Release Notes for Cisco SIP IP Phone 7940/7960 Release 4.0

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Contents

This document lists the known problems in the Cisco Session Initiation Protocol (SIP) IP Phone 7940/7960 Release 4.0 and contains information about the Cisco SIP IP Phone 7940/7960 (hereafter referred to as the Cisco SIP IP phone) that was not included in the most recent release of the phone documentation.

This document includes the following sections:

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New and Changed Information

New Software Features in Release 4.0

ISO 8859-1 Latin1 Character Support

The Cisco SIP IP Phone supports the ISO 8859-1 Latin1 character set, which covers most of Western Europe, the entire American continent, Australia, and much of Africa.

Supported Languages

Languages supported as part of the ISO 8859-1 Latin1 character set include French (fr), Spanish (es), Catalan (ca), Basque (eu), Portuguese (pt), Italian (it), Albanian (sq), Rhaeto-Romanic (rm), Dutch (nl), German (de), Danish (da), Swedish (sv), Norwegian (no), Finnish (fi), Faroese (fo), Icelandic (is), Irish (ga), Scottish (gd), English (en), Afrikaans (af), and Swahili (sw).

The lack of the ligatures (Dutch IJ, French OE, and, German`` quotation marks) is considered tolerable.

Unsupported Languages

The most notable unsupported languages are Zulu (zu) and other Bantu languages that use Latin Extended-B letters. Also not supported are Arabic in North Africa and Guarani (gn), which are missing GEIUY with tilde (~).

SIP Support

The phone can support the ISO 8859-1 Latin1 characters. However, the XML cards, information text, and menus are all in English. These items are built into the phone image and cannot be changed.

The customer can use the ISO 8859-1 Latin1 characters in the following three areas:

- **Caller id information**—When a SIP message is received with ISO 8859-1 Latin1 characters in the caller ID strings, those caller ID strings are displayed on the LCD screen of the phone with the correct ISO 8859-1 Latin1 characters.
- **Services menu applications written in CMXML**—The customer can develop language-specific applications for a particular region. For example, the customer can write an application that displays the current weather in Sweden using Swedish language characters. The Swedish characters would be displayed on the phone. If the customer were to develop the same application for a Spanish town, the application could easily be translated into Spanish.
- **Line key labels**—The line keys can also be configured to have the Latin1 characters in them. Simply specify the name in the configuration file, and it is displayed correctly. The Latin1 characters cannot be used in the lineX_name parameter, but can be used in the lineX_shortname and lineX_displayname parameters. If a proxy supports Latin1 characters in the To/From headers, they can be used in the lineX_name parameter as well.

HTTP Proxy Support

This feature allows requests for Call Manager eXtensible Markup Language (XML) services to be routed through an HTTP proxy.

ARP Changes

Changes to the application allow the Cisco SIP IP phone to receive broadcast Address Resolution Protocol (ARP) updates. Previously, this was unavailable. When a hot standby proxy system is used, the phone can receive unsolicited updates from the backup proxy, such as when the backup proxy tells all devices to use its IP address when the primary proxy fails. Previously, the phone would ignore such messages and continue to use the MAC address for the primary proxy.

DNS/TFTP Server in Configuration Files

This feature allows the service provider to specify a DNS server and/or a TFTP server in the configuration files (either the default configuration file or the <mac-addr> configuration file). The phone will go to the default TFTP server to get the default and mac-addr configuration files. Then it will parse them completely. When it is done, it will look to see if a new DNS server or TFTP server was specified in those files. If a new DNS server was specified, it will be used for any further DNS requests. If a TFTP server was specified, the phone will rerequest the default and mac-addr configuration files from the new TFTP server.

i Button Support

Currently, the *i* button serves no purpose as a help menu on the SIP versions of the Cisco SIP IP phone. Support has been added to enable the *i* button to display a descriptor of the key pressed in a direct sequence after pressing the *i* button.

Example: <i> then <up/down toggle> displays the following screen:

“I - Information - To scroll up on the LCD press the scroll up button. A small arrow displays when there is text for you to scroll through.”

Remote Party ID Header

The Remote Party ID header supports network verification and screening of a call participant's identity (name, number) as well as provide a call participant’s privacy. Details are contained in the privacy draft draft-ietf-sip-privacy-04.txt. The ability to use this new header is controlled with the configuration parameter remote_party_id.

Multiple 18x Responses

This feature introduces support for multiple 18x responses, which enables Find-Me/Follow-Me/Forwarding services.

