CHAPTER 13

Collecting Data for the Cisco TAC

It is important to proactively attach troubleshooting information and logs when opening a TAC case to expedite problem resolution. This chapter contains the recommended procedures for collecting information for troubleshooting that should be attached to a TAC case. A Cisco TAC engineer may request additional data, but if the following actions are performed, the engineer will have data to review right away, which should reduce the problem resolution time.

This chapter includes the following sections:

Collecting Show Tech-Support Information

Introduced: Cisco NX-OS Release 4.0(1)

The **show tech–support** command is useful when diagnosing a potential problem or when collecting information to attach to a Cisco TAC case. The contents of a **show tech-support** are usually vary large and will vary in size depending on how long the system has been powered up. The **show tech-support** command supports feature options such as **hsrp**, **ospf**, etc. This is useful when troubleshooting, if you want to collect a subset of information for a specific feature.

When running a **show tech-support** for a specific feature, detailed information is collected by default. The **brief** option can be specified to collect less data for a feature, although this option is typically not recommended. When running a **show tech-support** for all features you have to specify the **details** option if you want to collect the additional data.

The first example captures detailed information for all features using the **space-optimized** option. The second example captures detailed information for **ospf** and redirects it to a file in flash (bootflash:).

```
n7000# show tech-support details space-optimized

n7000# show tech-support ospf > show-tech-ospf
```

Generating a TAC-PAC

Introduced: Cisco NX-OS Release 4.0(1)

When opening a TAC case, always generate a **tac-pac** and attach the file to the case. This allows the Cisco TAC engineers to obtain information about the issue without having to ask for a **show tech-support**. A **tac-pac** collects useful information that is stored in a compressed file, so it is easier to transfer than a **show tech-support** redirected to an uncompressed file. The following example saves the compressed file in flash (Slot0:).

```
n7000# tac-pac slot0:tac-pac-for-tac
```

Archiving or Compressing Multiple Files

Introduced: Cisco NX-OS Release 4.0(1)

Multiple files can be archived and compressed to simplify the transport process when saving data to a remote destination.

```
n7000# show tech hsrp > hsrp-detail.txt
n7000# show tech ospf > ospf-detail.txt

n7000# dir bootflash: | grep detail
    9855855    Nov 02 21:07:40 2010  hsrp-detail.txt
       2703    Nov 02 21:08:11 2010  ospf-detail.txt

n7000# tar create bootflash:tac-info gz-compress bootflash:hsrp-detail.txt
bootflash:ospf-detail.txt

n7000# dir bootflash:tac-info.tar.gz
     860311    Nov 02 21:12:51 2010  tac-info.tar.gz
```

Verifying and Collecting Core Files

Introduced: Cisco NX-OS Release 4.0(1)

When a process has an unexpected restart or failure, Cisco NX-OS saves a core file that contains details about the event. The content in a core file is useful for Cisco TAC engineers and software developers to diagnose the process failure. The core files should be copied and attached to the TAC case. The following commands determine if there are any core files and copies them to a remote destination. This example uses SCP, but other transport protocols such as SFTP, FTP or TFTP can be used.

```
n7000# show cores

VDC No Module-num       Process-name      PID     Core-create-time

------ ----------       ------------      ---     ----------------
1   8         acltcam     285     Oct 27 09:32


n7000# copy core://8/285 scp://username@x.x.x.x/acltcam-core
```