

# Cisco Unified IP Phone 7900 Series Release Notes for Firmware Release 9.4(2)SR4

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## Cisco Unified IP Phone 7900 Series Release Notes for Firmware Release 9.4(2)SR4

These release notes support the Cisco Unified IP Phone 7900 Series running SCCP and SIP Firmware Release 9.4(2)SR4. The Cisco Unified IP Phones 7945G, 7965G, and 7975G support Firmware Release 9.4(2)SR4.

The following table lists the Cisco Unified Communications Manager release and protocol compatibility for the Cisco Unified IP Phones.

**Table 1: Cisco Unified IP Phones, Cisco Unified Communications Manager, and Firmware Release Compatibility**

Cisco Unified IP Phone	Protocol	Cisco Unified Communications Manager
Cisco Unified IP Phones 7945G, 7965G, and 7975G	SCCP	Cisco Unified Communications Manager Release 6.x and later Cisco Unified CallManager Release 5.1, 4.3(2)
Cisco Unified IP Phones 7945G, 7965G, and 7975G	SIP	Cisco Unified Communications Manager Release 6.x and later Cisco Unified CallManager Release 5.1
Cisco Unified IP Phone Expansion Module 7914	SCCP and SIP	Cisco CallManager Release 3.1(2c) or later
Cisco Unified IP Phone Expansion Module 7915	SCCP and SIP	Cisco Unified Communications Manager Release 6.1 and later
Cisco Unified IP Phone Expansion Module 7916	SCCP and SIP	Cisco Unified Communications Manager Release 6.1 and later



**Note** SIP Firmware Release 9.3(1) and later are designed and tested to interoperate with Cisco call control, most notably Cisco Unified Communications Manager Release 9.0(1). Although SIP firmware is IETF RFC 3261 compliant, it is not supported by Cisco TAC or Engineering for use with non-Cisco call control systems.

## Related Documentation

Use the following sections to obtain related information.

### Cisco Unified IP Phone 7900 Series Documentation

See the publications that are specific to your language, phone model, and Cisco Unified Communications Manager release. Navigate from the following documentation URL:

<https://www.cisco.com/c/en/us/support/collaboration-endpoints/unified-ip-phone-7900-series/tsd-products-support-general-information.html>

### Cisco Unified Communications Manager Documentation

See the *Cisco Unified Communications Manager Documentation Guide* and other publications that are specific to your Cisco Unified Communications Manager release. Navigate from the following documentation URL:

<https://www.cisco.com/c/en/us/support/unified-communications/unified-communications-manager-callmanager/tsd-products-support-series-home.html>

### Cisco Business Edition 5000 Documentation

See the *Cisco Business Edition 5000 Documentation Guide* and other publications that are specific to your Cisco Business Edition 5000 release. Navigate from the following URL:

<https://www.cisco.com/c/en/us/support/unified-communications/business-edition-5000/tsd-products-support-series-home.html>

## New and Changed Features

This release contains no new or changed features.

## Installation

### Installation Requirements

Before you install the firmware release, you must ensure that your Cisco Unified Communications Manager is running the latest device pack. After you install a device pack on the Cisco Unified Communications Manager servers in the cluster, you need to reboot all the servers.



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**Note**

If your Cisco Unified Communications Manager does not have the required device pack to support this firmware release, the firmware may not work correctly.

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For information on the Cisco Unified Communications Manager Device Packs, see [http://www.cisco.com/c/en/us/td/docs/voice\\_ip\\_comm/cucm/compat/devpack\\_comp\\_mtx.html](http://www.cisco.com/c/en/us/td/docs/voice_ip_comm/cucm/compat/devpack_comp_mtx.html).

### SCCP Firmware Upgrade Issues

This section applies to the Cisco Unified IP Phones 7975G, 7971G-GE, 7970G, 7965G, 7962G, 7961G-GE, 7961G, 7945G, 7942G, 7941G-GE, 7941G, 7911G, and 7906G.



**Note** For all SCCP firmware upgrades from firmware release versions earlier than 8.3(3) to Version 9.3(1) or later, you must first upgrade your phone firmware to an intermediate version (8.3(3) to 8.5(2)) and then upgrade to 9.3(1).