Multiple Contact Headers in 3xx Responses

When multiple contacts are provided in a 3xx response, the phone previously ignored all but the first entry. The ability to walk a list of contacts has been added. The phone will attempt to use the information provided in each contact.

XML Support

Support for eXtensible Markup Language (XML) has been added in Cisco IP Phone 7940/7960 Release 4.0 as described in the following sections. For more information, refer to the "Product Overview" section of *Cisco SIP IP Phone 7940/7960 Administrator Guide, Version 4.0*.

BTXML Support

Basic Telephony eXtensible Markup Language (BTXML) is supported on the Cisco SIP IP phone. BTXML defines XML elements for controlling the user interface of an IP telephone. BTXML describes what information is displayed on the screen and how the user provides input using soft keys and hard keys.

Cisco CallManager XML Support

The Cisco SIP IP phone supports customer-written Cisco CallManager XML cards that can be accessed using buttons or soft keys on the phone. These cards can provide data such as stock quotes, calendars, and directory lookups.

Installation Notes

For Cisco SIP IP phones, follow the instructions in the "Upgrading the Cisco SIP IP Phone Firmware" section at the following URL:

http://www.cisco.com/univercd/cc/td/doc/product/voice/c_ipphon/sip7960/sadmin31/sipmntn.htm

For these instructions, use P0S3-04-0-00 as the image name for Release 4.0.

Caveats

Open Caveats—Release 4.0

This section documents possible unexpected behavior by Cisco IP Phone 7940/7960 Release 4.0 and describes only severity 1 and 2 caveats and select severity 3 caveats.

- **CSCdu68091**: No support for configurable action tag in REGISTER Contact.

  Applies to: SIP.

  Problem Description: When the phone sends a REGISTER message, it does not attach an action= tag to the Contact header. This can lead to mismatched registrations when another client registers with the same user ID because the 7960/7940 is always treated as action=none.

  Recommended Action: Configure the other client to have action=none to avoid mismatched registrations.

- **CSCdy25289**: 79x0 does not support UDP fragmentation

  Applies to: SIP.

  Problem Description: Phone does not support User Datagram Protocol (UDP) fragmentation. Packets get dropped.

Recommended Action: Make sure that any packets the phone receives are less than 1300 bytes in length.

- **CSCdy39019**: Headset w/ Cisco phone causes humming sound

  Applies to: SIP.

  Problem Description: When using a headset that is on the preferred headset list, the Cisco phone has a background noise. This is especially evident when calling to a PBX phone. When VAD is enabled the background noise is worse. The background noise is described as a humming sound.

  Recommended Action: None.

- **CSCdy39222**: Phone does not check RURI for call leg identification

  Applies to: SIP

  Problem Description: The phone does not check RURI for call leg identification.

  Recommended Action: Do not fork a SIP call to two separate lines of a single phone.

Resolved Caveats—Release 4.0

All the caveats listed in this section are resolved in Cisco IP Phone 7940/7960 Release 4.0. This section describes only severity 1 and 2 caveats and select severity 3 caveats.

- **CSCds35841**: When in overview mode, the Cisco SIP IP phone soft keys do not work.
- **CSCdv90788**: MWI/Ringer lamp lights briefly when answering call waiting call.
- **CSCdw40309**: Multiple hookflashes cause speaker pops.
- **CSCdu02920**: Address Resolution Protocol (ARP) cache does not update correctly.
- **CSCdx8913**: REFER retransmitted when 4xx,5xx,or 6xx received (not 405 or 501).

Related Documentation

- *Cisco SIP IP Phone 7940/7960 Administrator Guide Version 4.0*
- *Cisco IP Phone 7960 and 7940 Series at a Glance*
- *Regulatory Compliance and Safety Information for the Cisco IP Phone 7960, 7940, and 7910 Series*
- *Installing the Wall Mount Kit for the Cisco IP Phone*

Obtaining Documentation

These sections explain how to obtain documentation from Cisco Systems.

World Wide Web

You can access the most current Cisco documentation on the World Wide Web at this URL:

http://www.cisco.com

Translated documentation is available at this URL:

http://www.cisco.com/public/countries_languages.shtml

Documentation CD-ROM

Cisco documentation and additional literature are available in a Cisco Documentation CD-ROM package, which is shipped with your product. The Documentation CD-ROM is updated monthly and may be more current than printed documentation. The CD-ROM package is available as a single unit or through an annual subscription.

