Severity	Event Type	An Event Regarding the Following
13	asset	Chargeback Manager
14	policymanager	Policy Manager
15	appiqagent	CIM extensions
16	api	The management server API
17	enterprisereporting	Global Reporter
19	reportviewrefresh	An event regarding a refresh with the report views
20	dbalertlogscan	An alert regarding a database log scan

## appiqlist -event -all -elementtype <element type>

**Description:** Lists the events for the specified element type.

In this instance, <element type> is the identifier for an element type. The following table lists the various element types. Events from all element types are displayed if you do not specify the -elementtype tag.

### Element Types

Element Type	Lists Only Events from the Following
application	Applications
host	Hosts
switch	Switches
storagesystem	Storage systems
tapelibrary	Tape libraries
fabric	Fabrics
other	Elements that do not fit the previous categories
storageessential	The management server
All	All elements

## appiqlist -event -all -elementtype <element type> -severity <severity>

**Description:** Lists the events for the specified element type and severity.

- <element type> is the identifier for an element type. See [appiqlist -event -all -elementtype <element type>](#) above for information about the various element types. Events from all element types are displayed if you do not specify the -elementtype tag.

- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity>](#) on page 64 for more information. All severities are included if you do not include the severity flag.

**appiqlist -event -all -elementtype <element type> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>**

**Description:** Lists the events from the element type specified within the specified time.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <element type> is the identifier for an element type. See [appiqlist -event -all -elementtype <element type>](#) on previous page for information about the various element types. Events from all element types are displayed if you do not specify the -elementtype tag.

**appiqlist -event -elementid <element id>**

**Description:** Lists the events from the element specified.

In this instance, <element id> is the identifier for the element. The element identifier can be obtained using several methods. For example, the element identifier for a storage system can be obtained using the `appiqlist -device -storagesystem -all` command.

**appiqlist -event -elementid <element id> -severity <severity>**

**Description:** Lists the events from a specified element and with a specified severity value.

In this instance:

- <element id> is the identifier for the element. The element identifier can be obtained using several methods. For example, the element identifier for a storage system can be obtained using the `appiqlist -device -storagesystem -all` command.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity>](#) on page 64 for more information. All severities are included if you do not include the severity flag.

**appiqlist -event -elementid <element id> -startdate <yyyy-mm-dd | today> -starttime**

**<hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>**

**Description:** Lists the events from the elements monitored by the management server that fall within the time specified.

In this instance:

- <element\_id> is the identifier for the element. The element identifier can be obtained using several methods. For example, the element identifier for a storage system can be obtained using the appiqlist -device -storagesystem -all command.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <severity> is the severity of the event.

```
appiqlist -event -elementid <element id> -severity <severity> -startdate  
<yyyy-mm-dd | today>  
-starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime  
<hh:mm | now
```

**Description:** Lists the events for the specified element, severity, and time interval.

In this instance:

- <element\_id> is the identifier for the element. The element identifier can be obtained using several methods. For example, the element identifier for a storage system can be obtained using the appiqlist -device -storagesystem -all command.
- <severity> is the severity of the event. See appiqlist -event -all -severity <severity> on page 64 for more information. All severities are included if you do not include the severity flag.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered, for example, 10:45.

```
appiqlist -event -elementid <element id> -type <eventtype> -startdate  
<yyyy-mm-dd | today>  
-starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime  
<hh:mm | now>
```

**Description:** Lists the events from the element specified with the specified event type and within the specified interval.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventtype> is the event type. See appiqlist -event -all -severity <severity> -type <eventType> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd today> -endtime <hh:mm|now> on page 66. Events of all types are shown if you do not specify the event type.

```
appiqlist -event -elementid <element id> -severity <severity> -type  
<eventtype> -startdate  
<yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-  
dd | today> -endtime  
<hh:mm | now>
```

**Description:** Lists the events from the element specified with the specified event type and within the specified interval.

In this instance:

- <yyyy-mm-dd | today> is the date, or `today` can be entered; for example, 2010-05-23.
- <hh : mm | now> is the time (24-hour clock), or `now` can be entered; for example, 10:45.
- <eventtype> is the event type. See [appiqlist -event -all -severity <severity> -type <eventtype> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd today> -endtime <hh:mm|now>](#) on page 66. Events of all types are shown if you do not specify the event type.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity>](#) on page 64 for more information. All severities are included if you do not include the severity flag.

### appiqshow -event <event id>

**Description:** Provides a detailed description of the event specified by <event id>. You can obtain <event id> from the `appiqlist -event -all` command.

### appiqshow -event -all -elementtype <element type>

**Description:** Provides detailed information about all the events for a specified <element type>.

In this instance, <element type> is the identifier for an element type. See [appiqlist -event -all -elementtype <element type>](#) on page 67 for information about the various element types. Events from all element types are displayed if you do not specify the `-elementtype` tag.

### appiqshow -event -all -severity <severity>

In this instance, <severity> is the severity of the event. All severities are included if you do not include the severity flag.

**Description:** Provides a description of the events from the elements monitored by the management server that fall within the severity specified. All severities are included if you do not include the severity flag. The definition for each severity level varies according to the type of element. [appiqlist -event -all -severity <severity>](#) on page 64 for more information.

**appiqshow -event -all -elementtype <element type> -severity <severity>**

**Description:** Provides detailed information about all the events for a specified <element type> that are of the specified severity.

In this instance:

- <element type> is the identifier for an element type.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

**appiqshow -event -all -elementtype <element type> -startdate <yyyy-mm-dd | today>**

**-starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>**

**Description :** Provides detailed information about all the events for a specified <element type> and time interval.

In this instance:

- <element type> is the identifier for an element type. See [appiqlist -event -all -elementtype <element type> on page 67](#) for information about the various element types. Events from all element types are displayed if you do not specify the -elementtype tag.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered, for example, 10:45.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

**appiqshow -event -all -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>**

**Description:** Provides detailed information about all the events between the specified time intervals.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

```
appiqshow -event -all -severity <severity> -startdate <yyyy-mm-dd | today>  
-starttime
```

```
<hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>
```

**Description:** Provides detailed information about all the events with the specified severity and time interval.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or can be entered; for example, 10:45.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

```
appiqshow -event -all -type <eventtype> -startdate <yyyy-mm-dd | today> -  
starttime
```

```
<hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>
```

**Description:** Provides detailed information about all the events with the specified event type and time interval.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventtype> is the event type. [appiqlist -event -all -severity <severity> -type <eventType> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd today> -endtime <hh:mm|now> on page 66](#). Events of all types are shown if you do not specify the event type.

```
appiqshow -event -all -severity <severity> -type <eventtype> -startdate  
<yyyy-mm-dd | today>
```

```
-starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime
```

```
<hh:mm | now>
```

**Description:** Provides detailed information about all the events with the specified severity, event type, and time interval.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

- <severity> is the severity of the event. All severities are included if you do not include the severity flag.

### appiqshow -event -elementid <element id>

**Description** : Provides detailed information about all the events for a specified element.

### appiqshow -event -elementid <element id> -severity <severity>

**Description**: Provides a detailed description of events from the specified element and with the specified severity value.

In this instance:

- <element id> is the identifier for the element. The element identifier can be obtained using several methods. For example, the element identifier for a storage system can be obtained using the appiqlist -device -storagesystem -all command.
- <severity> is the severity of the event. [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

### appiqshow -event -elementid <element id> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description** : Provides detailed information about all the events for a specified element and within the specified time interval.

In this instance:

- <element id> is the identifier for an element.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

### appiqshow -event -elementid <element id> -severity <severity> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description** : Provides detailed information about all the events for a specified element, severity, and specified time interval.

In this instance:

- <element id> is the identifier for an element.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

- <severity> is the severity of the event. [appiqlist -event -all -severity <severity>](#) on page 64 for more information. All severities are included if you do not include the severity flag.

```
appiqshow -event -elementid <element id> -type <eventtype> -startdate  
<yyyy-mm-dd | today>  
-starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime  
<hh:mm | now>
```

**Description** : Provides detailed information about all the events for a specified element, event type, and time interval.

In this instance:

- <element id> is the identifier for an element.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventtype> is the event type. See [appiqlist -event -all -severity <severity> -type <eventType> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd today> -endtime <hh:mm|now>](#) on page 66. Events of all types are shown if you do not specify the event type.

```
appiqshow -event -elementid <element id> -severity <severity> -type  
<eventtype> -startdate  
<yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-  
dd | today> -endtime  
<hh:mm | now>
```

**Description** : Provides detailed information about all the events for a specified element, severity, event type, and interval.

In this instance:

- <element id> is the identifier for an element.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.
- <eventtype> is the event type. [appiqlist -event -all -severity <severity> -type <eventType> -startdate <yyyy-mm-dd|today> -starttime <hh:mm|now> -enddate <yyyy-mm-dd today> -endtime <hh:mm|now>](#) on page 66. Events of all types are shown if you do not specify the event type.
- <severity> is the severity of the event. [appiqlist -event -all -severity <severity>](#) on page 64 for more information. All severities are included if you do not include the severity flag.

## appiqclear -event <event id>

**Description:** Clears the event specified by <event id>.

In this instance, <event id> is the identifier for the event.

## appiqclear -event -all

**Description:** Clears all events.

```
appiqclear -event -all -startdate <yyyy-mm-dd | today> -starttime  
<hh:mm | now> -enddate  
<yyyy-mm-dd | today> -endtime <hh:mm | now>
```

**Description:** Clears all the events generated between the specified times.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

## appiqclear -event -all -severity <severity>

**Description:** Clears all the events with the specified severity.

In this instance, <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

```
appiqclear -event -all -severity <severity> -startdate <yyyy-mm-dd | today>  
-starttime  
<hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>
```

**Description:** Clears events with the specified severity and between the specified times.

In this instance:

- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.
- <yyyy-mm-dd | today> is the date, or today can be entered; for example, 2011-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered; for example, 10:45.

## appiqdelete -event <event id>

**Description:** Deletes the event specified by <event id>. This command can only delete events that are associated with an element.

## appiqdelete -event -all

**Description:** Deletes all the events. This command can only delete events that are associated with an element.

## appiqdelete -event -all -severity <severity>

**Description:** Deletes all events with the specified severity value.

In this instance, <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. This command can only delete events that are associated with an element.

## appiqdelete -event -all -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description:** Deletes all the events that are associated with an element between specified times. This command can only delete events that are associated with an element.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered, for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered, for example, 10:45.

