Release Notes for Cisco Unity Connection Release 7.0(1)

Revised April 2, 2012

These release notes contain information on new and changed support, new and changed functionality, limitations and restrictions, open caveats, and documentation updates for Cisco Unity Connection Release 7.0(1) and for Connection in Cisco Unified Communications Manager Business Edition (CMBE) Release 7.0(1).

Note Cisco Unity Connection is a Linux-based solution. It is available in two configurations—Connection, and Connection in Cisco Unified Communications Manager Business Edition. These release notes contain information for both configurations.

Note Items in release notes may be added, or revised to correct or clarify information after the initial publication date (the date the software was released). When an item has been changed, the phrase "Added <date>" or "Revised <date>" is included in the text of an item.

Contents

- System Requirements, page 2
- Related Documentation, page 3
- New and Changed Requirements and Support—Release 7.0(1), page 4
- New Functionality—Release 7.0(1), page 13
- Changed Functionality—Release 7.0(1), page 30
- Installation and Upgrade Information, page 36
- Important Notes, page 40
- Limitations and Restrictions, page 40
- Caveats, page 41

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- Documentation Updates, page 44
- Obtaining Documentation and Submitting a Service Request, page 56
- Cisco Product Security Overview, page 56

System Requirements

For Cisco Unity Connection

System Requirements for Cisco Unity Connection Release 7.x contains the most current Connection requirements. The document is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucsysreqs.html.

For Cisco Unity Connection in Cisco Unified CMBE

System Requirements for Cisco Unity Connection in Cisco Unified CMBE Release 7.x contains the most current Connection requirements. The document is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucmbesysreqs.html .

Compatibility Information

The following documents list the most current version combinations qualified for use with Cisco Unity Connection, and with Connection in Cisco Unified CMBE (where applicable):

- *Compatibility Matrix: Cisco Unity Connection and the Software on User Workstations*
- *SCCP Compatibility Matrix: Cisco Unity Connection, Cisco Unified Communications Manager, and Cisco Unified Communications Manager Express*
- *SIP Trunk Compatibility Matrix: Cisco Unity Connection, Cisco Unified Communications Manager, and Cisco Unified Communications Manager Express*

The documents are available on Cisco.com at http://www.cisco.com/en/US/products/ps6509/products_device_support_tables_list.html.

Determining the Software Version

This section contains procedures for determining the version in use for the following software:

- Cisco Unity Connection, page 3
- Cisco Personal Communications Assistant, page 3

Cisco Unity Connection

To Determine the Cisco Unity Connection Version by Using Cisco Unity Connection Administration

Step 1 In Cisco Unity Connection Administration, in the upper-right corner below the Navigation list, click **About**.

The Connection version is displayed below "Cisco Unity Connection Administration."

To Determine the Cisco Unity Connection Version by Using the Command-Line Interface

Step 1 Start a command-line interface (CLI) session. For more information, see the Cisco Unified Communications Operating System Administration Help.

Step 2 Run the **show cuc version** command.

Cisco Personal Communications Assistant

To Determine the Cisco Personal Communications Assistant (PCA) Version

Step 1 Log on to the Cisco PCA.

Step 2 On the Cisco PCA Home page, click **About** in the upper right corner. (The link is available on every web tool page.)

Step 3 The Cisco Unity Connection version is displayed. The Cisco PCA version is the same as the Connection version.

Related Documentation

For Cisco Unity Connection

For descriptions and URLs of Cisco Unity Connection documentation on Cisco.com, refer to the *Documentation Guide for Cisco Unity Connection Release 7.x*. The document is shipped with Connection and is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/roadmap/7xcucdg.html.

For Cisco Unified Communications Manager Business Edition

For descriptions and URLs of Cisco Unified Communications Manager Business Edition documentation on Cisco.com, refer to the *Cisco Unified Communications Manager Business Edition Documentation Guide*. The document is shipped with Cisco Unified CMBE and is available at http://www.cisco.com/en/US/products/ps7273/products_documentation_roadmaps_list.html.

Note The documentation links on Cisco.com for some Cisco Unity Connection in Cisco Unified CMBE 7.x versions go to documents that are labeled for Cisco Unity Connection Release 7.x. Despite the version label, all content in the following guides applies to both Connection configurations: *Administration Guide for Cisco Unity Connection Serviceability, Interface Reference Guide, System Administration Guide, Troubleshooting Guide, User Moves, Adds, and Changes Guide, User Workstation Setup Guide*, and the *Cisco Unity Connection Voice Commands* wallet card.

New and Changed Requirements and Support—Release 7.0(1)

This section contains information about new and changed requirements and support in the 7.0(1) release time frame only. Refer to the release notes of the applicable version for information on new and changed support with earlier versions of Cisco Unity Connection.

Release notes for all versions of Cisco Unity Connection are available at http://www.cisco.com/en/US/products/ps6509/prod_release_notes_list.html.

Release notes for all versions of Cisco Unified Communications Manager Business Edition are available at http://www.cisco.com/en/US/products/ps7273/prod_release_notes_list.html.

Additional Languages for Cisco Unity Connection Components

There are no new languages for this release.

For a complete list of languages, refer to the "Available Languages for Cisco Unity Connection Components" section of the applicable *System Requirements*:

- *System Requirements for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucsysreqs.html .
- *System Requirements for Cisco Unity Connection in Cisco Unified CMBE Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucmbesysreqs.html.

(For a list of numeric and alphabetic language codes, refer to the "Numeric and Alphabetic Codes for Supported Languages in Cisco Unity Connection" section of the 7.x *System Requirements.*)

Audio Codecs

In Cisco Unified Communications Manager integrations only, support for the following codecs has been added for calls:

- G.722
- iLBC

For information on the maximum number of voice messaging ports supported for each codec, refer to the *Cisco Unity Connection Supported Platforms List* at http://www.cisco.com/en/US/products/ps6509/products_data_sheets_list.html.

Calendar Integrations

Revised July 9, 2010

Support for the following calendar integrations has been added:

- Cisco Unified MeetingPlace 7.0—This integration allows users to join a meeting that is in progress, hear a list of participants for a meeting, send a message to the meeting organizer, send a message to the meeting participants, and set up an immediate meeting.
- Microsoft Exchange Server 2003—This integration allows users to hear a list of upcoming meetings, hear a list of participants for a meeting, send a message to the meeting organizer, send a message to the meeting participants, and accept or decline meeting invitations.

For information, refer to the "Creating Calendar Integrations" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Cisco Fax Server

Cisco Unity Connection supports an integration with Cisco Fax Server version 9.0 or later, which allows users to receive faxes that are sent to their fax extension, forward faxes that they receive to a fax machine for printing, and forward faxes that they receive to another user.

For information, refer to the "Creating a Cisco Fax Server Integration" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Cisco Unified Mobility Advantage

Cisco Unity Connection supports an integration with Cisco Unified Mobility Advantage 7.0 to allow mobile phones that access corporate telephony services to receive message notifications through an IMAP server.

For information, refer to the "Creating a Cisco Unified Mobility Advantage Integration" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Cisco Unity Connection ViewMail for Microsoft Outlook

Cisco Unity Connection supports Cisco Unity Connection ViewMail for Microsoft Outlook for use on user workstations with Outlook configured as an IMAP client. By using ViewMail to access Connection voice messages, users can play and record voice messages with the Media Master, which provides recording and playback controls in the message form.

For more information refer to the following documentation:

- *Release Notes for Cisco Unity Connection ViewMail for Microsoft Outlook Release 7.0(1)* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/vmo/release/notes/701cucvmorn.html.

- *User Guide for Accessing Cisco Unity Connection Voice Messages in an E-Mail Application (Release 7.x)* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/user/guide/email/7xcucugemailx.html.

Command-Line Interface Commands

The following command-line interface commands have been added:

- delete cuc futuredelivery
- run cuc vui rebuild
- show cuc cluster status
- show cuc sysagent task list
- utils cuc cluster activate
- utils cuc cluster deactivate
- utils cuc cluster makeprimary
- utils cuc cluster overwritedb
- utils cuc cluster renegotiate
- utils cuc create report
- utils cuc networking clear_replication
- utils cuc reset password

For more information, refer to the CLI Help.

Documentation

This section contains information on new and obsoleted product documentation with this release.