Ordering Documentation

You can order Cisco documentation in these ways:

- Registered Cisco.com users (Cisco direct customers) can order Cisco product documentation from the Networking Products MarketPlace:

  http://www.cisco.com/cgi-bin/order/order_root.pl

- Registered Cisco.com users can order the Documentation CD-ROM through the online Subscription Store:

  http://www.cisco.com/go/subscription

- Nonregistered Cisco.com users can order documentation through a local account representative by calling Cisco Systems Corporate Headquarters (California, U.S.A.) at 408 526-7208 or, elsewhere in North America, by calling 800 553-NETS (6387).

Documentation Feedback

You can submit comments electronically on Cisco.com. In the Cisco Documentation home page, click the **Fax** or **Email** option in the “Leave Feedback” section at the bottom of the page.

You can e-mail your comments to bug-doc@cisco.com.

You can submit your comments by mail by using the response card behind the front cover of your document or by writing to the following address:

Cisco Systems
Attn: Document Resource Connection
170 West Tasman Drive
San Jose, CA 95134-9883

We appreciate your comments.

Obtaining Technical Assistance

Cisco provides Cisco.com as a starting point for all technical assistance. Customers and partners can obtain online documentation, troubleshooting tips, and sample configurations from online tools by using the Cisco Technical Assistance Center (TAC) Web Site. Cisco.com registered users have complete access to the technical support resources on the Cisco TAC Web Site.

Cisco.com

Cisco.com is the foundation of a suite of interactive, networked services that provides immediate, open access to Cisco information, networking solutions, services, programs, and resources at any time, from anywhere in the world.

Cisco.com is a highly integrated Internet application and a powerful, easy-to-use tool that provides a broad range of features and services to help you with these tasks:

- Streamline business processes and improve productivity
- Resolve technical issues with online support
- Download and test software packages
- Order Cisco learning materials and merchandise
- Register for online skill assessment, training, and certification programs

If you want to obtain customized information and service, you can self-register on Cisco.com. To access Cisco.com, go to this URL:

http://www.cisco.com

Technical Assistance Center

The Cisco Technical Assistance Center (TAC) is available to all customers who need technical assistance with a Cisco product, technology, or solution. Two levels of support are available: the Cisco TAC Web Site and the Cisco TAC Escalation Center.

Cisco TAC inquiries are categorized according to the urgency of the issue:

- Priority level 4 (P4)—You need information or assistance concerning Cisco product capabilities, product installation, or basic product configuration.
- Priority level 3 (P3)—Your network performance is degraded. Network functionality is noticeably impaired, but most business operations continue.
- Priority level 2 (P2)—Your production network is severely degraded, affecting significant aspects of business operations. No workaround is available.
- Priority level 1 (P1)—Your production network is down, and a critical impact to business operations will occur if service is not restored quickly. No workaround is available.

The Cisco TAC resource that you choose is based on the priority of the problem and the conditions of service contracts, when applicable.

Cisco TAC Web Site

You can use the Cisco TAC Web Site to resolve P3 and P4 issues yourself, saving both cost and time. The site provides around-the-clock access to online tools, knowledge bases, and software. To access the Cisco TAC Web Site, go to this URL:

http://www.cisco.com/tac

All customers, partners, and resellers who have a valid Cisco service contract have complete access to the technical support resources on the Cisco TAC Web Site. The Cisco TAC Web Site requires a Cisco.com login ID and password. If you have a valid service contract but do not have a login ID or password, go to this URL to register:

http://www.cisco.com/register/

If you are a Cisco.com registered user, and you cannot resolve your technical issues by using the Cisco TAC Web Site, you can open a case online by using the TAC Case Open tool at this URL:

http://www.cisco.com/tac/caseopen

If you have Internet access, we recommend that you open P3 and P4 cases through the Cisco TAC Web Site.

Cisco TAC Escalation Center

The Cisco TAC Escalation Center addresses priority level 1 or priority level 2 issues. These classifications are assigned when severe network degradation significantly impacts business operations. When you contact the TAC Escalation Center with a P1 or P2 problem, a Cisco TAC engineer automatically opens a case.

To obtain a directory of toll-free Cisco TAC telephone numbers for your country, go to this URL:

http://www.cisco.com/warp/public/687/Directory/DirTAC.shtml

Before calling, please check with your network operations center to determine the level of Cisco support services to which your company is entitled: for example, SMARTnet, SMARTnet Onsite, or Network Supported Accounts (NSA). When you call the center, please have available your service agreement number and your product serial number.

This document is to be used in conjunction with the documents listed in the "Related Documentation" section on page 5.