## appiqdelete -event -all -severity <severity> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description:** Deletes all the events that are associated with an element with the specified severity and time interval. This command can only delete events that are associated with an element.

In this instance:

- <yyyy-mm-dd | today> is the date, or today can be entered, for example, 2005-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered, for example, 10:45.
- <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

## appiqdelete -event -elementid <element id>

**Description:** Deletes all the events that are from the element specified by <element id>.

## appiqdelete -event -elementid <element id> -severity <severity>

**Description:** Delete all the events that are from the element specified by <element id> and with the specified severity value.

In this instance, <severity> is the severity of the event. See [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

## appiqdelete -event -elementid <element id> -severity <severity> -startdate <yyyy-mm-dd | today> -starttime <hh:mm | now> -enddate <yyyy-mm-dd | today> -endtime <hh:mm | now>

**Description:** Delete all the events for a specified element, severity, and time interval.

In this instance:

- <element id> is the identifier for an element.
- <yyyy-mm-dd | today> is the date, or today can be entered, for example, 2010-05-23.
- <hh:mm | now> is the time (24-hour clock), or now can be entered, for example, 10:45.
- <severity> is the severity of the event. [appiqlist -event -all -severity <severity> on page 64](#) for more information. All severities are included if you do not include the severity flag.

## Export to Visio

Use the following commands to export the topology to an XML file that can be viewed in Microsoft Visio:

### appiqexport –topologylayout –path <c:/xmls> –system

**Description:** Exports the SAN topology as an XML file.

### appiqexport –topologylayout –path <c:/xmls> –backup

**Description:** Exports the backup topology as an XML file.

## Fabrics

Use the following types of CLI commands to obtain information about fabrics:

- **appiqlist** - Lists fabrics or elements, such as applications, hosts, switches, storage systems, zone sets, zones, and paths within the fabrics or a specified fabric.
- **appiqshow** - Provides detailed information about fabrics or elements within a fabric.

To obtain information about the command, type `-help` at the end of the command, as shown in the following example:

```
appiqlist -fabric -all -help
```

## appiqlist -fabric -all

**Description:** Lists fabrics.

```
appiqlist -fabric -all -device
```

**Description:** Lists the devices in all discovered fabrics, such as hosts, switches, and storage systems.

## appiqlist -fabric -all -application

**Description:** Lists the applications in fabrics.

**Example:**

```
C:\cli>appiqlist -fabric -all -application  
Fabric:1080:100008008840242B  
Fabric:1089:1000080088A0D07E  
Fabric:1096:1000006069500b84  
Application:1064:straker1  
Application:1125:Archer1  
Fabric:1166:10000060695011e9  
Application:1064:straker1  
Application:1125:Archer1  
Fabric:1179:1000080088A06414  
Fabric:1215:100000606930260d
```

The number after the first colon is the identifier for the element. The item after the second colon is the world wide name (WWN) of the fabric or the name of the element in the fabric.

## appiqlist -fabric -all -host

**Description:** Lists the hosts in fabrics.

**Example:**

```
C:\cli>appiqlist -fabric -all -host  
Fabric:1080:100008008840242B  
Fabric:1089:1000080088A0D07E  
Fabric:1096:1000006069500b84
```

```
Host:1004:ufo
Host:1003:challenger
Fabric:1166:10000060695011e9
Host:1004:ufo
Host:1003:challenger
Fabric:1179:1000080088A06414
Fabric:1215:100000606930260d
```

The number after the first colon is the identifier for the element. The item after the second colon is the world wide name (WWN) of the fabric or the name of the element in the fabric.

### appiqlist -fabric -all -port

**Description:** Lists the Fibre Channel ports in the fabrics.

### appiqlist -fabric -all -switch

**Description:** Lists the switches in fabrics.

**Example:**

```
C:\cli>appiqlist -fabric -all -switch
Fabric:1080:100008008840242B
Switch:1012:AppIQ_ED-1032
Fabric:1089:1000080088A0D07E
Switch:1010:AppIQ_ES-3016
Fabric:1096:1000006069500b84
Switch:1013:QBrocade3
Switch:1014:QBrocade4
Fabric:1166:10000060695011e9
Switch:1007:QBrocade2
Switch:1008:QBrocade5
Fabric:1179:1000080088A06414
Switch:1011:AppIQ_ED-6064
Fabric:1215:100000606930260d
Switch:1005:QBrocade1
```

The number after the first colon is the identifier for the element. The item after the second colon is the world wide name (WWN) of the fabric or the name of the element in the fabric.

### appiqlist -fabric -all -storagesystem

**Description:** Lists the storage systems in fabrics.

**Example:**

```
C:\cli>appiqlist -fabric -all -storagesystem  
Fabric:1080:100008008840242B  
Fabric:1089:1000080088A0D07E  
Fabric:1096:1000006069500b84  
StorageSystem:1006:LSI2400  
StorageSystem:1000:HDS9910@192.168.1.236  
StorageSystem:1001:000183500570 (Symm48:3830)  
Fabric:1166:10000060695011e9  
StorageSystem:1009:LSI4600  
StorageSystem:1000:HDS9910@192.168.1.236  
StorageSystem:1001:000183500570 (Symm48:3830)  
Fabric:1179:1000080088A06414  
StorageSystem:1000:HDS9910@192.168.1.236  
Fabric:1215:100000606930260d  
StorageSystem:1001:000183500570 (Symm48:3830)
```

The number after the first colon is the identifier for the element. The item after the second colon is the world wide name (WWN) of the fabric or the name of the element in the fabric.

### appiqlist -fabric -all -tapelibrary

**Description:** Lists the tape libraries in fabrics.

### appiqlist -fabric -all -zoneset

**Description:** Lists the zone sets in fabrics.

### appiqlist -fabric -all -zone

**Description:** Lists the zones in fabrics.

### appiqlist -fabric -all -zonealias

**Description:** Lists the zone aliases in fabrics.

## appiqlist -fabric <fabric id>

**Description:** Displays the world wide name of the specified fabric and its fabric identifier.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

## appiqlist -fabric <fabric id> -device

**Description:** Lists the hosts, switches, storage systems, and applications in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

**Example:**

```
C:\cli>appiqlist -fabric 1096 -device  
Host:1004:ufo  
Host:1003:challenger  
Switch:1013:QBrocade3  
Switch:1014:QBrocade4  
StorageSystem:1006:LSI2400  
StorageSystem:1000:HDS9910@192.168.1.236  
StorageSystem:1001:000183500570 (Symm48:3830)  
Application:1064:straker1  
Application:1125:Archer1
```

The number after the first colon is the identifier for the element. The item after the second colon is the world wide name (WWN) of the fabric or the name of the element in the fabric.

## appiqlist -fabric <fabric id> -application

**Description:** Lists the applications in the fabric specified by <fabric id>. In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

**Example:**

```
C:\cli>appiqlist -fabric 1096 -application  
Application:1064:straker1  
Application:1125:Archer1
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element in the fabric.

### appiqlist -fabric <fabric id> -host

**Description:** Lists the hosts in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

**Example:**

```
C:\cli>appiqlist -fabric 1096 -host  
Host:1004:ufo  
Host:1003:challenger
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element in the fabric.

### appiqlist -fabric <fabric id> -port

**Description:** Lists the Fibre Channel ports in the specified fabric.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqlist -fabric <fabric id> -switch

**Description:** Lists the switches in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

**Example:**

```
C:\cli>appiqlist -fabric 1096 -switch  
Switch:1013:QBrocade3  
Switch:1014:QBrocade4
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element in the fabric.

### appiqlist -fabric <fabric id> -storagesystem

**Description:** Lists the storage systems in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

**Example:**

```
C:\cli>appiqlist -fabric 1096 -storagesystem
```

```
StorageSystem:1006:LSI2400  
StorageSystem:1000:HDS9910@192.168.1.236  
StorageSystem:1001:000183500570 (Symm48:3830)
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element in the fabric.

### appiqlist -fabric <fabric id> -tapelibrary

**Description:** Provides tape library in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqlist -fabric <fabric id> -zoneset

**Description:** Lists the zone sets in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqlist -fabric <fabric id> -zone

**Description:** Lists the zones in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqlist -fabric <fabric id> -zonealias

**Description:** Lists the zone aliases in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqset -fabric <fabric id> -customname <new name>

**Description:** Sets the custom name of the fabric.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric -all

**Description:** Provides a detailed description of the fabrics managed by the management server.

### appiqshow -fabric -all -device

**Description:** Provides a detailed description of the elements, such as hosts, switches, and storage, in the fabrics managed by the management server.

## appiqshow -fabric -all -application

**Description:** Provides a detailed description of the applications in the fabrics managed by the management server.

## appiqshow -fabric -all -host

**Description:** Provides a detailed description of the hosts in the fabrics managed by the management server.

## appiqshow -fabric -all -port

**Description:** Provides a detailed description of the Fibre Channel ports in the fabrics managed by the management server. Inter Switch Link (ISL) trunking information is also provided, if accessible, for supported switches.

## appiqshow -fabric -all -switch

**Description:** Provides a detailed description of the switches in the fabrics managed by the management server.

## appiqshow -fabric -all -storagesystem

**Description:** Provides a detailed description of the storage systems in the fabrics managed by the management server.

## appiqshow -fabric -all -tapelibrary

**Description:** Provides a detailed description of the tape libraries in the fabrics managed by the management server.

## appiqshow -fabric -all -zoneset

**Description:** Provides a detailed description of the zone sets in the fabrics managed by the management server.

## appiqshow -fabric -all -zone

**Description:** Provides a detailed description of the zones in the fabrics managed by the management server.

## appiqshow -fabric -all -zonealias

**Description:** Provides a detailed description of the zone aliases in the fabrics managed by the management server.

## appiqshow -fabric <fabric id>

**Description:** Provides a detailed description of the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -device

**Description:** Provides a detailed description of the applications, hosts, switches, storage systems, zone sets, zones, and paths in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -application

**Description:** Provides a detailed description of the applications in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -host

**Description:** Provides a detailed description of the hosts in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -port

**Description:** Provides a detailed description of the Fibre Channel ports in the fabric specified by <fabric id>. Inter Switch Link (ISL) trunking information is also provided, if accessible, for supported switches.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -switch

**Description:** Provides a detailed description of the switches in the fabric specified by <fabric id>. Inter Switch Link (ISL) trunking information is also provided, if accessible, for supported switches.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -storagesystem

**Description:** Provides a detailed description of the storage systems in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -tapelibrary

**Description:** Provides a detailed description of the tape libraries in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -zoneset

**Description:** Provides a detailed description of the zone sets in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -zone

**Description:** Provides a detailed description of the zones in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

### appiqshow -fabric <fabric id> -zonealias

**Description:** Provides a detailed description of the zone aliases in the fabric specified by <fabric id>.

In this instance, <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.