Cisco Unity Connection Integration Guides

For Cisco Unity Connection

- *QSIG-Enabled Phone System with Cisco ISR Voice Gateway Integration Guide for Cisco Unity Connection*

Connection integration guides are available at http://www.cisco.com/en/US/products/ps6509/products_installation_and_configuration_guides_list.html.

For Cisco Unity Connection in Cisco Unified Communications Manager Business Edition (CMBE)

The *Cisco Unified Communications Manager SCCP Integration Guide for Cisco Unity Connection in Cisco Unified CMBE* is available at http://www.cisco.com/en/US/products/ps7273/products_installation_and_configuration_guides_list.html.

Cluster Configuration and Administration Guide for Cisco Unity Connection

This new guide contains instructions for configuring and using a Cisco Unity Connection cluster, as well as information on how a Connection cluster works. The guide is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/cluster_administration/guide/7xcuccagx.html.

Note The Connection cluster feature is not supported for use with Cisco Unified Communications Manager Business Edition.

Interface Reference Guide for Cisco Unity Connection Administration

This new guide provides full definitions—including default values, and minimum and maximum values (where applicable)—for all fields in the Cisco Unity Connection Administration application. The material is arranged according to the graphical user interface (GUI) pages in the application, with chapters for each main area of the interface and sections for each page. The guide is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/gui_reference/guide/7xcucgrgx.html .

Reconfiguration and Upgrade Guide for Cisco Unity Connection

This new guide contains information and instructions for upgrading Cisco Unity Connection software, migrating to Connection, replacing Connection servers, changing a Connection cluster, and for renaming and changing the IP addresses of Connection servers. The guide is available at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/upgrade/guide/7xcucrugx.html.

Note Content in this guide does not apply to Connection in Cisco Unified CMBE.

Release Notes for Cisco Unity Connection ViewMail for Microsoft Outlook

This new document contains information on new and changed requirements and support, new and changed functionality, limitations and restrictions, installation and upgrade instructions, and open and resolved caveats for ViewMail. The release notes are available at http://www.cisco.com/en/US/products/ps6509/prod_release_notes_list.html.

Troubleshooting Guide for Cisco Unity Connection

Note This guide is expected to be published on Cisco.com by October 31, 2008.

This new guide contains information on specific problems, possible causes of problems, and procedures to resolve problems in Cisco Unity Connection and in Connection in Cisco Unified CMBE. When it has been published, the guide will be available at http://www.cisco.com/en/US/products/ps6509/prod_troubleshooting_guides_list.html.

User Guides

The *User Guide for Cisco Unity Connection* has been divided into five guides so that administrators can easily choose content relevant to subscribers based on the features and functionality enabled for them:

- *User Guide for Accessing Cisco Unity Connection Voice Messages in an E-Mail Application*
- *User Guide for the Cisco Unity Connection Assistant Web Tool*
- *User Guide for the Cisco Unity Connection Inbox Web Tool*
- *User Guide for the Cisco Unity Connection Personal Call Transfer Rules Web Tool*
- *User Guide for the Cisco Unity Connection Phone Interface*

Note that the default keys have been removed from procedures in the *User Guide for the Cisco Unity Connection Phone Interface*. Instead, steps tell subscribers to choose menu options based on the prompts they hear (for example: Step 2 From the Main menu, choose the options Setup Options > Personal Settings > Change Password). With this change, procedures are relevant for all subscribers, regardless of whether they are enabled for a custom conversation (created with the Custom Keypad Mapping tool), the default Connection conversation, or one of the optional premapped Connection conversations.

The "Cisco Unity Connection Phone Menus and Voice Commands" chapter of the *User Guide for the Cisco Unity Connection Phone Interface* contains the most frequently used menus, shortcuts, and voice commands for managing messages and personal preferences by phone for the default and premapped Connection conversations.

The user guides are available at http://www.cisco.com/en/US/products/ps6509/products_user_guide_list.html.

Support Documents Obsoleted

With this release, the following documents are no longer published:

- *Supported Hardware and Software, and Support Policies for Cisco Unity Connection*
- *Supported Hardware and Software, and Support Policies for Cisco Unity Connection in Cisco Unified CMBE*

Support information was moved into the following documents:

- *System Requirements for Cisco Unity Connection* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucsysreqs.html .
- *System Requirements for Cisco Unity Connection in Cisco Unified CMBE* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/requirements/7xcucmbesysreqs.html.

Integrating Connection User Data with an LDAP Directory

Cisco Unity Connection supports the option to integrate with an LDAP directory, including:

- Provisioning Connection users by importing user data from an LDAP directory.
- Automatically synchronizing Connection users with a corporate directory.
- Authenticating access to Connection web applications against an LDAP directory.

Connection currently supports integrations only with Active Directory.

For more information, refer to the following documentation:

- The "Integrating Connection with an LDAP Directory" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.
- The "Creating User Accounts from LDAP User Data" chapter of the *User Moves, Adds, and Changes Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/user_mac/guide/7xcucmacx.html.

Multiple Mailbox Stores

You can create up to four mailbox stores in addition to the default mailbox store that is created when Cisco Unity Connection is installed. For more information, refer to the "Managing Mailbox Stores" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Number of Phone System Integrations Limited Only by Licensed Ports

Cisco Unity Connection supports multiple simultaneous phone system integrations that are limited only by the number of licensed voice messaging ports.

For example, Connection can be integrated with the following phone systems at one time (a total of 28 phone system integrations):

- Seven circuit-switched phone systems through PIMG/TIMG units.
- Seven Cisco Unified CM phone systems through Skinny Call Control Protocol (SCCP).
- Seven QSIG-enabled phone systems through Cisco ISR voice gateways.
- Seven Cisco Unified CM phone systems through SIP trunk.

Per-Platform Limits

The method used to specify per-platform limits has changed and, to the extent that the new and old methods can be compared, the supported limits have been changed for Cisco Unity Connection version 7.0. We specify the following per-platform limits:

- Total number of users with voice mailboxes.
- Total available ports (voice ports, TTS ports, and voice user interface (VUI) ports, in any combination).
- Total number of simultaneous connections using the Cisco Unity Inbox web tool, Cisco Unity Connection ViewMail for Microsoft Outlook, IMAP clients, Cisco Unified Personal Communicator, Cisco Unified Mobile Communicator, Cisco Unified Messaging with IBM Lotus Sametime, and RSS readers.

Note Cisco Unified Personal Communicator, Cisco Unified Mobile Communicator, and Cisco Unified Messaging with IBM Lotus Sametime do not support IMAP Idle. As a result, each active instance of each of these clients that is accessing Connection voice messages counts as four simultaneous connections.

For individual platform limits, refer to the *Cisco Unity Connection Supported Platforms List* at http://www.cisco.com/en/US/products/ps6509/products_data_sheets_list.html.

Personal Call Transfer Rules Supported Only with Cisco Unified CM Phone Systems

The Cisco Unity Connection personal call transfer rules feature is supported only when Connection is integrated with supported versions of Cisco Unified Communications Manager phone systems. (Cisco Unified Communications Manager Express is not supported.)

Phone System Integrations

For Cisco Unity Connection

The following phone system integrations have been qualified with this release for use with Cisco Unity Connection:

- Any phone system that provides a serial data link (SMDI, MCI, or MD-110 protocol) to the master PIMG unit (serial integration through analog PIMG units).
- Any phone system that provides a serial data link (SMDI, MCI, or MD-110 protocol) to the master TIMG unit (serial integration through TIMG units).
- Avaya Definity G3 (in-band integration through TIMG units).
- Avaya S8500/S8700 (in-band integration through TIMG units).
- Cisco Unified Communications Manager 7.0
- Mitel SX-200 (integration through digital Mitel PIMG units).

For supported versions of Cisco Unified CM and Cisco Unified CM Express, refer to the applicable document, depending on the integration type:

- *SCCP Compatibility Matrix: Cisco Unity Connection, Cisco Unified Communications Manager, and Cisco Unified Communications Manager Express* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/compatibility/matrix/cucsccpmtx.html.
- *SIP Trunk Compatibility Matrix: Cisco Unity Connection, Cisco Unified Communications Manager, and Cisco Unified Communications Manager Express* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/compatibility/matrix/cucsiptrunkmtx.html.

For information on other supported phone system integrations, refer to the applicable Cisco Unity Connection integration guides at http://www.cisco.com/en/US/products/ps6509/products_installation_and_configuration_guides_list.html.