The following upgrade issues apply:

- If you are currently running firmware earlier than 6.0(2) on a Cisco Unified IP Phone and want to upgrade to 8.x(x), you must first install an intervening 7.0(x) load to prevent upgrade failure. Cisco recommends using the most recent 7.0(3) load as the intervening load to avoid lengthy upgrade times.
- If you are currently running firmware 6.0(2) to 7.0(2) on a Cisco Unified IP Phone and want to upgrade to 8.x(x), you can do so directly. However, expect the upgrade to take twice as long as usual.

## SIP Firmware Upgrade Issues

For all SIP firmware upgrades from firmware release versions earlier than 8.3(3) to Version 9.3(1) or later, you must first upgrade your phone firmware to an intermediate version (8.3(3) to 8.5(2)) and then upgrade to 9.3(1).

The following upgrade issues apply:

- If you are currently running firmware 6.0(2) to 7.0(2) on a Cisco Unified IP Phone and want to upgrade to 8.x(x), be aware that upgrading will take up to twice as long to complete as usual.
- Device packs are required to enable IP Phones in the Cisco Unified Communications Manager database. For Cisco Unified CallManager 4.2 and earlier, these device packs are required. For Cisco Unified CallManager 4.3 and Cisco Unified Communications Manager 6.0 and later, you must run the device pack and reboot the Cisco Unified Communications Manager server.

## Install the Firmware Release on Cisco Unified Communications Manager

Before using the Cisco Unified IP Phone 7900 Firmware Release 9.4(2)SR4 with Cisco Unified Communications Manager, you must install the latest firmware on all Cisco Unified Communications Manager servers in the cluster.

### Procedure

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- Step 1** Go to the following URL:  
<http://www.cisco.com/cisco/software/navigator.html?mdfid=268437892&flowid=5293>
- Step 2** Choose **Cisco Unified IP Phones 7900 Series**.
- Step 3** Choose your phone type.
- Step 4** Choose one of the following firmware types:
- **Skinny Client Control Protocol (SCCP) Software**
  - **Session Initiation Protocol (SIP) Software**
- Step 5** In the Latest Releases folder, choose **9.4(2)SR4**.

**Step 6** Select one of the following firmware files, click the **Download Now** or **Add to cart** button, and follow the prompts:

- For Cisco Unified CallManager 4.2 and earlier (firmware files only):
  - cmterm-7945\_7965-sccp.9-4-2SR4.zip
  - cmterm-7975-sccp.9-4-2SR4.zip
- For Cisco Unified CallManager 5.0(4) and later:
  - cmterm-7945\_7965-sccp.9-4-2SR4.k3.cop.sgn
  - cmterm-7975-sccp.9-4-2SR4.k3.cop.sgn
- For Cisco Unified CallManager 5.0 and later (firmware files only):
  - cmterm-7945\_7965-sip.9-4-2SR4.zip
  - cmterm-7975-sip.9-4-2SR4.zip
- For Cisco Unified CallManager 5.0(4) and later:
  - cmterm-7945\_7965-sip.9-4-2SR4.k3.cop.sgn
  - cmterm-7975-sip.9-4-2SR4.k3.cop.sgn

**Note** If you added the firmware file to the cart, click the **Download Cart** link when you are ready to download the file.

**Step 7** Click the + next to the firmware file name in the Download Cart section to access additional information about this file. The hyperlink for the readme file is in the Additional Information section.

**Step 8** Follow the instructions in the readme file to install the firmware.

## Cisco Unified IP Phone Expansion Module Firmware Installation

The following sections describe the Cisco Unified IP Phone Expansion Module firmware installation.

### Cisco Unified IP Phone Expansion Module 7914 Installation

This section describes how to install Cisco Unified IP Phone Expansion Module 7914.

#### *Cisco Unified IP Phone Expansion Module 7914 Firmware Upgrade Issues*

The Cisco Unified IP Phones 7906G, 7911G, 7941G, 7941G-GE, 7942G, and 7945G, do not support the Cisco Unified IP Phone Expansion Module 7914.