## Hosts

Use the following CLI commands to obtain information about hosts:

- **appiqlist** – Lists hosts or components belonging to the hosts or a specified host, such as ports and disk drives.
- **appiqshow** – Provides detailed information about the components belonging to the hosts or a specified host.
- **appiqstats** – Provides statistics about a host or its components, such as a logical drive.

### appiqdelete -device -host <id> [-accesspoint]

**Description:** Deletes the specified host. The optional `-accesspoint` tag deletes the element entry from the access point list.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host -all

**Description:** Lists the hosts detected by the management server.

**Example:**

```
C:\cli>Appiqlist -device -host -all  
Host:1002:viking  
Host:1003:challenger  
Host:1004:ufo  
Host:1058:YAMATO  
Host:1069:QASERVER02  
Host:1083:GROMMIT
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the host.

## appiqlist -device -host <id>

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

**Description:** Provides the DNS name of the host specified.

**Example:**

```
C:\cli>appiqlist -device -host 1004  
Host:1004:comet
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the host.

## appiqlist -device -host <id> -all

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

**Description:** Lists the components of the host specified.

**Example:**

```
C:\cli>appiqlist -device -host 1004 -all  
Port:1044:Adapter 0 Port 0  
Port:1060:Adapter 1 Port 0
```

The number after the first colon is the identifier for the element.

On execution of this command for EMC Celerra host, the output displays only the Disk Drives and Logical Disks for the host.

### appiqlist -device -host <id> -port

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

**Description:** Lists the specified host's Fibre Channel ports.

**Example:**

```
C:\cli>appiqlist -device -host 1004 -port  
Port:1044:Adapter 0 Port 0  
Port:1060:Adapter 1 Port 0
```

The numbers 1044 and 1060 are the identifiers for the ports.

This command is not supported for EMC Celerra host.

### appiqlist -device -host <id> -application

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

**Description:** Lists the applications on the host specified.

**Example:**

```
C:\cli>appiqlist -device -host 1004 -application  
Application:1064:straker1
```

The number 1064 is the identifier for the application, and straker1 is the name of the instance for the application. In this instance, straker1 is an Oracle instance.

This command is not supported for EMC Celerra host.

### appiqlist -device -host <id> -hba

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

**Description:** Lists the host bus adapters connected to the host specified.

**Example:**

```
C:\cli>appiqlist -device -host 1004 -hba  
HBACard:1025:Adapter 0  
HBACard:1027:Adapter 1
```

The numbers 1025 and 1027 are the identifiers for the HBA cards.

This command is not supported for EMC Celerra host.

## appiqlist -device -host <id> -targetmapping

**Description:** Lists the target mappings of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -diskdrive

**Description:** Lists the disk drives connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -logicaldisk

**Description:** Lists the logical drives of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -volume

**Description:** Lists the volume manager volumes of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -partition

**Description:** Lists the partitions of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -multipathdevice

**Description:** Lists the multipath devices connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqlist -device -host <id> -processor

**Description:** Lists the processors connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

This command is not supported for EMC Celerra host.

## appiqset -device -host <id> -customname <new name>

**Description:** Sets the custom name of the specified host.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host -all

**Description:** Provides a detailed description of the components on the hosts detected by the management server.

## appiqshow -device -host <id>

**Description:** Provides a detailed description of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host <id> -all

**Description:** Provides a detailed description of the specified host's components.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host <id> -port

**Description:** Provides a detailed description of the Fibre Channel ports connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host <id> -application

**Description:** Provides a detailed description of the applications on the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host <id> -hba

**Description:** Provides a detailed description of the host bus adapters connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## appiqshow -device -host <id> -targetmapping

**Description:** Provides a detailed description of the target mappings of the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -diskdrive

**Description:** Provides a detailed description of the disk drives connected to the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -logicaldisk

**Description:** Provides a detailed description of the specified host's logical disks.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -volume

**Description:** Provides a detailed description of the volume manager volumes on the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -partition

**Description:** Provides a detailed description of the partitions on the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -multipathdevice

**Description:** Provides a detailed description of the multi-path devices on the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqshow -device -host <id> -processor

**Description:** Provides a detailed description of the processors on the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqstats -device -host -all

**Description:** Provides statistics about the hosts the management server discovers.

### appiqstats -device -host <id>

**Description:** Provides statistics about the host specified.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

### appiqstats -device -host <id> -logicaldisk

**Description:** Provides statistics about the logical disks on the specified host.

In this instance, <id> is the host identifier. The host identifier can be obtained using several methods, such as the appiqlist -device -host -all command.

## Host Security Groups

Use the following CLI commands to manage host security groups:

### appiqlist -hostsecuritygroup <hostsecuritygroup id>

**Description:** Provides the name of the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqlist -hostsecuritygroup <hostsecuritygroup id> -all

**Description:** Lists all the subcomponents belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqlist -hostsecuritygroup <hostsecuritygroup id> -port

**Description:** Lists all the ports belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqlist -hostsecuritygroup <hostsecuritygroup id> -volume

**Description:** Lists volumes in the host security group specified. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqlist -hostsecuritygroup <hostsecuritygroup id> -initiator

**Description:** Lists initiator ports associated with the host security group specified. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqlist -hostsecuritygroup <hostsecuritygroup id> -lun

**Description:** Lists all the LUNs belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqlist -hostsecuritygroup <hostsecuritygroup id> -hid

**Description:** Lists all the hardware IDs belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqlist -hostsecuritygroup <hostsecuritygroup id> -subordinate

**Description:** Lists all the subordinate host security groups belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqlist -hostsecuritygroup <hostsecuritygroup id> -maskingcapabilities

**Description:** Lists all the masking capabilities belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id>

**Description:** Provides a detailed description of the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -all

**Description:** Provides detailed information about all the subcomponents belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -port

**Description:** Provides detailed information about all the ports belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -volume

**Description:** Provides detailed information about all volumes in the host security group specified. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -initiator

**Description:** Provides detailed information about all the initiators in the host security group specified. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -lun

**Description:** Provides detailed information about all the LUNs belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -hid

**Description:** Provides detailed information about all the hardware IDs belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -subordinate

**Description:** Provides detailed information about all the subordinate host security group belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqshow -hostsecuritygroup <hostsecuritygroup id> -maskingcapabilities

**Description:** Provides detailed information about all the masking capabilities belonging to the specified host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqset -hostsecuritygroup <hostsecuritygroup id> -name <hostsecuritygroup name>

**Description:** Sets or changes the name of the host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

## appiqset -hostsecuritygroup <hostsecuritygroup id> -hostmode <StorageClientSetting id>

**Description:** Sets the host mode data.

In this instance:

- <hostsecuritygroup id> is the identifier for the host security group.
- <StorageClientSetting id> is the identifier for the storage client setting.

The identifiers for the host security group and storage client setting can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup and appiqlist -device -storagesystem <ssid> -storageclientsettings commands.

### appiqset -hostsecuritygroup <hostsecuritygroup id> -hostmode2 <String representing HostMode2 value>

**Description:** Sets data for the second host mode.

In this instance:

- <hostsecuritygroup id> is the identifier for the host security group.
- <String representing HostMode2 value> is the string for the second host mode.

### appiqdelete -hostsecuritygroup <hostsecuritygroup id>

**Description:** Deletes the host security group specified. In this instance, the <hostsecuritygroup id> is the identifier for the host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

### appiqadd -hostsecuritygroup <hostsecuritygroup id> -volume <list of volume ids>

#### -deviceaccess <list of device access ids>

**Description:** Adds specified volumes to the host security group specified. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.

In this instance, <List of access types> is a list of volume access rights for each volume specified by <list of volume ids>. For each volume specified, you must provide one of the following numbers to indicate the access type:

- 0: Unknown access
- 2: Read-write
- 3: Read-only
- 4: No access

## appiqadd -hostsecuritygroup <host security group id> - initiator <list of hba port ids>

**Description:** Adds specified initiator WWNs to the host security group specified.

In this instance:

- <host security group id> is the identifier for the host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.
- <list of host port ids> is the HBA port ID or initiator for the host. The HBA port ID can be obtained using several methods, such as the appiqlist -device -host <host id> -port command.

## appiqremove -hostsecuritygroup <host security group id> -volume <list of volume ids>

**Description:** Removes specified volumes from the protocol controller specified.

In this instance:

- <host security group id> is the identifier for the host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.
- <list of volume ids> is a list of storage system volume IDs. The list of volume IDs can be obtained using several methods, such as the appiqshow -hostsecuritygroup <hostsecuritygroup id> -volume command.

## appiqremove -hostsecuritygroup <host security group id> - initiator <list of hba port ids>

**Description:** Removes specified initiator WWNs from the protocol controller specified.

In this instance:

- <host security group id> is the identifier for the host security group. The identifier for the host security group can be obtained using several methods, such as the appiqlist -device -storagesystem <ssid> -hostsecuritygroup command.
- <list of host port ids> is the HBA port ID or initiator for the host. The HBA port ID can be obtained using several methods, such as the appiqlist -device -host <host id> -port command.

```
appiqcreate -hostsecuritygroup <storage system id> -port <list of storage  
system port ids> -initiator <list of host port  
wwns | list of host port lds> [-name <name>]
```

**Description:** Creates a host security group with the specified list of initiators (host ports) and with the given name.

In this instance:

- <storage system id> can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.
- <list of storage system ports IDs> is a list of storage system port IDs.
- <list of host port wwns | list of host port IDs> is a list of host ports (initiators). You can give either the port ID or its 16-digit world wide name (WWN). You can obtain the host port ID or its WWN from several methods, such as the following command:  
appiqlist -device -host <host id> -port
- <Name> (optional) is the name you specify for the host security group.

```
appiqcreate -hostsecuritygroup <storage system id> -port <list of storage  
system port ids>  
-initiator <list of host port wwns | list of host port lds> [-name <name>]
```

**Description:** Creates a host security group with the given name that is associated with the specified lists of initiators (host ports) and storage system ports.