For Cisco Unity Connection in Cisco Unified CMBE

Cisco Unified Communications Manager 7.0 has been qualified for use with Cisco Unified CMBE. It is installed on the same platform with Cisco Unity Connection.

RealSpeak Version 4.5 for TTS

Cisco Unity Connection installs and uses RealSpeak version 4.5 for the text-to-speech (TTS) feature.

Selected Servers Require Replacement Hard Disks or Additional Memory for Some Configurations

If you are upgrading from an earlier version of Cisco Unity Connection and you want to reuse the current server, for some servers and some configurations you must replace hard disks or add memory. For example:

- Some servers require replacement hard disks if you are configuring a Connection cluster.
- Some servers require additional memory if voice recognition and Digital Networking are configured when the sum of contacts, users, distribution lists, locations, personal contacts, and personal distribution lists exceeds 2,000. (These are the first six items on the Tools > Grammar Statistics page in Cisco Unity Connection Administration.)

If you are upgrading an existing Connection server to version 7.0, refer to the *Cisco Unity Connection Supported Platforms List* at http://www.cisco.com/en/US/products/ps6509/products_data_sheets_list.html to determine whether your server requires replacement hard disks or additional memory.

For information on replacing the hard disks or adding the memory, refer to the applicable chapter in the *Reconfiguration and Upgrade Guide for Cisco Unity Connection* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/upgrade/guide/7xcucrugx.html.

SNMP Support

Simple Network Management Protocol (SNMP) is supported, which enables administrators to remotely manage network performance, find and solve network problems, and plan for network growth. SNMP-associated settings are available in Cisco Unified Serviceability Administration.

Software Qualified for Use on Cisco Unity Connection User Workstations

The following software has been qualified with this release for use on Cisco Unity Connection user workstations:

- Cisco Unified Personal Communicator version 7.0(1).
- Cisco Unity Connection ViewMail for Microsoft Outlook version 7.0(1). (With Outlook as an IMAP client on user workstations.)
- Eudora version 7.1 as an IMAP client.
- Firefox version 3.0 on all operating systems.
- Lotus Notes version 8.0 as an IMAP client.

- Opera version 9.2 as an IMAP client.
- Red Hat Linux Enterprise 5.0 operating system.
- Safari 3.x on Mac operating systems.
- Thunderbird 3.0 as an IMAP client.
- Windows Mail in Windows Vista as an IMAP client.

For the most current version combinations of software qualified for use on user workstations, refer to *Compatibility Matrix: Cisco Unity Connection and the Software on User Workstations* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/compatibility/matrix/cucclientmtx.html .

Software That Is No Longer Supported for Use on Cisco Unity Connection User Workstations

With this release, the following software is not supported for use on Connection user workstations:

- Eudora version 7.0 as an IMAP client.
- Microsoft Office XP as an IMAP client.
- Microsoft Outlook Express as an IMAP client when using Mac OS.
- Microsoft Windows 2000 operating system.
- Office Mac Entourage 2004 as an IMAP client.
- Opera version 9.0 as an IMAP client.

Support for Up to 288 Voice Messaging Ports

Depending on the system configuration and the platform overlay, Cisco Unity Connection can support up to a total of 288 voice messaging ports on a single server.

For details, refer to the Cisco Unity Connection Supported Platforms List at http://www.cisco.com/en/US/products/ps6509/products_data_sheets_list.html.

Support for Up to 25,000 Users in the Voice-Recognition Directory

Depending on the system configuration and the platform overlay, Cisco Unity Connection can support up to a total of 25,000 users in the voice-recognition directory.

Upgrade to Release 7.0 Requires Software DVDs

To upgrade from Cisco Unity Connection 2.x to version 7.0 or from Cisco Unified CMBE 6.x to 7.0, you must get DVDs from Cisco. For ordering information, go to the Cisco Ordering website at http://www.cisco.com/en/US/ordering/index.shtml.

Utility Updates on the Cisco Unity Tools Website

Updates to utilities on the Cisco Unity Tools website are frequently posted between Cisco Unity Connection releases. The updates commonly do not apply to a specific release, so we do not list the tools that have been updated since the last version of Connection. However, you can sign up to be notified when the utilities posted on the Cisco Unity Tools website are updated. Go to http://www.ciscounitytools.com, and click Sign Up Here.

You Cannot Upgrade from Connection 2.1(3) to 7.0(1) or 7.0(2)

Added February 19, 2009

A change that was made to Connection in version 2.1(3) prevents upgrades from version 2.1(3) to Connection 7.0(1) or 7.0(2). To upgrade from Connection 2.1(3), you will need to wait for Connection 7.1(2) to be released, in the second quarter of 2009.

New Functionality—Release 7.0(1)

This section contains information about new functionality in the 7.0(1) release time frame only. Refer to the release notes of the applicable version for information on new functionality in earlier versions of Cisco Unity Connection.

Release notes for all versions of Cisco Unity Connection are available at http://www.cisco.com/en/US/products/ps6509/prod_release_notes_list.html.

Release notes for all versions of Cisco Unified Communications Manager Business Edition are available at http://www.cisco.com/en/US/products/ps7273/prod_release_notes_list.html.

Note that the Cisco Unity Tools website may offer scripts and applications that were not included in Cisco Unity Connection 7.0(1). Some offerings may not be supported by Cisco TAC. Refer to http://www.ciscounitytools.com for information.

Cisco Unity Connection Cluster

Cisco Unity Connection can be configured as a cluster with two servers that are both active and answering calls. Both servers are “over-provisioned” so that one server can handle the load of both servers. If one server stops functioning, calls that would otherwise have been answered by the one server are answered by the other. Replication of the database and files occurs between the two servers.

Classic Conversation Added

The Classic conversation has been added to the list of alternate conversations that you can select for users to hear when they listen to and manage messages by phone. The keypad mapping of the Classic conversation is the same as the standard conversation in Cisco Unity Connection version 2.x.

If you are upgrading from version 2.x, users and user templates that were previously assigned to the standard conversation will be assigned to the Classic conversation.

See also the “Standard Conversation Keypad Mapping” section on page 33 for information on changes to the standard conversation in Connection version 7.x.

Contact Templates

Each system contact that you add in Cisco Unity Connection is based on a contact template. Settings from the template are applied to the contacts as the contacts are created. Connection includes one predefined contact template, which you can modify. You can also create new templates.

For more information refer to the "Managing Contacts" chapter of the *User Moves, Adds, and Changes Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/user_mac/guide/7xcucmacx.html.

Custom Keypad Mapping Tool

The Custom Keypad Mapping tool allows you to edit the key mappings associated with three custom conversations. You can assign any one-, two-, or three-key sequence to any defined option for the Main menu, the Message Playback menu (the message header, body and footer can be mapped separately), the After Message menu, and the Settings menu. No other menus in the Connection conversation can be customized. You can also change the options that are voiced in the customizable menus and the order in which those options are offered.

The three custom conversations have been added to the list of alternate conversations that you can select for users to hear when they listen to and manage their messages over the phone. You specify keypad mappings in the Custom Keypad Mapping tool; you assign conversations on the Phone Menu page for a user or user template in Cisco Unity Connection Administration.

The Custom Keypad Mapping tool is available in the Tools section of Connection Administration. (In Connection version 1.x the Custom Keypad Map tool was a separate application. In Connection version 2.x the tool was not available.)

For more information, refer to the "Custom Keypad Mapping Tool" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Note that although use of the phone keypad is supported throughout the voice-recognition conversation, those key mappings are not affected by any configuration in the Custom Keypad Mapping tool.

The following three sections describe functionality that was added to the Custom Keypad Mapping tool in this release.

More Options at the Main Menu

You can specify whether the following options are added to the Main menu:

- List Meetings
- User System Transfer
- Greetings Administrator
- Broadcast Message Administrator
- External Messages

Option to Customize Keys Used in Setup Options, Message Settings, and Personal Settings Menus

You can specify what users hear when they choose the Settings menu from the Main menu. This includes Greetings, Message Settings, Personal Settings, and Transfer Settings. (Note that users hear the option Change Setup Options for the Settings menu.)

You can specify what users hear when they choose the Personal Settings option from the Settings menu. This includes Password, Recorded Name, and Directory Listing.

You can specify what users hear when they choose the Message Settings option from the Settings menu. This includes Message Notification, Fax Delivery, Menu Style, Private Lists, and Addressing Priority List.