You can add a maximum of two Expansion Modules to the Cisco Unified IP Phones 7961G, 7961G-GE, 7965G, 7970G, 7971G, and 7975G.

The filename for Cisco Unified IP Phone Expansion Module 7914 indicates that it is for use with SCCP; however, it supports both SCCP and SIP. This applies to IP Phones using Cisco Unified Communications Manager 7.0.

If you are using the Cisco Unified IP Phone Expansion Module 7914, you must upgrade the expansion module to firmware release S00105000400 before using the phone to support relevant features on your expansion module.

### *Install Cisco Unified IP Phone Expansion Module 7914 Firmware*

To download and install the firmware, perform these steps:

#### **Procedure**

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- Step 1** Go to the following URL:  
<http://www.cisco.com/cisco/software/navigator.html?mdfid=269065653&i=rm>
- Step 2** Log in to the **Tools and Resources Download** page.
- Step 3** Choose the IP Telephony folder by clicking +.
- Step 4** Choose **IP Phones > Cisco Unified IP Phones 7900 Series**.
- Step 5** Choose **Cisco Unified IP Phone Expansion Module 7914**.
- Step 6** Choose **Skiny Client Control Protocol (SCCP) Software**.
- Step 7** Choose **5.0(4)** under the Latest Releases folder.
- Step 8** To download the firmware for Cisco Unified IP Phone Expansion Module 7914, click the **Download Now** or **Add to cart** button and follow the prompts:
- For Cisco Unified Communications Manager 4.3 and earlier:  
 cmterm-7914-sccp.5-0-4.exe
  - For Cisco Unified Communications Manager 5.0(1), 5.0(2), and 5.0(3):  
 cmterm-7914-sccp.5-0-4.cop
  - For Cisco Unified Communications Manager 5.0(4) and later:  
 cmterm-7914-sccp.5-0-4.cop.sgn
- Step 9** If you added the firmware file to the cart, click the **Download Cart** link when you are ready to download the file.
- Step 10** Click the + next to the firmware file name in the Download Cart section to access additional information about this file. The hyperlink for the readme file is in the Additional Information section, which contains installation instructions for the corresponding firmware:  
 cmterm-7914-sccp.5-0-4.readme.html
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### **Cisco Unified IP Phone Expansion Modules 7915 and 7916 Installation**

This section describes how to install Cisco Unified IP Phone Expansion Modules 7915 and 7916.

#### *Cisco Unified IP Phone Expansion Modules 7915 and 7916 Firmware Issues*

Before you use the Cisco Unified IP Phone Expansion Module 7916, you must load the expansion module with firmware release B016-1-0-4-2 before using the phone to support relevant features on your expansion module.

Before you use the Cisco Unified IP Phone Expansion Module 7915, you must load the expansion module with firmware release B015-1-0-4-2 before using the phone to support relevant features on your expansion module.

The Cisco Unified IP Phones 7962G, 7965G, and 7975G support the Cisco Unified IP Phone Expansion Modules 7915 and 7916. You can add a maximum of two expansion modules to these phones.

### *Install Cisco Unified IP Phone Expansion Modules 7915 and 7916 Firmware*

To download and install the firmware, perform these steps:

#### **Procedure**

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- Step 1** Choose **Cisco Unified IP Expansion Module 7916** or **Cisco Unified IP Expansion Module 7915**.
- Step 2** Choose the IP Telephony folder by clicking +.
- Step 3** Choose **IP Phones > Cisco Unified IP Phones 7900 Series**.
- Step 4** Choose **Cisco Unified IP Expansion Module 7916** or **Cisco Unified IP Expansion Module 7915**.
- Step 5** Choose **1.0(4)** under the Latest Releases folder.
- Step 6** To download the SIP firmware for the Cisco Unified IP Phone, click the **Download Now** or **Add to cart** button and follow the prompts:

For Cisco Unified CallManager 4.3 and 4.2 (SCCP firmware files only):

- cmterm-7915.1-0-4.zip
- cmterm-7916.1-0-4.zip

For Cisco Unified Communications Manager 5.1 and later:

- cmterm-7915.1-0-4.cop.sgn
- cmterm-7916.1-0-4.cop.sgn

For Cisco Unified CallManager 4.3 and 4.2 (SCCP only):

- cmterm-7915.1-0-4.exe
- cmterm-7916.1-0-4.exe

- Step 7** If you added the firmware file to the cart, click the **Download Cart** link when you are ready to download the file.
- Step 8** Click the + next to the firmware file name in the Download Cart section to access additional information about this file. The hyperlink for the readme file is in the Additional Information section, which contains installation instructions for the corresponding firmware:

cmterm-7915\_7916.1-0-4-readme.html

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## Limitations and Restrictions

### Phone Behavior During Times of Network Congestion

Anything that degrades network performance can affect phone audio and, in some cases, can cause a call to drop. Sources of network degradation can include, but are not limited to, the following activities:

- Administrative tasks, such as an internal port scan or security scan
- Attacks that occur on your network, such as a Denial of Service attack

### On-Hook Transfer Limitation in SIP Phones

When the Cisco Unified Communications Manager **Transfer On-Hook Enabled** field is enabled, users might report a problem with direct call transfer in SIP phones. If the user transfers the call and immediately goes on hook before they hear the ring signal, the call may drop instead of being transferred.

The user needs to hear the ring signal so that they can be sure that the call is being routed.

### Language Limitation

There is no localized Keyboard Alphanumeric Text Entry (KATE) support for the following Asian locales:

- Chinese (China)
- Chinese (Hong Kong)
- Chinese (Taiwan)
- Japanese (Japan)
- Korean (Korea Republic)

The default English (United States) KATE is presented to the user instead.

For example, the phone screen will show text in Korean, but the **2** key on the keypad will display **a b c 2**  
**A B C**.

### Font Limitation

#### Scenario

The user is set up for the English language displayed on their phone. But the corporate directory has content in a language with another character set (for example, Russian). When the user displays the corporate directory, the contents display as rectangles.

#### Result

The user sees characters as rectangles because the font is not available on the phone. Fonts are only available when the language locale is installed and active on the phone.

#### Workaround

The user needs to use the appropriate language on their phone.

## Caveats

### Access Cisco Bug Search

Known problems (bugs) are graded according to severity level. These release notes contain descriptions of the following:

- All severity level 1 or 2 bugs
- Significant severity level 3 bugs

You can search for problems by using Cisco Bug Search.

#### Before you begin

To access Cisco Bug Search, you need the following items:

- Internet connection
- Web browser
- Cisco.com user ID and password

#### Procedure

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- Step 1** To access Cisco Bug Search, go to:  
<https://tools.cisco.com/bugsearch>
- Step 2** Log in with your Cisco.com user ID and password.
- Step 3** To look for information about a specific problem, enter the bug ID number in the Search for field, then press **Enter**.
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### Open Caveats

The following list contains severity 1, 2, and 3 defects that are open for the Cisco IP Phone 7900 Series for Firmware Release 9.4(2)SR4.

For more information about an individual defect, access the Bug Search toolkit and search for the defect using the Identifier. You must be a registered Cisco.com user to access this online information.

Because defect status continually changes, the list reflects a snapshot of the defects that were open at the time this report was compiled. For an updated view of open defects, access Bug Toolkit as described in [Access Cisco Bug Search, on page 8](#).

- CSCtk56477 FR23:When pull out the net,use a https connection, wait no time out.
- CSCtr31587 TFTP error on the phone status, when testing with 200k endpoints.
- CSCtr70351 Device occasionally hard reset due to segmentation error
- CSCtu36302 Customized ring tones are not ringing for 79XX series Phones.
- CSCty85123 wrong behavior of "<<" in edit dial state.



- CSCtz26688 Call does not disconnect after getting reorder - SIP Phone
- CSCtz26712 One way audio issue with ilbc codec - CP-7911 phone
- CSCua06647 ETSGJ-CH: 7961 IP Phone restarted unexpectedly while debugging thru SSH
- CSCua11280 PD always display login UI when you logout successfully
- CSCue13562 7965 one way audio using Any connect IOS VPN
- CSCus19315 Tone zipzip not received for 7900 phones
- CSCui95229 894X/79XX phones advertise URI support in CURT incorrectly.
- CSCus21407 Phone not able to receive the iDiverted call
- CSCut48350 Ability to enable/disable SPAN to PC port locally on the phone

## Resolved Caveats

The following list contains severity 1, 2, and 3 defects that are resolved for the Cisco IP Phone 7900 Series for Firmware Release 9.4(2)SR4.