In this instance:

- <storage system id> can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.
- <list of host port wwns | list of host port IDs> is a list of host ports (initiators). You can use either the port ID or its 16-digit world wide name (WWN). You can obtain the host port ID or its WWN from several methods, such as the following command:  
appiqlist -device -host <host id> -port
- <List of storage system ports IDs> is a list of storage system port IDs.
- <list of volume ids> is a list of storage system volume IDs.
- <Name> (optional) is the name you specify for the host security group.

```
appiqcreate -hostsecuritygroup <storage system id> -port <list of storage
system ports>
    -initiator <list of host port wwns | list of host port Ids> -volume <list of
    volume ids>
    -deviceaccess <list of deviceaccess values> [-name <name>]
```

**Description:** Creates a host security group with a given name that is associated with the specified lists of initiators (host ports), storage system ports, and volumes. Device access specifies access level to each of the specified storage volume.

In this instance:

- <storage system id> can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.
- <list of host port wwns | list of host port Ids> is a list of host ports (initiators). You can use either the port ID or its 16-digit world wide name (WWN). You can obtain the host port ID or its WWN from several methods, such as the following command:  
appiqlist -device -host <host id> -port
- <List of storagesystem ports IDs> is a list of storage system port IDs.
- <list of volume ids> is a list of storage system volume IDs.
- <list of deviceaccess values> is a list of volume access rights for each volume specified by <list of volume ids>. For each volume specified, you must provide one of the following numbers to indicate the access type:
  - 0: Unknown access
  - 2: Read-write
  - 3: Read-only
  - 4: No access
- (*Optional*): <Name> is the name for the host security group.

Adding a list of initiator, volumes or storagesystem ports to a host security group (HSG) is specific to the storage system. Some storage system might not support adding more than one volume or initiator to the same HSG. Some storage systems might not support adding same volume to more than one HSG. You can obtain information about HSGs from the following command:

```
Appiqshow -device -storagesystem <storagesystem id> -
maskingcapabilities
```

## NetApp NAS Devices

Use the following CLI commands to show details for NetApp NAS devices:

**appiqlist -device -nashost -all**

**Description:** Lists all NAS hosts.

**appiqlist -device -nashost <id>**

**Description:** Lists all NAS hosts with matching ID.

**appiqlist -device -nashost <id> -all**

**Description:** Lists all NAS host elements.

**appiqlist -device -nashost <id> -volume**

**Description:** Lists all the volumes of a NAS host.

**appiqlist -device -nashost <id> -volume <id> -quota**

**Description:** Lists all quotas for a volume of a NAS host.

**appiqlist -device -nashost <id> -volume <id> -snapshot**

**Description:** Lists all snapshots for a volume of a NAS host.

**appiqlist -device -nashost <id> -volume <id> -share**

**Description:** Lists all shares for a volume of a NAS host.

**appiqlist -device -nashost <id> -volume <id> -qtree**

**Description:** Lists all qtrees for a volume of a NAS host.

**appiqlist -device -nashost <id> -diskdrive**

**Description:** Lists all disk drives of a NAS host.

**appiqlist -device -nashost <id> -aggregate**

**Description:** Lists all aggregates of a NAS host.

**appiqlist -device -nashost <id> -plex**

**Description:** Lists all plexes of a NAS host.

**appiqlist -device -nashost <id> -raid**

**Description:** Lists all RAID groups of a NAS host.

**appiqlist -fabric <id> -nashost**

**Description:** Lists all NAS hosts of a fabric.

**appiqlist -fabric -all -nashost**

**Description:** Lists all NAS hosts of all fabrics.

**appiqshow -device -nashost -all**

**Description:** Provides a detailed description of all NAS hosts.

**appiqshow -device -nashost <id> -all**

**Description:** Provides a detailed description of NAS host elements.

**appiqshow -device -nashost <id>**

**Description:** Provides a detailed description of a NAS host with a specified id.

**appiqshow -device -nashost <id> -volume**

**Description:** Provides a detailed description of all the volumes of a NAS host.

**appiqshow -device -nashost <id> -volume <id> -quota**

**Description:** Provides a detailed description of all the quotas for a volume of a NAS host.

**appiqshow -device -nashost <id> -volume <id> -snapshot**

**Description:** Provides a detailed description of all the snapshots for a volume of a NAS host.

**appiqshow -device -nashost <id> -volume <id> -share**

**Description:** Provides a detailed description of all the shares for a volume of a NAS host.

**appiqshow -device -nashost <id> -volume <id> -qtree**

**Description:** Provides a detailed description of all the qtrees for a volume of a NAS host.

**appiqshow -device -nashost <id> -diskdrive**

**Description:** Provides a detailed description of all the disk drives of a NAS host.

**appiqshow -device -nashost <id> -aggregate**

**Description:** Provides a detailed description of all the aggregates of a NAS host.

**appiqshow -device -nashost <id> -plex**

**Description:** Provides a detailed description of all the plexes of a NAS host.

**appiqshow -device -nashost <id> -raid**

**Description:** Provides a detailed description of all the raid groups of a NAS host.

**appiqshow -fabric <id> -nashost**

**Description:** Provides a detailed description of all the NAS hosts of a fabric.

**appiqshow -fabric -all -nashost**

**Description:** Provides a detailed description of all NAS hosts of all fabrics.

## EMC Celerra

Use the following CLI commands to show details for EMC Celerra devices:

**appiqlist -device -nashost <id> -volume <id> -checkpoint**

**Description:** Lists all checkpoints for a volume of a Celerra device.

**appiqlist -device -nashost <id> -metavolume**

**Description:** Lists all meta volumes of a Celerra device.

**appiqlist -device -nashost <id> -slicevolume**

**Description:** Lists all slice volumes of a Celerra device.

**appiqlist -device -nashost <id> -poolvolume**

**Description:** Lists all pool volumes of a Celerra device.

**appiqlist -device -nashost <id> -stripevolume**

**Description:** Lists all stripe volumes of a Celerra device.

**appiqlist -device -nashost <id> -storagepool**

**Description:** Lists all storage pools of a Celerra device

**appiqlist -device -nashost <id> -datamover**

**Description:** Lists all data movers of a Celerra device.

**appiqshow -device -nashost -<id> -volume <id> -checkpoint**

**Description:** Provides a detailed description of all the Checkpoints for a volume of a Celerra device.

**appiqshow -device -nashost <id> -metavolume**

**Description:** Provides a detailed description of all the meta volumes of a Celerra host.

`appiqshow -device -nashost <id> -poolvolume`

**Description:** Provides a detailed description of all the pool volumes of a Celerra device.

`appiqshow -device -nashost <id> -stripevolume`

**Description:** Provides a detailed description of all the stripe volumes of a Celerra device.

`appiqshow -device -nashost <id> -slicevolume`

**Description:** Provides a detailed description of all the slice volumes of a Celerra device.

`appiqshow -device -nashost <id> -storagepool`

**Description:** Provides a detailed description of all the storage pools of a Celerra device.

`appiqshow -device -nashost <id> -datamover`

**Description:** Provides a detailed description of all the data movers of a Celerra device.

## Remote CIM Extensions Management

Use the following CLI commands to install, upgrade, and manage CIM extensions.

You must copy the CIM extensions to the management server before you can remotely manage CIM extensions. Refer to the “Deploying and Managing CIM Extensions” chapter of the *Installation Guide* for more details.

`appiqinstall -agent -username <username of host> -password <password of host>`  
`-hostname <IP address or DNS name of host>`

**Description:** Performs an initial installation of the CIM extension configuration for the specified remote host.

`appiqinstall -ssh -username <username of host> -password <password of host>`  
`-hostname <IP address or DNS name of host>`

**Description:** Installs OpenSSH on the specified remote Windows host. This command works only from a Windows management server, and can deploy OpenSSH only to a Windows server.

**appiqstart -agent -username <username of host> -password <password of host>**

**-hostname <IP address or DNS name of host>**

**Description:** Tries to start the CIM extension on the indicated remote host.

**appiqstop -agent -cime <IP address or DNS name of host>**

**Description:** Attempts to use the CIM extension interface to stop the CIM extension on the indicated remote host.

**appiqstop -agent -username <username of host> -password <password of host>**

**-hostname <IP address or DNS name of host>**

**Description:** Attempts to use SSH to stop the CIM extension on the indicated remote host.

**appiqstatus -agent -cime <IP address or DNS name of host>**

**Description:** Attempts to use the CIM extension interface to contact the CIM extension on the indicated remote host. If successful, the version number of the agent is returned.

**appiqstatus -agent -username <username of host> -password <password of host>**

**-hostname <IP address or DNS name of host>**

**Description:** Attempts to use SSH to contact the CIM extension on the indicated remote host. If successful, the version number of the agent is returned.

**appiqfetch -gather -cime <IP address or DNS name of host>**

**Description:** Retrieves the output of the CIM extension gather script from the indicated host through the CIM extension interface. The credentials for the CIM extension are retrieved from the management server database. The host must have been discovered by the management server.

The files are saved to the following directory:

<Install Directory>\logs\download\<HOSTNAME>\tools\

**appiqfetch -logs -cime <IP address or DNS name of host>**

**Description:** Retrieves the CIM extension log files from the indicated host through the CIM extension interface. The credentials for the CIM extension are retrieved from the management server database. The host must have been discovered by the management server.

`appiqfetch -logs -username <username of host> -password <password of host>`

`-hostname <IP address or DNS name of host>`

**Description:** Retrieves the CIM extension log files from the indicated host through SSH. The files are zipped and the resulting zip file stored in the indicated directory on the management server.

`appiqupdate -agent -username <username of host> -password <password of host>`

`-hostname <IP address or DNS name of host>`

**Description:** Updates the CIM extension on the indicated host.

`appiqfetch -config -username <username of host> -password <password of host>`

`-hostname <IP address or DNS name of host>`

**Description:** Retrieves the CIM extension configuration files from the indicated remote host. If successful, the configuration files are copied to the indicated directory on the management server.

`appiqupdate -config -username <username of host> -password <password of host>`

`-hostname <IP address or DNS name of host>`

**Description:** Updates the CIM extension configuration files for the indicated remote host.

For the `appiqupdate -config` command, the following arguments are all optional. If they are not specified, they will be left out of the configuration.