Option to Revert to Default Message Playback Speed

You can map a key that when pressed during message playback will revert the message playback speed to the user's default playback speed. The key would be used by users who have changed the playback speed and want to go back to their default speed while listening to a message.

Cisco Unity Connection Conversation Enhancements

New functionality in the Cisco Unity Connection conversation with this release is described in the following sections:

- Advanced Conversation Settings for Alternate Extensions, page 16
- Allowing Users to Access Connection by Phone Without Entering a Password, page 17
- Applying Accessibility Settings During Password Entry Conversation, page 17
- Changing Message Playback Speed, page 17
- Changing Message Playback Volume, page 17
- Classic Conversation Added, page 18
- Conversation Settings Added to the Cisco Unity Assistant, page 18
- Conversation Timeout Setting Added to Cisco Unity Connection Administration, page 18
- Disabling the "Record Your Message at the Tone" Prompt, page 19
- Disabling the "Wait While I Transfer Your Call" Prompt, page 19
- Enabling Callers to Transfer from a User Greeting to an Alternate Contact Number, page 19
- Including Receipts in Message Counts, page 19
- Jump to First or Last Message, page 20
- Live Reply to Unidentified Callers, page 20
- Prioritize Received Messages by Toggling the Urgent Flag, page 20
- Requesting Users Re-enter Only the Password after a Failed Password Entry, page 21
- Revert to Default Message Playback Volume, page 21
- Specifying Per User the Amount of Time to Skip Back or Ahead When Rewinding or Fast-Forwarding Messages, page 21
- Specifying Per User That Messages Are Marked Saved When Users Hang Up or Are Disconnected, page 21

- Specifying Per User That Connection Play New Messages Automatically, page 22
- Specifying Per User Whether Connection Asks Users to Confirm Deletions of New and Saved Messages, page 22
- Specifying Per User Whether Connection Prompts Users to Continue Addressing, page 22
- Specifying Per User Whether Users Confirm Recipients by Names, page 23
- Specifying Per User Whether Messages Are Sent Upon Hang-Up, page 23
- Voice-Recognition Conversation: Allowing Users to Say Their Voicemail Passwords, page 24
- Voice-Recognition Conversation: Saying Dates and Times, page 24
- Voice-Recognition Conversation: Message Addressing and Recording Enhancements, page 24
- Voice-Recognition Conversation: Users Can Temporarily Use Phone Keypad to Change Setup Options, Then Return to Voice-Recognition Mode, page 25
- Voice-Recognition Conversation: Speech Sensitivity, page 25
- Voice-Recognition Conversation: Voice Command Tutorial, page 25

Addressing Priority Lists

When a user attempts to address a message to a recipient by saying a name or spelling part of a name, Cisco Unity Connection may find multiple matching names. You can configure two mechanisms that direct Connection to prioritize certain recipients, sorting the results and offering the names with higher weights first in the search results. Both mechanisms—a user-configurable “buddy list” and an automatic weighting of names based on usage—contribute to a single addressing priority list for the user. A user may have one or both mechanisms enabled at the same time. If neither mechanism is enabled for a user, or if the matches do not appear in the addressing priority list, Connection sorts the matches by last name (for users) or display name (for distribution lists) and presents them in alphabetical order.

To enable users to access a setup conversation that allows them to review, add, or remove names in the addressing priority list, the users must be assigned to a custom conversation, and you must use the Custom Keypad Mapping tool to map the Addressing Priority List conversation to a key in the Message Settings menu for that conversation. You can enable automatic usage-based weighting of names on a per-user basis or on a user template by checking the Automatically Add Recipients to Addressing Priority List check box on the Send Message Settings page of the user profile or template, or for multiple users by using the Bulk Edit utility.

Advanced Conversation Settings for Alternate Extensions

There are several conversation settings that can be customized for alternate extensions. By default, each alternate extension uses the same settings configured for a user’s primary extension. Advanced settings for alternate extensions allow customization of conversation settings based on the phone numbers from which users call into their message boxes. For example, when users call from mobile phones they may want to use the voice-recognition input style and have Cisco Unity Connection skip asking for a password during logon. On the other hand, when they call from their work phones, they may want to use the keypad input style and require a password.

Advanced settings for alternate extensions are configured in Cisco Unity Connection Administration. Users can configure advanced settings for alternate extensions by using the Cisco Unity Assistant web tool if their class of service membership allows them to edit alternate extensions.

Allowing Users to Access Connection by Phone Without Entering a Password

By default, users are prompted for a password before they can log on to Cisco Unity Connection to check messages or to change personal settings. You can specify that Connection does not prompt users for a password when they access their mailboxes from their primary or alternate extensions.

You specify that users can skip entering a password when calling from a known extension on the applicable Edit User Basics page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

Note that there are security risks when using this feature. It is possible for a hacker to spoof the caller ID of a phone call. If the spoofed caller ID matches a primary or alternate extension that has this setting enabled, the hacker will have access to user mailboxes.

Applying Accessibility Settings During Password Entry Conversation

You can specify whether Cisco Unity Connection applies individual user accessibility settings during the password collection conversation when users call from known extensions (their primary or an alternate extension). When the Apply User Accessibility Settings for Voice Mail Password Entry Conversation setting on the System Settings > Advanced > Conversation page is enabled, the following accessibility settings are applied during the password collection conversation:

- Conversation Speed
- Conversation Volume
- Language
- Time to Wait for First Touchtone or Voice Command
- Time to Wait for Additional Key Presses When Entering Names, Extensions, and Passwords

When the setting is disabled, individual user accessibility settings are not applied until after the user is authenticated by entering the voicemail password.

Changing Message Playback Speed

You can specify the playback speed for messages that users listen to by phone by changing a setting on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can also adjust the message playback speed on the Message Playback Preferences page in the Cisco Unity Assistant web tool.

Note that the Conversation Speed setting on the Phone Menu page is a similar setting that has been reworded to clarify the difference between the two speed settings.

Changing Message Playback Volume

You can specify the playback volume for messages that users listen to by phone by changing a setting on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can also adjust the message playback volume on the Message Playback Preferences page in the Cisco Unity Assistant web tool.

Note that the Conversation Volume setting on the Phone Menu page is a similar setting that has been reworded to clarify the difference between the two volume settings.

Classic Conversation Added

See the "Classic Conversation Added" section on page 13.

Conversation Settings Added to the Cisco Unity Assistant

Many conversation settings have been added to the Cisco Unity Assistant web tool so that users can adjust their values.

On the Personal Options page, the following setting has been added:

- An advanced settings Edit button has been added to the user defined alternate extensions table. This represents new Cisco Unity Connection functionality. See also the "Advanced Conversation Settings for Alternate Extensions" section on page 16.

On the Phone Menu page, the following settings have been added:

- Fax Counts. This setting represents new Connection functionality. See also the "Cisco Fax Server" section on page 5.
- Receipt Counts. This setting represents new Connection functionality. See also the "Including Receipts in Message Counts" section on page 19.
- Confirm Recipient by Name. This setting represents new Connection functionality. See also the "Specifying Per User Whether Users Confirm Recipients by Names" section on page 23.
- Continue Adding Names After Each Recipient. This setting represents new Connection functionality. See also the "Specifying Per User Whether Connection Prompts Users to Continue Addressing" section on page 22.
- On Hangup. This setting represents new Connection functionality. See also the "Specifying Per User Whether Messages Are Sent Upon Hang-Up" section on page 23.

On the Message Playback Preferences page, the following settings have been added:

- Message Volume. This setting represents new Connection functionality. See also the "Changing Message Playback Volume" section on page 17.
- Message Speed. This setting represents new Connection functionality. See also the "Changing Message Playback Speed" section on page 17.
- On Hangup. This setting represents new Connection functionality. See also the "Specifying Per User That Messages Are Marked Saved When Users Hang Up or Are Disconnected" section on page 21.
- Confirm Deletions of New and Saved Messages. This setting represents new Connection functionality. See also the "Specifying Per User Whether Connection Asks Users to Confirm Deletions of New and Saved Messages" section on page 22.

Conversation Timeout Setting Added to Cisco Unity Connection Administration

By default, when users respond to a phone menu by pressing a key that represents the first digit of more than one possible key combination, Cisco Unity Connection waits 1,500 milliseconds (one and a half seconds) for additional key presses before acting. For example, in the After Message menu for the standard conversation, users can press 4 to reply to a message, 42 to reply to all, or 44 to call the user. Thus, when users press 4 after listening to a message, Connection waits 1.5 seconds before responding to give users a chance to press an additional key. If you prefer that Connection respond more quickly or more slowly in waiting for additional key presses, you can adjust the response timeouts.

