Smart Call Home Quick Start Configuration Guide

Smart Call Home offers proactive diagnostics and real-time alerts on select Cisco devices, which provides higher network availability and increased operational efficiency. Smart Call is a secure connected service of Cisco SMARTnet for the Catalyst 6500.

This document provides information to configure and register a Catalyst 6500 for Smart Call Home using four options. It is assumed that the device has the necessary DNS configuration (ip domain-name and ip name-server for DNS look-ups or ip host for static entries) in order to resolve host-names that may appear in destination addresses.

- 1. HTTPS transport from the Catalyst 6500 to Cisco
- 2. Email transport from the Catalyst 6500 to Cisco
- 3. HTTP from the Catalyst 6500 to a Transport Gateway (TG) HTTPS transport to Cisco
- 4. Email from the Catalyst 6500 to a Transport Gateway (TG) HTTPS transport to Cisco

Note: For security reasons, Cisco recommends customers make use of one of the HTTPS transport options, due to the additional payload encryption that HTTPS offers. The Transport Gateway software is downloadable from Cisco and is available for customers that require an aggregation point or a proxy for connection to the internet.

Requirements for Smart Call Home:

IOS version 12.2(33) SXH is the minimum version required to support Call Home.

NOTE: Both Modular and Non-modular IOS images are supported.

- A CCO ID associated with an appropriate Cisco SMARTnet Service contract for your company.
- Cisco SMARTnet Service for the device to be registered.
- An image with cryptographic support is required to encrypt messages on the Catalyst 6500 for HTTPS transport.

Resources for Smart Call Home:

Different resources are available for Smart Call Home at www.cisco.com/go/smartcall.

The complete Call-Home configuration guide is available at http://www.cisco.com/en/US/docs/switches/lan/catalyst6500/ios/12.2SX/configuration/guide/callhome.html.

The Smart Call-Home User Guide is available at http://www.cisco.com/c/dam/en/us/td/docs/switches/lan/smart_call_home/user_guides/ Book.pdf.

The Smart Call Home server certificate for HTTPS is available at - http://www.cisco.com/en/US/docs/switches/lan/smart_call_home/user_guides/SCH_Ch6.pdf#G1039385.

Call Home Configuration - HTTPS to Cisco

The following is a sample configuration showing the minimum steps required to configure Call Home on a Catalyst 6500 to communicate securely with the Smart Call Home System using HTTPS and a command to start the registration process. All commands are in blue.

1. **Enable Call Home** - In global configuration mode enter the service call-home command to activate the call-home feature and enter the call-home configuration command to enter call-home configuration mode.

```
Cat6500#configure terminal
Cat6500(config)#service call-home
Cat6500(config)#call-home
```

2. Configure the mandatory contact email address -

```
Cat6500(cfg-call-home) #contact-email-addr username@domain-name
```

3. Activate the default CiscoTAC-1 Profile and set the transport option to HTTP-

```
Cat6500(cfg-call-home) #profile CiscoTAC-1
Cat6500(cfg-call-home-profile) #active
Cat6500(cfg-call-home-profile) #destination transport-method http
```

4. Install a security certificate - Copy the Cisco server certificate from http://www.cisco.com/en/US/docs/switches/lan/smart_call_home/user_guides/SCH_Ch6.pdf#G10393
85 . The security certificate can be copied from the previous URL, which is from the Smart Call Home User's Guide. Configure a trust-point and prepare to enroll the certificate via the terminal using copy and paste when prompted.

```
Cat6500(config) #crypto pki trustpoint cisco
Cat6500(ca-trustpoint) #enroll terminal
Cat6500(ca-trustpoint) #revocation-check crl none
Cat6500(ca-trustpoint) #exit
Cat6500(config) #crypto pki authenticate cisco

Enter the base 64 encoded CA certificate.
End with a blank line or the word "quit" on a line by itself
[paste the certificate here and accept it]
% Do you accept this certificate? [yes/no]: yes
Trustpoint CA certificate accepted.
% Certificate successfully imported
```

5. Exit and Save the configuration -

```
Cat6500(config) #end
Cat6500#copy running-config startup-config
```

6. Send a Call Home Inventory message to start the registration process -

```
Cat6500#call-home send alert-group inventory profile CiscoTAC-1 Sending inventory info call-home message ... Please wait. This may take some time ...
```

7. Receive an email from Cisco and follow the link to complete registration for Smart Call home -

Call Home Configuration - Email to Cisco

The following is a sample configuration showing the minimum steps required to configure Call Home on a Catalyst 6500 to communicate using email with the Smart Call Home System and a command to start the registration process. All commands are in blue.

1. **Enable Call Home** - In global configuration mode enter the service call-home command to activate the call-home feature and enter the call-home configuration command to enter call-home configuration mode.

```
Cat6500#configure terminal
Cat6500(config)#service call-home
Cat6500(config)#call-home
```

2. Configure the mandatory contact email address -

```
Cat6500(cfg-call-home) #contact-email-addr username@domain-name
```

3. Configure the mandatory email server information - The mail-server address is an IP address or domain-name of a SMTP server that Call Home will send email messages to. If more than one mail-server address is configured for redundancy the mail-server priority is used to determine which server is the active primary server. Call Home will send messages to the active server with the lowest priority number.

```
Cat6500(cfg-call-home) #mail-server <address> priority <server priority number>
```

4. Activate the default CiscoTAC-1 Profile and set the transport option to Email -

```
Cat6500(cfg-call-home) #profile CiscoTAC-1
Cat6500(cfg-call-home-profile) #active
Cat6500(cfg-call-home-profile) #destination transport-method email
```

5. Exit and Save the configuration -

```
Cat6500(cfg-call-home-profile) #end
Cat6500#copy running-config startup-config
```

6. Send a Call Home Inventory message to start the registration process -

```
Cat6500#call-home send alert-group inventory profile CiscoTAC-1 Sending inventory info call-home message ... Please wait. This may take some time ...
```

7. Receive an email from Cisco and follow the link to complete registration for Smart Call home -

Call Home Configuration - HTTP to Transport Gateway and HTTPS to Cisco

The following is a sample configuration showing the minimum steps required to configure Call Home on a Catalyst 6500 to use HTTP to send to a Transport Gateway (TG) and a command to start the registration process. The TG will use HTTPS to communicate with the Smart Call Home System. This assumes that the Transport Gateway software has been installed, configured and registered with Smart Call Home. All commands are in blue.