- `-port` is the port to start the agent on.
- `-ip` is the IP address to start the agent on (useful for multihomed systems).
- `-autoip` specifies that the same IP address used to communicate with the machine via SSH is used to start the agent.
- `-agentUsername` is the username to which the agent responds.
- `-agentPassword` is the password for the username to which the agent responds.

```
appiquninstall -agent -username <username of host> -password  
<password of host>  
-hostname <IP address or DNS name of host>
```

**Description:** Uninstalls the CIM extension from the indicated host.

## Security

Use the following CLI commands to view information about users, groups, organizations, and roles.

```
appiqadd -organization <id> -host <ids> -switch <ids> -storagesystem  
<ids>  
-application <ids> -tapelibrary <ids> -childorganization <ids> -volume  
<ids>
```

**Description:** Adds top-level elements to an organization.

```
appiqcreate -organization -name <orgName> -description <text> -host  
<ids>  
-switch <ids> -storagesystem <ids> -tapelibrary <ids> -application <ids>  
-childorganization <ids> -volume <ids>
```

**Description:** Creates a new organization and adds top-level and sub-elements in the organization.

```
appiqdelete -organization <id>
```

**Description:** Deletes the specified organization.

```
appiqlist -user -all
```

**Description:** Lists users authorized to access the management server.

```
appiqlist -user <user id>
```

**Description:** Provides information about the specified user. You can obtain the identifier for the user from the appiqlist -user -all command.

```
appiqlist -user <user id> -role
```

**Description:** Provides information about the specified user's role. You can obtain the identifier for the user from the appiqlist -user -all command.

## appiqlist -user <user id> -organization

**Description:** Provides information about the specified user's organizations. You can obtain the identifier for the user from the appiqlist -user -all command.

## appiqlist -role -all

**Description:** Lists all the available roles in the server.

## appiqlist -role <role id>

**Description:** Provides information about the role specified. You can obtain the identifier for the role from the appiqlist -role -all command.

## appiqlist -organization -all

**Description:** Lists the organizations available in the management server.

## appiqlist -organization <org id>

**Description:** Provides information about the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqlist -organization <org id> -element

**Description:** Lists elements available in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqlist -organization <org id> -user

**Description:** Lists users in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqlist -organization <org id> -childorganization

**Description:** Lists child organizations in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqremove -organization <id> -host <ids> -switch <ids> -storagesystem <ids> -application <ids> -tapelibrary <ids> -childorganization <ids> -volume <ids>

**Description:** Removes top level elements in a organization.

```
appiqset -organization <id> -name <orgName> -description <text>
-host <ids> -switch <ids> -storagesystem <ids> -application <ids> -
-tapelibrary <ids>
-childorganization <ids> -volume <ids>
```

**Description:** Sets the organization name and description, and also replaces the top-level and sub-elements in the organization.

**appiqlist -adorganization -all**

**Description:** Lists all the AD/LDAP organization units available in the management server.

**appiqlist -adorganization <adorganization id>**

**Description:** Provides information of the specified AD/LDAP organization unit. You can obtain the identifier for the AD/LDAP organization unit from the `appiqlist -adorganization -all` command.

**appiqlist -adorganization <adorganization id> -role**

**Description:** Provides information of the specified AD/LDAP organization unit's role. You can obtain the identifier for the AD/LDAP organization unit from the `appiqlist -adorganization -all` command.

**appiqlist -adorganization <adorganization id> organization**

**Description:** Provides information of the specified AD/LDAP organization unit's organizations. You can obtain the identifier for the AD/LDAP organization from the `appiqlist -adorganization -all` command.

**appiqshow -user -all**

**Description:** Provides a detailed description about the users authorized to access the management server.

**appiqshow -user <user id>**

**Description:** Provides a detailed description of the specified user. You can obtain the identifier for the user from the `appiqlist -user -all` command.

**appiqshow -user <user id> -role**

**Description:** Provides a detailed description of the specified user's role. You can obtain the identifier for the user from the `appiqlist -user -all` command.

## appiqshow -user <user id> -organization

**Description:** Provides a detailed description of the specified user's organizations. You can obtain the identifier for the user from the appiqlist -user -all command.

## appiqshow -role -all

**Description:** Provides a detailed description of the available roles on the server.

## appiqshow -role <role id>

**Description:** Provides a detailed description of the role specified. You can obtain the identifier for the role from the appiqlist -role -all command.

## appiqshow -organization - all

**Description:** Provides a detailed description of the organizations available in the management server.

## appiqshow -organization <org id>

**Description:** Provides a detailed description of the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqshow -organization <org id> -element

**Description:** Provides a detailed description of all the elements available in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqshow -organization <org id> -user

**Description:** Provides a detailed description of all the users in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqshow -organization <org id> -childorganization

**Description:** Provides a detailed description of all the child organizations in the organization specified. You can obtain the identifier for the organization from the appiqlist -organization -all command.

## appiqshow -adorganization -all

**Description:** Provides detailed description of all the AD/LDAP organization units available in the management server.

## appiqshow -adorganization <adorganization id>

**Description:** Provides detailed information of the specified AD/LDAP organization unit. You can obtain the identifier for the AD/LDAP organization unit from the appiqlist -adorganization -all command.

## appiqshow -adorganization <adorganization id> -role

**Description:** Provides detailed information of the specified AD/LDAP organization unit's role. You can obtain the identifier for the AD/LDAP organization unit from the appiqlist -adorganization -all command.

## appiqlist -adorganization <adorganization id> organization

**Description:** Provides detailed information of the specified AD/LDAP organization unit's organizations. You can obtain the identifier for the AD/LDAP organization from the appiqlist -adorganization -all command.

# Storage Pools

Use the following CLI commands to manage storage pools.

## appiqlist -pool <pool id>

**Description:** Provides the name of a specific storage pool. The pool ID can be obtained using several methods, such as the appiqlist -device -storagesystem <storage system id> -pool command.

## appiqlist -pool <pool id> -volume

**Description:** Lists volumes on the storage pool specified. The pool ID can be obtained using several methods, such as the appiqlist -device -storagesystem <storage system id> -pool command.

## appiqlist -pool <pool id> -storageextent

**Description:** Lists storage extents on the storage pool specified. The pool ID can be obtained using several methods, such as the appiqlist -device -storagesystem <storage system id> -pool command.

## appiqlist -pool <pool id> -storagesetting

**Description:** Lists storage settings for the pool specified.

For a parent pool (unconfigured pool), the storage settings provided from this command are used in the creation of a pool.

For a nonparent pool, the storage settings provided from this command are used in volume creation.

The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.

### `appiqshow -pool <pool id>`

**Description:** Provides a detailed description of the pool specified. The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.

If you want even more detailed information, refer to Provisioning Manager for pool information.

### `appiqshow -pool <pool id> -storagesetting`

**Description:** Provides a detailed list of storage settings for this pool.

For a parent pool (unconfigured pool), these settings are used in the creation of a pool.

For a non-parent pool, these settings are used in volume creation.

The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.

### `appiqshow -pool <pool id> -storageextent`

**Description:** Provides a detailed description of storage extents on the pool specified. The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.

### `appiqshow -pool <pool id> -volume`

**Description:** Provides a detailed description of volumes on the pool specified. The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.

### `appiqcreate -pool <pool id 1>...<pool id n> -storagesetting <storage settings id> -size <size in MB>`

**Description:** Creates a storage pool with the specified unconfigured pools, storage setting and size. Not all storage systems support assigning the name at creation time.

In this instance:

- `<pool id>` is an unconfigured pool ID. The pool ID can be obtained using several methods, such as the `appiqlist -device -storagesystem <storage system id> -pool` command.
- `<storage setting id>` is the storage setting ID for the new pool. You can obtain the storage setting ID from one of the following commands:

- appiqshow -device -storage system <storagesystem id> -pool
- appiqlist -pool <id> -storagesetting
- appiqshow -pool <id> -storagesetting (This command also shows supported sizes for each storage setting.)
- <size in MB> is the size of the pool in megabytes.

**appiqcreate -pool <pool id 1>...<pool id n> -extents <extent id 1>...<extend id n>**

**-storagesetting <storage settings id> -size <size in MB>**

**Description:** Creates a storage pool with the specified unconfigured pools, storage setting, size, and storage pool name. The parameters must be entered in the specified order.

In this instance:

- <pool id> is an unconfigured pool ID. The pool ID can be obtained using several methods, such as the appiqlist -device -storagesystem <storage system id> -pool command.
- <extent id 1> is the extent identifier. This command currently supports only one extent identifier.
- <storage setting id> is the storage setting ID for the new pool. You can obtain the storage setting ID from one of the following commands:
  - appiqshow -device -storage system <storagesystem id> -pool
  - appiqlist -pool <id> -storagesetting
  - appiqshow -pool <id> -storagesetting - This command also shows supported sizes for each storage setting.
- <size in MB> is the size of the pool in megabytes.

**appiqdelete -pool <pool id>**

**Description:** Deletes a storage pool. In this instance, <pool id> is the identifier for the storage system pool. The identifier for the storage system pool can be obtained using several methods, such as the appiqlist -device -storagesystem <storage system id> -pool command.

## Sorting the Information Displayed

This software provides several commands that enable you to sort the information displayed. Before you can use the commands for sorting information on Windows, you must install Cygwin, which is accessible from <http://www.cygwin.com/>. Cygwin is a program that simulates a Linux environment. Cygwin is required because the following commands include the grep command, which is not recognized by Windows but it is recognized by Linux. If you have the CLI installed on Windows, the commands named in this section must be typed in the Cygwin interface. Refer to the Cygwin Web site for technical questions and issues.

If you have not already done so, connect to the management server. See [Before Using the CLI on page 28](#) or type "AppiqConfig -help" in the CLI.

### Sorting Hosts by Number of HBAs

To sort hosts by the number of host bus adapters, enter the following at the command prompt:

```
# appiqlist -fabric -all -host | grep "Host:" | sort | uniq -c | sort -rn
```

The software displays the following:

```
2 Host:3563:Host_3563  
2 Host:1622:ufo  
2 Host:1620:challenger  
2 Host:1608:YAMATO  
2 Host:1607:TIRPITZ  
1 Host:3597:Host_3597  
1 Host:3594:Host_3594  
1 Host:3591:Host_3591  
1 Host:3588:Host_3588
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the host.

### Sort Storage Systems by Number of Fabrics Connected

To sort the storage systems by the number of fabrics connected, enter the following at the command prompt:

```
# appiqlist -fabric -all -storagesystem | grep "StorageSystem:" | sort | uniq -c | sort -rn
```

The software displays the following:

```
6 StorageSystem:1616:000183500570 (Symm48:3830)
```

```
4 StorageSystem:3536:HITACHI DISK-SUBSYSTEM 0118
2 StorageSystem:3527:DGC LUNZ 0099
2 StorageSystem:1618:LSI2400
2 StorageSystem:1019:LSI4600
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the storage system.