You can adjust the response timeout setting by using the Wait For Additional Key Presses When Entering Multiple Digit Menu Options field on the applicable Phone Menu page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

Note that the Wait for Additional Key Presses When Entering Names, Extensions, and Passwords setting is a similar timeout setting that has been reworded to clarify the difference between the two timeout settings.

Disabling the "Record Your Message at the Tone" Prompt

By default, Cisco Unity Connection plays the "Record your message at the tone" prompt after playing a user or call handler greeting. Because some users include the same instruction in their greetings, callers can hear it twice. For this reason, you may want to specify that Connection does not play the prompt after some or all greetings when callers leave messages for particular users or call handlers in your organization.

You configure whether or not the prompt will be played on the Edit Greeting page for a specific user or call handler greeting.

Disabling the "Wait While I Transfer Your Call" Prompt

By default, Cisco Unity Connection plays the "Wait while I transfer your call" prompt when it transfers a call to an extension. Some callers do not like hearing the prompt, and for this reason, you may want to specify that Connection does not play it.

You configure whether or not the prompt will be played on the Edit Transfer Rule page for a specific user or call handler transfer rule.

Enabling Callers to Transfer from a User Greeting to an Alternate Contact Number

You can set Cisco Unity Connection so that callers can transfer to an alternate contact number by pressing a key during a greeting for a user or call handler. An alternate contact number can be the extension for an operator or for another user (such as a supervisor or coworker), or any other number where a user or another person can be reached. For each user or call handler, you can configure up to 12 alternate contact numbers (one for each key on the phone keypad).

You use Cisco Unity Connection Administration or the Bulk Edit utility to specify the keys that callers press to transfer. Users can specify alternate contact numbers by phone, or administrators can configure alternate contact numbers for users or call handlers by using Connection Administration.

Including Receipts in Message Counts

By default, Cisco Unity Connection does not include receipts when announcing the message count totals when users check new messages by phone. You can specify that Connection announces receipt counts on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can adjust the types of messages for which Connection announces count totals on the Phone Menu page in the Cisco Unity Assistant web tool.

Jump to First or Last Message

The standard conversation gives users the options of jumping to the first or last message in a message stack. The options are available in the new, saved, and deleted message stacks. Cisco Unity Connection plays the "First message" or "Last message" prompt as an audible cue to the user when the respective action is taken.

The functionality is available only to users who are assigned to the standard conversation or to one of the three Custom Keypad Mapping conversations.

If you want custom-conversation users to have this functionality, in the Custom Keypad Mapping tool, map a key sequence to the Jump to Start of Message Stack and the Jump to End of Message Stack options.

For information on the Custom Keypad Mapping tool, see the "Custom Keypad Mapping Tool" section on page 14.

For information on changes to the standard conversation, see the "Standard Conversation Keypad Mapping" section on page 33.

Live Reply to Unidentified Callers

When reviewing a message left by an outside caller, a user whose class of service allows live reply to unidentified callers can call the sender at the caller ID provided by the phone system. To initiate the live reply, Cisco Unity Connection checks the caller ID against the transfer restriction table of the user. If the number is allowed, Connection returns the call by performing a release transfer to the phone system; any formatting that must be done to generate a proper dial string from the caller ID must be performed by the phone system.

Users can live reply to a message by using the touchtone conversation or the voice-recognition conversation. Live reply to unidentified callers can be enabled or disabled independently from live reply to other users. Both features are disabled by default and can be enabled for a class of service in the Message Options section of the Edit Class of Service page in Cisco Unity Connection Administration.

Marking Messages for Future Delivery

After addressing and recording a message by using the touchtone conversation or the voice-recognition conversation, a user can mark the message for future delivery so that Cisco Unity Connection waits to send the message on the day and time that the user specifies. Once future delivery is set on the message, the user can cancel future delivery as long as the user has not yet chosen the option to send the message.

Prioritize Received Messages by Toggling the Urgent Flag

The standard conversation gives users the option of toggling the priority flag on a received message between urgent and normal. Users who want to identify the high-priority messages among all of their received messages may be interested in this functionality (By default, Cisco Unity Connection plays messages marked urgent first).

The functionality is available to users who are assigned to the standard conversation or to one of the three Custom Keypad Mapping conversations and to users assigned to the voice-recognition input style.

If you want custom-conversation users to have this functionality, in the Custom Keypad Mapping tool, map a key sequence to the Toggle Urgency Flag option.

For information on the Custom Keypad Mapping tool, see the "Custom Keypad Mapping Tool" section on page 14.

For information on changes to the standard conversation, see the "Standard Conversation Keypad Mapping" section on page 33.

Requesting Users Re-enter Only the Password after a Failed Password Entry

When users call Cisco Unity Connection from their extension or an alternate extension, Connection asks for only the password to authenticate the user. If a user enters an incorrect password, Connection asks for both the user ID and password on subsequent attempts to sign in.

If you want Connection to ask for only the user password on subsequent attempts to sign in, disable the Request Entry of User ID after Failed Password Entry from Known Extension setting on the System Settings > Advanced > Conversations page.

This setting applies only to calls from extensions associated with a user. It does not apply when users attempt to sign in manually from an unknown number.

Revert to Default Message Playback Volume

The standard conversation includes a key press combination that when pressed during message playback reverts the message playback volume to the user's default playback volume. The key would be used by users who have changed the playback volume and want to go back to their default volume while listening to a message.

The functionality is available to users who are assigned to the standard conversation or to one of the three Custom Keypad Mapping conversations.

If you want custom-conversation users to have this functionality, in the Custom Keypad Mapping tool, map a key sequence to the Reset Volume to Default option.For information on the Custom Keypad Mapping tool, see the "Custom Keypad Mapping Tool" section on page 14.

For information on changes to the standard conversation, see the "Standard Conversation Keypad Mapping" section on page 33.

Specifying Per User the Amount of Time to Skip Back or Ahead When Rewinding or Fast-Forwarding Messages

By default, as users are listening to messages, when they rewind or fast-forward a message, Cisco Unity Connection skips back or ahead in the message by 5 seconds. You can specify the amount of time Connection skips back or ahead in the message on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

Specifying Per User That Messages Are Marked Saved When Users Hang Up or Are Disconnected

You can specify that Cisco Unity Connection marks a message saved as soon as users listen to the body of a message by phone. (By default, when users listen to the body of a message, Connection retains the message as is—either as new or saved—unless users indicate otherwise before hanging up or being disconnected.)

You specify that Connection marks messages saved when users listen to message bodies on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can also configure the setting on the Message Playback Preferences page in the Cisco Unity Assistant web tool.

In earlier versions, you could adjust the Mark Messages Saved If User Hangs Up setting on the System Settings > Advanced > Conversation page to specify whether Connection asked all users associated with a Connection server to confirm the deletions of new and saved messages. If you are upgrading to Connection version 7.0, see the "Conversation Settings Removed from Advanced Settings Page" section on page 31.

Specifying Per User That Connection Play New Messages Automatically

By default, users hear the Main menu after they log on to Cisco Unity Connection. You can customize the conversation so that Connection plays new messages instead. With the feature enabled, users do not have to press a key or say a command to play new messages because Connection begins playing them automatically.

You specify that Connection plays new messages automatically on the applicable Phone Menu page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

Specifying Per User Whether Connection Asks Users to Confirm Deletions of New and Saved Messages

By default, when users delete new and saved messages by phone, Cisco Unity Connection does not ask users to confirm the deletion. Some users may prefer that Connection does not delete messages without asking for confirmation—especially those users who do not have access to deleted messages.

You specify that Connection asks users to confirm deletions of new and saved messages on the applicable Playback Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

In earlier versions, you could adjust the Confirm Deletion of New or Saved Messages setting on the System Settings > Advanced > Conversation page to specify whether Connection asked all users associated with a Connection server to confirm the deletions of new and saved messages. If you are upgrading to Connection version 7.0, see the "Conversation Settings Removed from Advanced Settings Page" section on page 31.

Specifying Per User Whether Connection Prompts Users to Continue Addressing

By default, when users address messages by phone, Cisco Unity Connection allows them to add a single recipient and then prompts them to indicate what they want to do next ("To add another recipient, press 1. For message options, press 3. To record, press #."). Users who send and forward messages to multiple recipients may find pressing 1 to continue addressing after each recipient tedious and time consuming.