1. **Enable Call Home** - In global configuration mode enter the service call-home command to activate the call-home feature and enter the call-home configuration command to enter call-home configuration mode.

```
Cat6500#configure terminal
Cat6500(config)#service call-home
Cat6500(config)#call-home
```

2. Configure the mandatory contact email address -

```
Cat6500 (cfg-call-home) #contact-email-addr username@domain-name
```

3. De-activate the default CiscoTAC-1 Profile if it is active -

```
Cat6500(cfg-call-home) #profile CiscoTAC-1 Cat6500(cfg-call-home-profile) #no active
```

4. **Configure a user profile** - The profile's alert-group subscriptions will be similar to the default CiscoTAC-1 profile with the destination HTTP transport-method and with a destination HTTP address provided by the Transport Gateway (Refer to Configure the HTTP Server section). Some versions of the IOS have a problem parsing the URL if it contains an IP address followed by a port number (refer to bug CSCsv52025). The work-around is to replace the IP address with the domain/host name of the TG or use port 80 and remove the port number from the URL.

```
Cat6500 (cfg-call-home-profile) #profile Your_profile_name
Cat6500 (cfg-call-home-profile) #active
Cat6500 (cfg-call-home-profile) #destination transport-method http Cat6500 (cfg-call-home-profile) #destination address http http://url from_TG Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group diagnostic severity minor Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group environment severity minor
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group syslog severity major pattern ".*"
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group configuration periodic monthly 23 15:00
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group inventory periodic monthly 23 15:00
```

5. Exit and Save the configuration -

```
Cat6500(cfg-call-home-profile) #end
Cat6500#copy running-config startup-config
```

6. Send a Call Home Inventory message to start the registration process -

```
Cat6500#call-home send alert-group inventory profile Your_profile_name Sending inventory info call-home message ... Please wait. This may take some time ...
```

7. Receive the email from Cisco and follow the link to complete registration for Smart Call home.

Call Home Configuration - Email to Transport Gateway and HTTPS to Cisco

The following is a sample configuration showing the minimum steps required to configure Call Home on a Catalyst 6500 to send Email to a Transport Gateway (TG) and a command to start the registration process. The TG will use HTTPS to communicate with the Smart Call Home System. This assumes that the Transport Gateway software has been installed, configured and registered with Smart Call Home. All commands are in blue.

1. **Enable Call Home** - In global configuration mode enter the service call-home command to activate the call-home feature and enter the call-home configuration command to enter call-home configuration mode.

```
Cat6500#configure terminal
Cat6500(config)#service call-home
Cat6500(config)#call-home
```

2. Configure the mandatory contact email address -

```
Cat6500(cfg-call-home) #contact-email-addr username@domain-name
```

3. **Configure the mandatory email server information -** The mail-server address is an IP address or domain-name of a SMTP server that Call Home will send email messages to.

```
Cat6500(cfg-call-home) #mail-server <address> priority <server priority number>
```

4. De-activate the default CiscoTAC-1 Profile if it is active -

```
Cat6500(cfg-call-home) #profile CiscoTAC-1
Cat6500(cfg-call-home-profile) #no active
```

5. **Configure a user profile** - The profile's alert-group subscriptions will be similar to the default CiscoTAC-1 profile with the destination email transport-method and with a destination email address which is for the email account used by the Transport Gateway.

```
Cat6500 (cfg-call-home-profile) #profile Your_profile_name
Cat6500 (cfg-call-home-profile) #active
Cat6500 (cfg-call-home-profile) #destination transport-method email
Cat6500 (cfg-call-home-profile) #destination address email account for TG@yourCompany.com
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group diagnostic severity minor
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group environment severity minor
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group syslog severity major pattern ".*"
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group configuration periodic monthly 23 15:00
Cat6500 (cfg-call-home-profile) #subscribe-to-alert-group inventory periodic monthly 23 15:00
```

6. Exit and Save the configuration -

```
Cat6500(cfg-call-home-profile)#end
Cat6500#copy running-config startup-config
```

7. Send a Call Home Inventory message to start the registration process -

```
Cat6500#call-home send alert-group inventory profile Your_profile_name Sending inventory info call-home message ...
Please wait. This may take some time ...
```

8. Receive the email from Cisco and follow the link to complete registration for Smart Call home.

Downloading Cisco Transport Gateway Software

To download Cisco Transport Gateway software, go to the <u>Download Software</u> web page. On that page the Related Information section on the right lists the different OS versions (Linux, Solaris, Windows) of Transport Gateway software. Find the correct OS version of Transport Gateway software in the list and then click either **Download Now** or **Add to cart**.

After you have downloaded the correct OS version of Transport Gateway software, then refer to the <u>Transport Gateway Installation /Configuration /Registration section s of the Smart Call Ho me Users' Guide</u> for information on how to install the downloaded code then configure and register the Transport Gateway.