## Search Fabrics for Zone Sets with the Same Name

To obtain a list of fabrics with zone sets with the same name, enter the following at the command prompt:

```
# appiqlist -fabric -all -zoneset | grep "ZoneSet:" | cut -d':' -f3
| sort | uniq -c | sort -rn
```

The software displays the following:

```
3 QAConfig01
3 DevConfig01
2 QAConfig03
2 QAConfig02
2 DevConfig03
1 test98798798
1 test650
1 test
```

The first item is the number of zone sets with the same name. The second item is the name of the zone set.

## Sort All Zones in All Fabrics by Zone Name

To sort all zones in all fabrics by zone name, enter the following at the command prompt:

```
# appiqlist -fabric -all -zone | grep "Zone:" | cut -d':' -f3 | sort
```

The software displays the following:

```
BobsLP8000_FA13B
BobsLP8000_FA13B
Challenger_FA13A
Challenger_FA16A
```

The names of the zones are displayed.

## Display Model Numbers of All Switches

To display the model numbers of all switches, enter the following at the command prompt:

```
# appiqshow -fabric -all -switch | grep "^\Model:" | cut -d':' -f2 | sort | uniq -c | sort -rn
```

The software displays the following:

```
5 SilkWorm 2800  
2 SilkWorm 3800  
2 SilkWorm 2400  
1 5000.001
```

The first item is the number of switches of that type. The second item is the model name.

## Storage Systems

Use the following types of CLI commands to obtain information about storage systems:

- **appiqlist** – Lists information about the components of the storage system.
- **appiqshow** – Provides a detailed description of the components in the storage system.
- **appiqstats** – Provides statistics about a storage system or its components, such as a storage pool.

### appiqdelete -device -storagesystem <storage system id> [-accesspoint]

**Description:** Deletes the specified storage system. The optional **-accesspoint** tag deletes the storage system entry from the access point list.

In this instance, **<storage system id>** is the storage system identifier. The storage system identifier can be obtained using several methods, such as the **appiqlist -device -storagesystem -all** command.

### appiqlist -device -storagesystem -all

**Description:** Lists the storage systems the management server detects.

**Example:**

```
C:\cli>appiqlist -device -storagesystem -all  
StorageSystem:1000:HDS9910@192.168.1.236  
StorageSystem:1001:000183500570 (Symm48:3830)  
StorageSystem:1006:LSI2400  
StorageSystem:1009:LSI4600
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element.

## appiqlist -device -storagesystem <storage system id>

**Description:** Provides the name of the storage system specified.

In this instance, <storage system id> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

**Example:**

```
C:\cli>appiqlist -device -storagesystem 1006  
StorageSystem:1006:LSI2400
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element.

## appiqlist -device -storagesystem <storage system id> -all

**Description:** Lists the subcomponents of the specified storage system.

In this instance, <storage system id> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -port

**Description:** Lists the ports for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -lun

**Description:** Lists the LUNs for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -pool

**Description:** Lists the storage pools for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -volume

**Description:** Lists the volumes for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command. To view volume information for HiCommand storage systems, use the AppIQList -device -storagesystem <ssid> -unmappedvolume and AppIQList -device -storagesystem <ssid> -mappedvolume commands.

## appiqlist -device -storagesystem <ssid> -storagecapability

**Description:** Lists the storage capabilities for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -drive

**Description:** Lists the drives for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -extent

**Description:** Lists the extents for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -hostsecuritygroup

**Description:** Provides the host security group for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -maskingcapabilities

**Description:** Lists the masking capabilities for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -unmappedvolume

In this instance, <ssid> is the identifier for a storage system. The storage system identifier can be found through several methods, such as the appiqlist -device -storagesystem -all command.

**Description:** Lists the unmapped volumes for the storage system specified.

## appiqlist -device -storagesystem <ssid> -mappedvolume

**Description:** Lists the mapped volumes for the storage system specified.

In this instance, <ssid> is the identifier for a storage system. The storage system identifier can be found through several methods, such as the appiqlist -device -storagesystem -all command.

## appiqlist -device -storagesystem <ssid> -storageclientsettings

**Description:** Lists the storage client settings for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqset -device -storagesystem <ssid> -customname <new name>

**Description:** Sets the custom name of the specified storage system.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## appiqshow -device -storagesystem -all

**Description:** Provides a detailed description of the storage systems detected by the management server.

## appiqshow -device -storagesystem <ssid>

**Description:** Provides a detailed description of the specified storage system, such as the controller port identifiers for the storage system specified, not the actual ports.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command. To view volume information for HiCommand storage systems, use the AppIQShow -device -storagesystem <ssid> -unmappedvolume and AppIQShow -device -storagesystem <ssid> -mappedvolume commands.

## appiqshow -device -storagesystem <ssid> -all

**Description:** Provides a detailed description of the components of the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqshow -device -storagesystem <ssid> -port

**Description:** Provides a detailed description of the ports for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqshow -device -storagesystem <ssid> -lun

**Description:** Provides a detailed description of the LUNs for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqshow -device -storagesystem <ssid> -pool

**Description:** Provides a detailed description of the storage pools for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqshow -device -storagesystem <ssid> -volume

**Description:** Provides a detailed description of the volumes for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command. To view volume information for HiCommand storage systems, use the AppIQShow -device -storagesystem <ssid> -unmappedvolume and AppIQShow -device -storagesystem <ssid> -mappedvolume commands.

### appiqshow -device -storagesystem <ssid> -unmappedvolume

**Description:** Provides a detailed description of the unmapped volumes for the storage system specified.

In this instance, <ssid> is the identifier for a storage system. The storage system identifier can be found through several methods, such as the appiqlist -device -storagesystem -all command.

### appiqshow -device -storagesystem <ssid> -mappedvolume

**Description:** Provides a detailed description of the mapped volumes for the storage system specified.

In this instance, <ssid> is the identifier for a storage system. The storage system identifier can be found through several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -storagecapability`

**Description:** Provides a detailed description of the storage pool capability for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -drive`

**Description:** Provides a detailed description of the drives for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -extent`

**Description:** Provides a detailed description of the extents for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -hostsecuritygroup`

**Description:** Provides a detailed description of the host security group for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -maskingcapabilities`

**Description:** Provides a detailed description of the masking capabilities for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the `appiqlist -device -storagesystem -all` command.

### `appiqshow -device -storagesystem <ssid> -storageclientsettings`

**Description:** Provides a detailed description of the storage client settings for the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqstats -device -storagesystem -all

**Description:** Provides statistics about the storage systems the management server discovers.

### appiqstats -device -storagesystem <ssid>

**Description:** Provides statistics about the storage system specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

### appiqstats -device -storagesystem <ssid> -pool

**Description:** Provides statistics about the storage pools on the specified storage systems.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## EMC Centera

### appiqlist -device -storagesystem <ssid> -poolcapability

**Description:** Lists the storage pool capabilities for Centera devices.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as with the appiqlist -device -storagesystem -all command.

### appiqlist -device -storagesystem <ssid> -profiles

**Description:** Lists the profiles for the Centera devices.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as with the appiqlist -device -storagesystem -all command.

### appiqlist -device -storagesystem <ssid> -node

**Description:** Lists the nodes for the Centera devices specified.

In this instance <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as appiqlist -device -storagesystem -all command.

**appiqlist -device -storagesystem <ssid> -node -disk**

**Description:** Lists the disks for the Centera device node specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as with the appiqlist - device -storagesystem -all command.

**appiqshow -device -storagesystem <ssid> -profiles**

**Description:** Provides a detailed description of the profiles for the Centera device specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

**appiqshow -device -storagesystem <ssid> -node**

**Description:** Provides a detailed description of the nodes for the Centera device specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

**appiqshow -device -storagesystem <ssid> -node -disk**

**Description:** Provides a detailed description of the disks for the Centera device node specified.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

**appiqstats -device -storagesystem <ssid> -node**

**Description:** Provides statistics about the nodes on the specified Centera devices.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

**appiqstats -device -storagesystem <ssid> -node -disk**

**Description:** Provides statistics about the disks on the specified Centera device node.

In this instance, <ssid> is the storage system identifier. The storage system identifier can be obtained using several methods, such as the appiqlist -device -storagesystem -all command.

## Switches

Use the following types of CLI commands to obtain information about switches:

- **appiqlist** – Lists information about the components of the switch
- **appiqshow** – Provides a detailed description of the components in the switch

## appiqdelete -device -switch <switch id> [-accesspoint]

**Description:** Deletes the specified switch. The optional `-accesspoint` tag deletes the access point managing the switch. Other elements that are managed by the same access point are also deleted if they are not managed by any other access points.

In this instance, `<switch id>` is the switch identifier. The switch identifier can be obtained using several methods, such as the `appiqlist -device -switch -all` command.

## appiqlist -device -switch -all

**Description:** Lists the switches the management server detects.

**Example:**

```
C:\cli>appiqlist -device -switch -all  
Switch:1005:QBrocade2  
Switch:1007:QBrocade5  
Switch:1008:AppIQ_ED-6064  
Switch:1011:AppIQ_ES-3016  
Switch:1012:QBrocade3  
Switch:1013:QBrocade4  
Switch:1014:QBrocade1
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element.

## appiqlist -device -switch <switch id>

**Description:** Provides the name of the switch specified by the switch identifier.

In this instance, `<switch id>` is the switch identifier. The switch identifier can be obtained using several methods, such as the `appiqlist -device -switch -all` command.

**Example:**