Instead, you can specify that Connection allows users to continue adding names after each recipient, which streamlines the addressing process when users send and forward messages to multiple recipients. (Note that when users forward messages to single recipients, it requires one additional key press.)

You specify whether Connection prompts users to continue adding names after each recipient on the applicable Send Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can also adjust the setting themselves on the Phone Menu page in the Cisco Unity Assistant web tool.

In earlier versions, you could adjust the "Streamlined Addressing for Multiple Recipients" setting on the System Settings > Advanced > Conversation page to specify whether Connection prompted all users associated with a Connection server to continue adding names after each recipient. If you are upgrading to Connection version 7.0, see the "Conversation Settings Removed from Advanced Settings Page" section on page 31.

Specifying Per User Whether Users Confirm Recipients by Names

By default, when users send, forward, or reply to messages by phone, Cisco Unity Connection does not ask them to confirm each recipient—even when they use user extensions to address messages. For users who want Connection to confirm each recipient by name (regardless of how they added the recipient), you can specify that Connection plays the prompt "<User name> added" after each recipient.

You can specify whether Connection confirms recipients by name on the applicable Send Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration. Users can also adjust the setting themselves on the Phone Menu page in the Cisco Unity Assistant web tool.

In earlier versions, you could adjust the Add Dual Name Confirmation setting on the System Settings > Advanced > Conversation page to specify whether Connection asked all users associated with a Connection server to confirm recipients by name, and the Addressing Match Confirmation Mode setting to specify how Connection presented match results. If you are upgrading to Connection version 7.0, see the "Conversation Settings Removed from Advanced Settings Page" section on page 31.

Specifying Per User Whether Messages Are Sent Upon Hang-Up

You can change how Cisco Unity Connection behaves when calls are disconnected while users are in the process of sending, replying to, or forwarding a message. Calls can be intentionally or unintentionally disconnected when a user hangs up or a mobile phone loses its charge or signal. By default, Connection sends the message if the call is disconnected in the following circumstances:

- When a user is replying to or sending a message—As long as the message has at least one recipient and the recording is longer than the value entered in the Minimum Recording Duration in Milliseconds field on the System Settings > Advanced > Telephony page in Cisco Unity Connection Administration. This means that Connection sends the message even though the user may not have finished recording or addressing the message.
- When a user is forwarding a message—As long as the message has at least one recipient. This means that Connection sends the message even though the user may not have recorded an introduction or completely addressed the message.

You specify whether messages are sent upon hang-up on the applicable Send Message Settings page for a user template or an individual user, or by using the Bulk Edit utility in Connection Administration. Users can also adjust the setting themselves on the Phone Menu page in the Cisco Unity Assistant web tool. This setting does not apply to messages left by outside callers.

By adjusting the default value of the setting, you can alter Connection behavior so that Connection does not send messages unless users have pressed # to confirm that they are ready to send a message. Thus, if the call is disconnected before a user has a chance to do so, Connection deletes the message rather than sending it.

In earlier versions, you could adjust the Send Message If User Hangs Up During Recording setting on the System Settings > Advanced > Conversation page to specify whether messages are sent upon hang-up for all users associated with a Connection server. If you are upgrading to Connection version 7.0, see the "Conversation Settings Removed from Advanced Settings Page" section on page 31.

Text-to-Speech Presentation of Names When No Recorded Name Is Available

For users who do not have recorded names, Cisco Unity Connection uses text to speech to play user display names. This allows callers to find such users in directory handler searches and allows other users to hear more information about such users when addressing messages.

Voice-Recognition Conversation: Allowing Users to Say Their Voicemail Passwords

When the Allow Voice Recognition Users to Speak Their Voice Mail Passwords check box is checked on the System Settings > Advanced > Conversations page in Cisco Unity Connection Administration, voice-recognition users can say the digits in their voicemail passwords to log on when calling Connection from their primary or alternate extension. Connection attempts to match the spoken digits to the user voicemail password as an alternative to entering the digits at the keypad; it does not attempt to recognize the individual voice print of the user or otherwise apply biometrics to the login process.

In order to use the voicemail password feature, a user must be calling from the primary extension or an alternate extension, the extension must be configured to use the voice-recognition input style, and the language of the call must be set to English (United States) when the user reaches the Attempt Sign-in conversation.

Note Spoken digits are transmitted as unencrypted text by the Connection Voice Recognizer to be authenticated by Connection, and can appear as plain text in diagnostic log files.

If desired for security reasons, when this feature is enabled, users can continue to use the phone keypad to enter the password rather than saying the digits. However, users may not mix voice and phone keypad for password entry—if the user starts to use the keypad to enter the password, voice recognition is disabled until the user logs on successfully. Also, after a single unsuccessful attempt to say the voicemail password, the user must use the keypad to retry the password entry.

This feature is disabled by default.

Voice-Recognition Conversation: Saying Dates and Times

The voice-recognition conversation allows users to say a date and time for time-sensitive applications, such as enabling greetings. For example, users can say, “Enable my alternate greeting until March 4th at noon.” Dates that fall after the current calendar day are applied to the current year; dates that fall before the current calendar day are applied to the following year.

Voice-Recognition Conversation: Message Addressing and Recording Enhancements

The following enhancements have been made to the process of addressing and recording messages for voice-recognition users:

- While addressing a message, users can say “Remove” to remove the last recipient added. This is particularly useful in cases where Cisco Unity Connection finds and adds an incorrect match to the spoken recipient name.
- If a user makes several attempts to add a name and no match is found, Connection prompts the user to press 9 to switch to using the phone keypad. After pressing 9, the user can use keypad addressing to spell the name or enter the extension of the recipient. When the recipient is added, Connection automatically switches the user back to the voice-recognition conversation.
- Voice-recognition users can pause or resume during message recording (by using the same key presses that are used in the touchtone conversation). This allows the user to edit or rerecord the message.

Voice-Recognition Conversation: Users Can Temporarily Use Phone Keypad to Change Setup Options, Then Return to Voice-Recognition Mode

Voice-recognition users no longer need to exit the voice-recognition conversation in order to change setup options, then hang up and call back in to resume using voice commands. Instead, users can say "Setup" or "Setup Options" to switch to using the phone keypad, make changes in the Setup Options menu using the keypad, then press * at the Setup Options menu or wait for the conversation to time out to return to the voice-recognition session Main menu.

Voice-Recognition Conversation: Speech Sensitivity

The Voice Recognition Speech Sensitivity setting is used to fine tune the speech engine to compensate for potential background noise. By default, Cisco Unity Connection uses a speech sensitivity setting of 50 (on a scale of 0 to 100). A value of 0 indicates the speech engine is not very sensitive (and the user will have to speak very loudly to be understood). A value of 100 indicates that the speech engine is very sensitive and any noise at all will be considered a speech event.

You specify the speech sensitivity on the applicable Phone Menu page for a user template or an individual user, or by using the Bulk Edit utility in Cisco Unity Connection Administration.

Voice-Recognition Conversation: Voice Command Tutorial

Voice-recognition users can say "Tutorial" at the Main menu to hear a menu of detailed tutorial topics that will guide them through using the voice-recognition interface. The tutorials cover placing calls, managing greetings, playing messages, sending messages, and using universal commands (those commands that can be said at any point in the voice-recognition conversation).

Customizable Subject Lines

Message subject lines are visible when users are viewing and listening to messages in the Cisco Unity Inbox web tool, an IMAP client, an RSS client, or any other visual client that displays the message subject. Subject lines are not presented to users when they are listening to voice messages over the phone.

You can configure both the wording and the information that is included in the subject line of voice messages, including localizing the subject line according to the language of the recipient.

For more information, refer to the "Message Subject Line Formats" section in the "Messaging" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Descriptions of Attachments

When the text-to-speech feature (TTS) is enabled, the Cisco Unity Connection conversation tells the user whether there are attachments to the message and what these attachments are. When the attachment is in a playable format, the attachment are played. When the attachment is in a supported document (such as an email or a text file), TTS reads the attachment. The descriptions for attachments can be configured by the administrator on the TTS Descriptions of Message Attachments page in Cisco Unity Connection Administration.