For more information about an individual defect, access the Bug Search toolkit and search for the defect using the Identifier. You must be a registered Cisco.com user to access this online information.

Because defect status continually changes, the list reflects a snapshot of the defects that were resolved at the time this report was compiled. For an updated view of resolved defects, access Bug Toolkit as described in [Access Cisco Bug Search, on page 8](#).

- CSCvc09780 79XX phones are not renewing DHCP request, if the lease time its modified
- CSCvd30515 Phone goes into Robotic voice state with wrong signalling message from cucm
- CSCve02602 79XX 802.1x authentication with LSC fails if earlier session failed with MIC certificate
- CSCve35724 Softkeys disappear on 7965 phones with shared lines and Privacy set to Off/False.
- CSCve45144 7900 SIP phone sends incorrect media (m) value for Re-Invite after "488 Not Acceptable Here".
- CSCvg54953 SCCP Phone freezes after call transfer
- CSCvg85267 CP-7965 phone does not send own certificate for 802.1x EAP-TLS auth
- CSCvh05590 CP-7965 802.1x EAP-TLS auth issues when LSC is big
- CSCvi53474 Search for +E.164 numbers from Corporate Directory is not possible
- CSCvj73657 Cisco Unified IP Phone 7900 Series XSS Vulnerability

## Cisco Unified Communication Manager Public Keys

To improve software integrity protection, new public keys are used to sign cop files for Cisco Unified Communications Manager Release 10.0.1 and later. These cop files have "k3" in their name. To install a k3 cop file on a pre-10.0.1 Cisco Unified Communications Manager, consult the README for the `cisco.com.version3-keys.cop.sgn` to determine if this additional cop file must first be installed on your specific Cisco Unified Communications Manager version. If these keys are not present and are required, you will see the error "The selected file is not valid" when you try to install the software package.

## Unified Communications Manager Endpoints Locale Installer

By default, Cisco IP Phones are set up for the English (United States) locale. To use the Cisco IP Phones in other locales, you must install the locale-specific version of the Unified Communications Manager Endpoints Locale Installer on every Cisco Unified Communications Manager server in the cluster. The Locale Installer installs the latest translated text for the phone user interface and country-specific phone tones on your system so that they are available for the Cisco IP Phones.

To access the Locale Installer required for a release, access <https://software.cisco.com/download/navigator.html?mdfid=286037605&flowid=46245>, navigate to your phone model, and select the Unified Communications Manager Endpoints Locale Installer link.

For more information, see the documentation for your particular Cisco Unified Communications Manager release.




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**Note** The latest Locale Installer may not be immediately available; continue to check the website for updates.

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## Cisco IP Phone Documentation Updates on Cisco Unified Communications Manager

The Cisco Unified Communications Manager Self Care Portal (Release 10.0 and later) and User Options web pages (Release 9.1 and earlier) provide links to the IP Phone user guides in PDF format. These user guides are stored on the Cisco Unified Communications Manager and are up to date when the Cisco Unified Communications Manager release is first made available to customers.

After a Cisco Unified Communications Manager release, subsequent updates to the user guides appear only on the Cisco website. The phone firmware release notes contain the applicable documentation URLs. In the web pages, updated documents display “Updated” beside the document link.




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**Note** The Cisco Unified Communications Manager Device Packages and the Unified Communications Manager Endpoints Locale Installer do not update the English user guides on the Cisco Unified Communications Manager.

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You and your users should check the Cisco website for updated user guides and download the PDF files. You can also make the files available to your users on your company website.




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**Tip** You may want to bookmark the web pages for the phone models that are deployed in your company and send these URLs to your users.

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## Cisco IP Phone Firmware Support Policy

For information on the support policy for phones, see <https://cisco.com/go/phonefirmwaresupport>.

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- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

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