```
C:\cli>appiqlist -device -switch 1007  
Switch:1007:QBrocade5
```

The number after the first colon is the identifier for the element. The item after the second colon is the name of the element.

## appiqlist -device -switch <switch id> -all

**Description:** Lists the elements associated with the specified switch, such as ports, zones, zone aliases and zone sets.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqlist -device -switch <switch id> -port

**Description:** Provides information about the ports on the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqlist -device -switch <switch id> -zonealias

**Description:** Provides information about zone aliases on the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqlist -device -switch <switch id> -zone

**Description:** Provides information about zones on the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqlist -device -switch <switch id> -zoneset

**Description:** Provides information about zone sets on the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqset -device -switch <switch id> -customname <new name>

**Description:** Sets the custom name of the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## appiqshow -device -switch -all

**Description:** Provides detailed information about the switches detected by the management server. Inter Switch Link (ISL) trunking information is also provided, if accessible, for supported switches.

## appiqshow -device -switch <switch id>

**Description:** Provides detailed information about the specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqshow -device -switch <switch id> -all

**Description:** Provides detailed information about the specified switch and the subelements of the switch, such as ports, zones, zone aliases, and zone sets.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqshow -device -switch <switch id> -port

**Description:** Provides detailed information about the ports on the specified switch. Inter Switch Link (ISL) trunking information is also provided, if accessible, for supported switches.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqshow -device -switch <switch id> -zone

**Description:** Provides detailed information about zones in the switch fabric.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqshow -device -switch <switch id> -zoneset

**Description:** Provides detailed information about zone sets in the switch fabric.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqshow -device -switch <switch id> -zonealias

**Description:** Provides detailed information about zone aliases in the switch fabric.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

### appiqstats -device -switch -all

**Description:** Provides statistical information about all switches

### appiqstats -device -switch <switch id>

**Description:** Provides statistical information about a specified switch.

In this instance, <switch id> is the switch identifier. The switch identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.

## Tape Libraries

Use the following types of CLI commands to obtain information about tape libraries:

- **appiqlist** – Lists information about the components of the tape libraries
- **appiqshow** – Provides a detailed description of the components in the tape libraries

### appiqdelete -device -tapelibrary <library ID> [-accesspoint]

**Description:** Deletes the specified element. The optional `-accesspoint` tag deletes the tape library entry from the access point list.

In this instance, `<library id>` is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the `appiqlist -device -tapelibrary -all` command.

### appiqlist -device -tapelibrary -all

**Description:** Lists all the tape libraries that the management server detects.

### appiqlist -device -tapelibrary <library ID>

**Description:** Provides the name of the specified tape library.

In this instance, `<library id>` is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the `appiqlist -device -tapelibrary -all` command.

### appiqlist -device -tapelibrary <library ID> -all

**Description:** Lists all the subcomponents (port, media access device, controller cards, and changer devices) that belong to the specified tape library.

In this instance, `<library id>` is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the `appiqlist -device -tapelibrary -all` command.

### appiqlist -device -tapelibrary <library ID> -port

**Description:** Lists all Fibre Channel ports that belong to the specified tape library.

In this instance, `<library id>` is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the `appiqlist -device -tapelibrary -all` command.

### appiqlist -device -tapelibrary <library ID> -mediaaccessdevice

**Description:** Lists all media-access devices that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqlist -device -tapelibrary <library ID> -controller

**Description:** Lists all front-end controller cards that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqlist -device -tapelibrary <library ID> -changerdevice

**Description:** Lists all changer devices that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqset -device -tapelibrary <library ID> -customname <new name>

**Description:** Sets the custom name of the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary -all

**Description:** Provides a detailed description of all the tape libraries that the management server detects.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID>

**Description:** Provides a detailed description of a specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID> -all

**Description:** Provides a detailed description of all subcomponents (for example, port, media-access device, controller, and changer device) that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID> -port

**Description:** Provides a detailed description of all Fibre Channel ports that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID> -mediaaccessdevice

**Description:** Provides a detailed description of all media-access devices that belong to the specified tape library

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID> -controller

**Description:** Provides a detailed description of all front-end controller cards that belongs to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

### appiqshow -device -tapelibrary <library ID> -changerdevice

**Description:** Provides a detailed description of all changer devices that belong to the specified tape library.

In this instance, <library id> is the identifier for the tape library. The identifier for the tape library can be obtained using several methods, such as the appiqlist -device -tapelibrary -all command.

## Volumes

Use the following types of CLI commands to create and delete volumes:

- **appiqcreate** – Creates a volume.
- **appiqdelete** – Deletes a volume.

## appiqdelete -volume <list of volume id>

**Description:** Deletes the volume specified. In this instance, <volume id> is the identifier of a volume. The <volume id> can be obtained through several methods, such as the appiqlist -device -storagesystem <id> -volume command.

## appiqcreate -volume <stor sys pool id> -storagesetting <storage setting id | [-default]> -size <size in MB>

**Description:** Creates a storage volume with the specified storage pool and the storage setting ID.

In this instance:

- <stor sys pool id> is the identifier for a storage system pool. The storage system pool identifier can be found through several methods, such as the appiqlist -device -storagesystem <ssid> -pool command.
- <storage setting id | -default> is the identifier for the storage setting. The storage setting identifier can be found through several methods, such as the appiqshow -device -storagesystem <id> -pool command.
- <size in MB> is the size of the volume in megabytes.

To create a storage volume on an LSI storage system, use the appiqcreate -volume <stor sys pool id> -lsi -storagesetting <storage setting id | [-default]> -size<size in MB> -cacheahead <ca> -segmentsize <ssize> -name <name> command.

## appiqcreate -volume <stor sys pool id> -storagesetting <storage setting id | [-default]> -size <size in MB> -name <name>

**Description:** Creates a storage volume on the specified storage pool with the storage settings ID and name.

In this instance:

- <stor sys pool id> is the identifier for a storage system pool. The storage system pool identifier can be found through several methods, such as the appiqlist -device -storagesystem <ssid> -pool command.
- <storage setting id | -default> is the identifier for the storage setting. The storage setting identifier can be found through several methods, such as the appiqshow -device -storagesystem <id> -pool command.
- <size in MB> is the size of the volume in megabytes.
- <name> is the name of the storage volume you want to create.

To create a storage volume on an LSI storage system, use the `appiqcreate -volume <stor sys pool id> -lsi -storagesetting <storage setting id | [-default]> -size<size in MB> -cacheahead <ca> -segmentsize <ssize> -name <name>` command.

**Note:** Not all storage systems support assigning a name at creation time.