Digital Networking Features

Digital Networking allows you to connect up to five Cisco Unity Connection 7.x servers with the following functionality:

Network discovery	When adding a new Connection system to the network, you configure the system with the details of one other established Connection location on the network; by communicating with the established location, the new system discovers all of the other Connection locations on the network.
Directory synchronization	Digitally networked Connection systems automatically exchange directory information, so that a user on one Connection system can dial out to or address messages to a user on any other system by name or extension, provided that the target user is reachable in the search scope of the originating user. The networked systems function as though they share a single directory. Users do not need to know where another user is located; they need only the name or extension number to address a message to any user or system distribution list in the directory.
Message exchange	Digitally networked Connection systems automatically route messages sent to users or distribution lists on other servers to the appropriate location. If your network topology requires the use of an SMTP Smart Host to deliver messages from one location to another, you can enable the use of the Smart Host on a per-location basis.

In addition, you can configure settings that allow the following cross-server call handling features:

Cross-server logon	When calling from outside the organization to log on to Connection, users—regardless of home Connection server—call the same number and are transferred to the applicable home Connection server to log on.
Cross-server transfer	Cross-server transfer enables calls from the automated attendant or from a directory handler of one Connection server to be transferred to a user on another networked Connection server, according to the call transfer and screening settings of the called user.
Cross-server live reply	Cross-server live reply allows users who listen to their messages by phone to reply to a message from a user on another networked Connection server by calling the user (according to the call transfer and screening settings of the called user). **Note** Cross-server live reply is automatically supported when you configure cross-server transfers.

Dispatch Messaging

The dispatch message property allows a message that is sent to a distribution list via a call handler or interview handler to be sent to group of users but to have only one user act on the message. When listening to a dispatch message, users are given the option to accept the message, postpone the message, or decline the message. If the user chooses to accept the message, all other copies of the message are removed from the mailboxes of the other members of the distribution list. If the user chooses to postpone

the message, it will remain as an unread message in the user's mailbox and in the mailboxes of the other members of the distribution list. If the user chooses to decline the message, it will be removed from the user's mailbox and all other copies of the message remain as an unread in the mailboxes of the other members of the distribution list. If there is only one copy of the dispatch message remaining, the user whose mailbox it is in must accept it. The user will not be given the option to decline the message.

Dispatch messaging is useful in situations when a team of people are available to respond to issues, but only one person needs to respond. For example, an IT department may want to set up a call handler to take messages from employees who need assistance and send the messages to a distribution list comprised of IT department staff. All members of the distribution list receive a copy of the message. If a staff member feels he or she can handle the issue, he or she can accept the message and take action on it. If the issue is outside his or her area of expertise, he or she can elect to decline the message, leaving it for another team member to respond to.

For more information refer to the "Dispatch Messages" topic in the "Messaging" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Message Actions

Cisco Unity Connection uses the message action settings for a user to determine how to handle the different types of messages that it receives for the user. The message action setting for a particular type of message (voice, email, fax or delivery receipt) affects all messages of that type that are sent to or created on the Connection server from any client (for example, by using the phone interface, the Cisco Unity Inbox web tool, or an IMAP client).

By default, Connection is configured to accept each type of message, an action that causes Connection to place the message in the user mailbox in the appropriate Connection mailbox store. You can use the relay action to instruct Connection to send all messages of a certain type to a different messaging system (such as a corporate email server) for storage and user access. You can use the reject action to instruct Connection to discard all messages of a particular type that a user receives and send a nondelivery receipt to the message sender.

Note If you choose to relay or reject one or more types of messages, users cannot access these types of messages from the Connection phone interface or from clients such as Phone View or Cisco Unified Personal Communicator. (The exception is relaying email messages to an external message store to which Connection is configured to connect so that users can hear their emails read to them when they log on to Connection by phone.)

You can configure message actions for individual users or user templates in Cisco Unity Connection Administration, or for multiple users at once in the Bulk Edit utility.

New Reports

The following reports have been added to the Serviceability Reports page in Cisco Unified Serviceability Administration:

- Dial Plan report provides a list of the search spaces configured on the Cisco Unity Connection server, with an ordered list of partitions assigned to each search space.

- Dial Search Scope report provides a list of all objects and their extensions in the specified partition that is configured in the Connection directory.
- Mailbox Store report provides information about the mailbox store (or message store) that you specify on the Connection server.
- Message Traffic report provides information on how many messages are received by Cisco Unity Connection.
- Port Activity report provides information on the activity of the voice messaging ports.

Partitions and Search Spaces

Partitions and search spaces provide a way to segregate the global dial and message addressing space within Cisco Unity Connection. A partition comprises a logical grouping of objects that are identifiable by extension, name or SMTP address (such as users, distribution lists, call handlers, locations, and contacts). A search space contains an ordered list of partitions.

Search spaces can be used to define the scope of objects (users, distribution lists, and so on) that a user or outside caller can reach while interacting with Connection. For example, the search scope applied to a user identifies the users, distribution lists, and contacts to which the user can address messages. The search scope applied to a user also identifies the users and system contacts that the user can call by using name dialing with the voice-recognition conversation.

A search space is comprised of one or more ordered partitions. When Connection searches for an object on behalf of a caller, it searches the partitions in the order in which they are arranged in the search space. While extensions must be unique within a partition, they do not need to be unique within a search space, so you can use search spaces to handle dial plans that have overlapping extensions.

When you install or upgrade to Connection release 7.0, all objects are placed in the default partition (named <Server Name> Partition) and are configured to use the default search space (named <Server Name> Search Space). Also, all templates are configured to apply the default partition and search space to objects that are created by the template as applicable. Thus, by default, Connection uses only one “global” search space.

Routing Calls from the Next Routing Rule

Cisco Unity Connection includes a new call action, Route From Next Call Routing Rule, that you can configure as the After Greeting, After Message, or one-key caller input action for a user or a system call handler.

This action causes Connection to continue processing the call according to the applicable call routing table (direct or forwarded, depending on how the call was received from the phone system) starting at the next rule after the rule that Connection previously applied to the call. If the call was already processed according to the final rule in the table, the final rule is applied again.

This action allows you to add new functionality to your call management plan, such as setting up a call handler that plays a standard greeting or legal message to all callers prior to forwarding them to the voice mailbox of the user they attempted to call.

RSS Feeds of Voice Messages

As an alternative to checking messages by phone or by using the Cisco Unity Inbox or an IMAP client, users can use an RSS reader to retrieve voice messages.

For more information, refer to the "Setting Up Access to RSS Feeds of Voice Messages" section in the "Messaging" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Simulating Abbreviated Extensions

You can simulate abbreviated extensions by using prepended digits for call handlers and user mailboxes. When such digits are defined, they will be prepended to any extension that a caller dials while listening to the greeting for the call handler or user mailbox.

Cisco Unity Connection first attempts to route the call to the prepended extension. If the prepended extension is not valid, Connection attempts to route the call to the dialed extension. In the following example, the call handler named Sales is configured with the prepended digits 123. When a caller dials 1000 while listening to the greeting for the Sales call handler, Connection attempts to route the call to extension 1231000; if the prepended extension is not valid, Connection attempts to route the call to extension 1000.

Abbreviated extensions can be used as a way for an organization to segment users into different groups. For example, a company uses six-digit extensions, and all extensions in the Engineering department begin with 10 and all extensions in the Marketing department begin with 11. Call handlers could be created for Engineering and Marketing, and they could be configured to prepend a 10 or a 11 to any extension dialed from that call handler. This would allow users to enter only the last four digits of a user extension from that call handler.

You configure prepended digits on the applicable Caller Input page for a user template, an individual user, call handler template, or an individual call handler in Cisco Unity Connection Administration.

SMS Message Notifications

With the services and information provided by a wireless carrier, mobile messaging service provider, or similar company, Cisco Unity Connection can use the Short Message Peer-to-Peer (SMPP) protocol to send message notifications in the Short Message Service (SMS) format to GSM mobile phones and other SMS-compatible devices when users receive a new voice, email, or fax message.

SMS (SMPP) notifications are generally much faster than (SMTP) text-pager notifications, and depending on the SMS service provider, may offer the additional benefit of replacing a previous message notification with the latest one.