```
appiqcreate -volume <stor sys pool id> -lsi -storagesetting <storage setting id | [-default]>
-size<size in MB> -cacheahead <ca> -segmentsize <ssize> -name
<name>
```

**Description:** Creates a storage volume on an LSI storage system.

In this instance:

- `<stor sys pool id>` is the identifier for a storage system pool. The storage system pool identifier can be found through several methods, such as the `appiqlist -device -storagesystem <ssid> -pool` command.
- `<storage setting id | -default>` is the identifier for the storage setting. The storage setting identifier can be found through several methods, such as the `appiqshow -device -storagesystem <id> -pool` command.
- `<size in MB>` is the size of the volume in megabytes.
- `<ca>` is the cache read-ahead multiplier (0 to 65535 bytes). A cache read-ahead multiplier copies additional data blocks into the cache while it is reading and copying host-requested data blocks from disk to cache. Select the multiplier that maximizes performance for the way the volume will be utilized.
- `<ss>` is the segment size of the volume.
- `<name>` is the name of the storage volume you want to create.

To create a storage volume on a storage system other than LSI, see:

- `appiqcreate -volume <stor sys pool id> -storagesetting <storage setting id | [-default]> -size <size in MB>` on previous page
- `appiqcreate -volume <stor sys pool id> -storagesetting <storage setting id | [-default]> -size <size in MB> -name <name>` on previous page

## Zones

Use the following types of CLI commands to manage and obtain information about zones:

- **appiqlist** – Lists the ports and zone aliases in a specified zone.
- **appiqshow** – Provides detailed information about ports and zone aliases within a specified zone.
- **appiqcreate** – Creates a zone.

- **appiqdelete** – Deletes a zone.
- **appiqadd** – Enables you add a specified zone to a zone set. You can also use this command to add zone aliases or ports to a zone.
- **appiqremove** – Removes a specified zone from a zone set.

## Naming Conventions for Zones

Naming conventions for brocade switches:

- The name must contain 1 to 64 characters.
- The name must begin with a letter. Any character other than the first character can be a letter, a numeral (0 to 9), or an underscore (\_).
- The name is case sensitive. For example, "Zone1" and "zone1" are different zones.
- You cannot create a zone with the same name as an existing zone, zone alias, or zone set. For example, if you create a zone named "new", you cannot give a zone, zone alias, or zone set the same name.
- The following characters are invalid for Brocade switches: caret (^), dash (-), and dollar sign (\$).

Naming Conventions for McDATA Switches:

- The name can have a maximum of 64 characters.
- The first character of a zone name must be a letter (A-Z, AZ).
- A zone name cannot contain spaces.
- Valid characters are a-a, AA, 0-9, caret (^), dash (-), underscore (\_), and dollar sign (\$).
- All names must be unique and cannot differ by case. For example, myzone and MyZone are considered to be the same zone.

## Naming Conventions for Zones

**Naming conventions for brocade switches:**

- The name must contain 1 to 64 characters.
- The name must begin with a letter. Any character other than the first character can be a letter, numeral (0 to 9), or underscore (\_).
- The name is case sensitive. For example, "Zone1" and "zone1" are different.
- You cannot create a zone with the same name as an existing zone, zone alias, or zone set. For example, if you create a zone named "new," you cannot give a zone, zone alias, or zone set the same name.
- The following characters are invalid for Brocade switches: caret (^), dash (-), and dollar sign (\$).

**Naming Conventions for McDATA Switches:**

- The name can have a maximum of 64 characters.
- The first character of a zone name must be a letter (A-Z, AZ).
- A zone name cannot contain spaces.
- Valid characters are a-a, AA, 0-9, caret (^), dash (-), underscore (\_), and dollar sign (\$).
- All names must be unique and may not differ by case. For example, myzone and MyZone are considered to be the same zone.

## appiqlist -zone <zone id> -all

**Description:** Lists the ports, zone aliases, hosts, and storage systems contained in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqlist -zone <zone id> -host

**Description:** Lists the hosts in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqlist -zone <zone id> -storagesystem

**Description:** Lists the storage systems in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqlist -zone <zone id> -port

**Description:** Lists the ports in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqlist -zone <zone id> -zonealias

**Description:** Lists the zone aliases in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id>

**Description:** Provides a detailed description of the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id> -all

**Description:** Provides a detailed description of the ports and zone aliases contained in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id> -host

**Description:** Provides a detailed description of the hosts contained in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id> -storagesystem

**Description:** Provides a detailed description of the storage systems contained in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id> -port

**Description:** Provides a detailed description of the ports in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqshow -zone <zone id> -zonealias

**Description:** Provides a detailed description of the zone aliases in the zone specified.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqcreate -zone <VSAN1>:<switch1>:<zone> -fabric <fabric id> -port <port id>

**Description:** Creates a zone alias in the virtual storage area network (VSAN) you specify. This command is only for switches that use VSANs. Use the appiqcreate -zone <zone name> -fabric <fabric id> -port <port id> command for switches that do not use VSANs.

In this instance:

- <VSAN1> is the name of the virtual SAN in which you want to create the zone alias.
- <switch1> is the name of the switch on which you want to create the zone alias.
- <zone> is the name of the zone you want to create.

- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <port id> is the port identifier for a host, switch, or storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command, and the port identifier for a storage system can be obtained using the appiqlist -device -storagesystem <storage system id> -port command. The port identifier for a switch can be obtained using the appiqlist -device -switch <switch id> -all command.

**appiqcreate -zone <zone name> -fabric <fabric id> -switch <switch id> -port <port id>**

**Description:** Creates a zone within the specified fabric. If you used the port identifier of a host when you created the zone, use the appiqadd -zone <zone id> -port <port id> command to add the port identifier for the storage system. Likewise, if you used the port identifier of a storage system when you created the zone, use the appiqadd -zone <zone id> -port <port id> command to add the port identifier for the host. This command is for switches that do not use virtual storage area networks (VSANs). Use the appiqcreate -zone <VSAN1>:<switch1>:<zone> -fabric <fabric id> -port <port id> command for switches that do use virtual storage area networks.

In this instance:

- <zone name> is the name of the zone. To make sure you do not have a zone with the same name, enter the appiqlist -fabric <fabric id> -zone command.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <switch id> is the switch identifier. The switched identifier can be obtained using several methods, such as the appiqlist -device -switch -all command.
- <port id> is the port identifier for a host or storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command and the port identifier for a storage system can be obtained using the appiqlist -device -storagesystem <storage system id> -port command.

**appiqcreate -zone <zonename> -fabric <fabric id> -zonealias <zonealias id>**

**Description:** Creates a zone within the specified fabric and containing the specified zone alias. Use the appiqadd -zone <zone id> -port <port id> command to add the port identifier for a storage system or host. Spaces and dashes are not supported within the zone name for McDATA and Brocade switches. This command is for switches that do not use virtual storage area networks (VSANs). Use the appiqcreate -zone <VSAN1>:<switch1>:<zone> -fabric <fabric id> -port <port id> command for switches that do use virtual storage area networks.

In this instance:

- <zone name> is the name of the zone. Make sure you do not have a zone with the same name by entering the appiqlist -fabric <fabric id> -zone command.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <zonealias id> is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the appiqlist -zone <zone id> -zonealias command.

## appiqdelete -zone <zone id>

**Description:** Deletes the specified zone.

In this instance, <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqcreate -zone <zonename> -fabric <fabric id> -zonealias <zonealias id> -port <port id>

**Description:** Creates a zone within the specified fabric and containing the specified zone alias. If you used the port identifier of a host when you created the zone, use the appiqadd -zone <zone id> -port <port id> command to add the port identifier for the storage system. Likewise, if you used the port identifier of a storage system when you created the zone, use the appiqadd -zone <zone id> -port <port id> command to add the port identifier for the host. This command is for switches that do not use virtual storage area networks (VSANs). Use the appiqcreate -zone <VSAN1>:<switch1>:<zone> -fabric <fabric id> -port <port id> command for switches that do use virtual storage area networks.

In this instance:

- <zone name> is the name of the zone. Make sure you do not have a zone with the same name by entering the appiqlist -fabric <fabric id> -zone command.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <zonealias id> is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the appiqlist -zone <zone id> -zonealias command.
- <port id> is the port identifier for a host or a storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command and the port identifier for a storage system can be obtained using the appiqlist -device -storageSystem <storage system id> -port command.

## appiqadd -zone <zone id> -port <port id>

**Description:** Adds a specified port to a zone.

In this instance:

- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

- <port id> is the port identifier for a host or a storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command and the port identifier for a storage system can be obtained using the appiqlist -device -storagesystem <storage system id> -port command.

## appiqadd -zone <zone id> -zonealias <zonealias id>

**Description:** Adds a zone alias to a zone.

In this instance:

- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.
- <zonealias id> is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the appiqlist -zone <zone id> -zonealias command.

## appiqremove -zone <zone id> -port <port id>

**Description:** Removes a port from a zone.

In this instance:

- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.
- <port id> is the port identifier. The port identifier can be obtained using the appiqlist -zone <zoneid> -port command.

## appiqremove -zone <zone id> -zonealias <zonealias id>

**Description:** Removes a zone alias from a zone.

In this instance:

- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.
- <zonealias id> is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the appiqlist -zone <zone id> -zonealias command.

## Zone Aliases

Use the following types of CLI commands to manage and obtain information zone aliases:

- **appiqshow** – Obtains a detailed description about the zone alias.
- **appiqcreate** – Creates a zone alias.
- **appiqdelete** – Deletes a zone alias.
- **appiqadd** – Adds a zone alias.
- **appiqremove** – Removes a zone alias.

## appiqshow -zonealias <zonealias id>

**Description:** Provides a detailed description of the zone alias specified.

In this instance, <zonealias id> is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the appiqshow -fabric -all -zonealias command.

## appiqcreate -zonealias <VSAN1>:<switch1>:<zonealias> -fabric <fabric id> -port <port id>

**Description:** Creates a zone alias in the virtual storage area network (VSAN) you specify. This command is only for switches that use VSANs. Use the appiqcreate -zonealias <zone alias name> -fabric <fabric id> -port <port id> command for switches that do not use VSANs.

In this instance:

- <VSAN1> is the name of the virtual SAN in which you want to create the zone alias.
- <switch1> is the name of the switch on which you want to create the zone alias.
- <zonealias> is the name of the zone alias you want to create.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <port id> is the port identifier for a host, switch, or storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command, and the port identifier for a storage system can be obtained using the appiqlist -device -storagesystem <storage system id> -port command. The port identifier for a switch can be obtained using the appiqlist -device -switch <switch id> -all command.

## appiqcreate -zonealias <zone alias name> -fabric <fabric id> -port <port id>

**Description:** Creates a zone alias assigned to a port in a specified fabric. This command is for switches that do not use virtual storage area networks (VSANs). Use the appiqcreate -zonealias <VSAN1>:<switch1>:<zonealias> -fabric <fabric id> -port <port id> for switches that use VSANs.

In this instance:

- <zone alias name> is the name for the zone alias that will be created.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <port id> is the port identifier for a host, switch, or storage system. The port identifier for a host can be obtained using the appiqlist -device -host <id> -port command, and

the port identifier for a storage system can be obtained using the `appiqlist -device -storagesystem <storage system id> -port` command. The port identifier for a switch can be obtained using the `appiqlist -device -switch <switch id> -all` command.

### **appiqdelete -zonealias <zonealias id>**

**Description:** Deletes a zone alias.

In this instance, `<zonealias id>` is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the `appiqshow -fabric -all -zonealias` command.

### **appiqadd -zonealias <zonealias id> -port <port id>**

**Description:** Adds a port to a zone alias.

In this instance:

- `<zonealias id>` is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the `appiqshow -fabric -all -zonealias` command.
- `<port id>` is the port identifier for a host, switch, or storage system.

The port identifier for a *host* can be obtained using the `appiqlist -device -host <id> -port` command.

The port identifier for a *storage system* can be obtained using the `appiqlist -device -storagesystem <storage system id> -port` command.

The port identifier for a *switch* can be obtained using the `appiqlist -device -switch <switch id> -all` command.

### **appiqremove -zonealias <zonealias id> -port <port id>**

**Description:** Removes the association with a zone alias and a specified port.

In this instance:

- `<zonealias id>` is the zone alias identifier. The zone alias identifier can be obtained using several methods, such as the `appiqshow -fabric -all -zonealias` command.
- `<port id>` is the port identifier. The port identifier can be obtained using the `appiqshow -zonealias <zonealias id> -port` command.

## **Zone Sets**

Use the following types of CLI commands to manage and obtain information about zone sets:

- **appiqlist** – Lists information about the members of the zone set specified.
- **appiqshow** – Obtains a detailed description about the members of the zone set specified.
- **appiqcreate** – Creates a zone set.

- **appiqactivate** – Activates a zone set.
- **appiqdelete** – Deletes a zone set.
- **appiqadd** – Adds a specified zone to a zone set.
- **appiqremove** – Removes a zone set.

### appiqlist -zoneset <zoneset id>

**Description:** Lists the elements that are contained within the zone set specified.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

### appiqlist -zoneset <zoneset id> -zone

**Description:** Lists the zones that are contained within the zone set specified.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

### appiqshow -zoneset <zoneset id>

**Description:** Provides a detailed description of the zone set specified.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

### appiqshow -zoneset <zoneset id> -zone

**Description:** Provides a detailed description of the zones that are contained within the zone set specified.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

### appiqcreate -zoneset <VSAN1>:<switch1>:<zoneset> -fabric <fabric id> -zone <zone id>

**Description:** Creates a zone set in the virtual storage area network (VSAN) you specify. This command is only for switches that use VSANs. Use the appiqcreate -zoneset <zoneset name> -fabric <fabric id> -zone <zone id> command for switches that do not use VSANs.

In this instance:

- <VSAN1> is the name of the virtual SAN in which you want to create the zone set.
- <switch1> is the name of the switch on which you want to create the zone set.
- <zoneset> is the name of the zone set you want to create.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <zone id> is the zone in which you want to create the zone set.

## appiqcreate -zoneset <zoneset name> -fabric <fabric id> -zone <zone id>

**Description:** Creates a zone set with the name specified by <zoneset name> in the fabric specified by <fabric id>. The zone set contains the zone identified by <zone id>. This command is for switches that do not use virtual storage area networks (VSANs). Use the appiqcreate -zoneset <VSAN1>:<switch1>:<zoneset> -fabric <fabric id> -zone <zone id> command for switches that use VSANs.

In this instance:

- <zoneset name> is the name of the zone set. To verify you have a unique name for the zone set in the fabric, enter the appiqlist -fabric <fabric id> -zoneset command.
- <fabric id> is the fabric identifier. The fabric identifier can be obtained using several methods, such as the appiqlist -fabric -all command.
- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

## appiqdelete -zoneset <zoneset id>

**Description:** Deletes the zone set specified by <zoneset id>.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

## appiqactivate -zoneset <zoneset id>

**Description:** Activates the zone set specified by <zoneset id>. The zone set that was previously active is automatically deactivated.

In this instance, <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.

## appiqadd -zoneset <zoneset id> -zone <zone id>

**Description:** Adds the zone to the zone set specified by <zoneset id>.

In this instance:

- <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.
- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zone command.

### appiqremove -zoneset <zoneset id> -zone <zone id>

**Description:** Removes the zone from the specified zone set.

In this instance:

- <zoneset id> is the zone set identifier. The zone set identifier can be obtained using several methods, such as the appiqlist -fabric <fabric id> -zoneset command.
- <zone id> is the zone identifier. The zone identifier can be obtained using several methods, such as the appiqlist -zoneset <zoneset id> -zone command.