For additional information and a task list for setting up this option, refer to the "Setting Up SMTP and SMS (SMPP) Message Notifications" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Voice-Recognition Update Schedule, Grammar Statistics Tool, and CLI Command

Cisco Unity Connection includes the Voice-Recognition Update Schedule, a predefined schedule. This schedule dictates the times and days when the Connection voice-recognition transport utility can automatically rebuild the voice-recognition name grammars if there are pending changes. (When administrators add or change names on the Connection system, the names are not recognized by the

voice-recognition conversation until they are compiled in the grammars.) By default, all days and times are active for this schedule; to create blackout times and days during regular periods of heavy system activity, edit this schedule to make these blackout periods inactive.

The Grammar Statistics tool in Cisco Unity Connection Administration shows information about all of the dynamic name grammars. For each name grammar, the tool displays information such as the finish time of the last grammar recompilation, the total number of unique items in the grammar, whether there are updates pending to the grammar, and whether the grammar is currently in the process of being recompiled.

Users with administrative privileges on the Connection server can use the Rebuild Grammars button in the Grammar Statistics tool or the **run cuc vui rebuild** CLI command to instruct the voice-recognition transport utility to rebuild the voice-recognition name grammars with any pending changes. Either action rebuilds only grammars that have changes flagged in the database ignores any name grammar update schedule blackout periods. Due to the overhead of retrieving potentially large amounts of name-related data from the database, it is best to use these commands sparingly and only when absolutely necessary.

Changed Functionality—Release 7.0(1)

This section contains information about changed functionality in this release time frame only. Refer to the release notes of the applicable version for information on changed functionality in earlier versions of Cisco Unity Connection.

Release notes for all versions of Cisco Unity Connection are available at http://www.cisco.com/en/US/products/ps6509/prod_release_notes_list.html.

Release notes for all versions of Cisco Unified Communications Manager Business Edition are available at http://www.cisco.com/en/US/products/ps7273/prod_release_notes_list.html.

Note that the Cisco Unity Tools website may offer scripts and applications that were not included in Cisco Unity Connection 7.0(1). Some offerings may not be supported by Cisco TAC. Refer to http://www.ciscounitytools.com for information.

Alternate Extensions

You can enter SIP phone numbers as alternate extensions for users.

Cisco Unified Communications Manager Authentication and Encryption for SIP Trunk Integrations

Cisco Unified Communications Manager SIP trunk integrations support authentication and encryption of the Cisco Unity Connection voice messaging ports through TLS over the control channel and SRTP over the Media channel.

Cisco Unity Connection Conversation Changes

In addition to the new functionality described in the "Cisco Unity Connection Conversation Enhancements" section, some default settings and functionality have changed in the Cisco Unity Connection conversation with this release. The changes are described in the following sections:

- Conversation Settings Removed from Advanced Settings Page, page 31
- End of Recording Termination Warning Behavior Changes, page 32
- Multiple Transfer Rules Offered to Users, page 32
- Presentation of Multiple Message Addressing Matches, page 32
- Private List Membership Conversation Improvements, page 33
- Standard Conversation Keypad Mapping, page 33
- Streamlined Send Menu Style Is Applied to All Users, page 34

Conversation Settings Removed from Advanced Settings Page

The following settings are no longer available on the System Settings > Advanced > Conversations page:

- Addressing Match Confirmation Mode—This setting is no longer used because the way that Connection presents match results has changed. A setting for confirming a match by name can be enabled and disabled for individual users by using Cisco Unity Connection Administration or the Cisco Unity Assistant web tool. Also see the"Specifying Per User Whether Users Confirm Recipients by Names" section on page 23.
- Add Dual Name Confirmation—The existing value for the setting is retained upon upgrading. The setting can be enabled and disabled for individual users by using Connection Administration or the Cisco Unity Assistant. Also see the"Specifying Per User Whether Users Confirm Recipients by Names" section on page 23.
- Confirm Deletion of New or Saved Messages—The existing value for the setting is retained upon upgrading. The setting can be enabled and disabled for individual users by using Connection Administration or the Cisco Unity Assistant. Also see the"Specifying Per User Whether Connection Asks Users to Confirm Deletions of New and Saved Messages" section on page 22.
- Mark Messages Saved If User Hangs Up —The existing value for the setting is retained upon upgrading. The setting can be enabled and disabled for individual users by using Connection Administration or the Cisco Unity Assistant. Also see the"Specifying Per User That Messages Are Marked Saved When Users Hang Up or Are Disconnected" section on page 21.
- Send Message If User Hangs Up During Recording—The existing value for the setting is retained upon upgrading. The setting can be enabled and disabled for individual users by using Connection Administration or the Cisco Unity Assistant. Also see the"Specifying Per User Whether Messages Are Sent Upon Hang-Up" section on page 23.
- Standard Conversation: Use # to Skip to Next Message—This setting is no longer used because the Custom Keypad Mapping tool can be used to map specific keys to desired actions in custom conversations. For more information, see the "Custom Keypad Mapping Tool" section on page 14.
- Streamlined Addressing for Multiple Recipients—The existing value for the setting is retained upon upgrading. The setting can be enabled and disabled for individual users by using Connection Administration or the Cisco Unity Assistant. Also see the"Specifying Per User Whether Connection Prompts Users to Continue Addressing" section on page 22.

End of Recording Termination Warning Behavior Changes

The following changes have been made to how Cisco Unity Connection handles warning callers that they are nearing the maximum allowable length of a message recording:

- The termination warning is now on by default and is played 15 seconds before the recording reaches the maximum allowable message length.
- Instead of hearing only a tone warning that the recording is about to end, the caller hears the following prompt: "You are approaching the maximum length for a recording. Finish your recording after the tone."

You can modify the settings that control the termination warning on the System Settings > Advanced > Telephony page in Cisco Unity Connection Administration.

Email in an External Message Store Is Not Presented with Voice Messages

If users have access to emails on an external message store (a message store other than Cisco Unity Connection), Connection does not include these emails when playing voice messages. Users must press 7 or say "Play external messages" to hear their external messages.

Error Greeting Default Call Action

When Cisco Unity Connection detects an error or a caller enters an unrecognized extension during the greeting of a user or a call handler, the error greeting is played and the default after greeting action is to replay the current greeting. In previous versions, the default after greeting action was to go to the opening greeting call handler.

Multiple Transfer Rules Offered to Users

Each user has three basic transfer rules that you can customize: one for standard hours and one for closed hours of the active schedule, and an alternate transfer rule that, when enabled, overrides the standard and closed transfer rules. This gives users the option to have their calls routed to a different extension when the office is closed, or they might configure an alternate transfer rule that routes their calls directly to voicemail while they are out of the office.

Users can configure the three basic transfer rules by phone or on the Transfer and Screening Options page in the Cisco Unity Assistant web tool. In previous versions only an administrator could configure the three transfer rules for an individual user in Cisco Unity Connection Administration.

Personal Call Transfer Rules Enabled Per Basic Transfer Rule

Each basic transfer rule—the standard, alternate, and closed—can be configured to apply personal call transfer rules instead of the basic transfer settings.

Presentation of Multiple Message Addressing Matches

When a user attempts to address a message to a recipient by spelling part of a name, if there are many matches for the digits entered, Cisco Unity Connection returns the match results 20 at a time, rather than eight at a time as in previous releases. Also, Connection allows users to listen to more than one set of match results if desired without having to spell more letters in the name.

Private List Membership Conversation Improvements

The touchtone conversation for adding, reviewing, and deleting names in a private list has been simplified to use the "skip and scan" method of list editing. "Skip and scan" is a style used in other conversations, such as the Continuous Addressing Mode conversation for adding recipients to a message.

The method that users use to choose a particular private list for editing has not changed.

Standard Conversation Keypad Mapping

The keypad mapping has changed for the standard conversation to take advantage of several new conversation enhancements.

The following key presses have changed:

- During Message Playback menu
  - Change Volume = 65
  - Slower Playback Speed = 64
  - Faster Playback Speed = 66
- During After Message menu
  - Play Message Properties = 15

The following key presses have been added:

- During Message Playback menu
  - Reset Volume to Default = 63
  - Reply = 4
  - Reply To All = 42
  - Return Call To Sender = 44
  - Forward Message = 5
  - Skip Message, Mark New = 6
  - Go To First Message = 17
  - Go To Last Message = 19
  - Toggle Urgency Flag = 18
  - Play Message Properties = 15
- During After Message menu
  - Toggle Urgency Flag = 18
  - Go To First Message = 17
  - Go To Last Message = 19
  - Send To Fax = 68

If you are upgrading from Connection version 2.x, users and user templates that were previously assigned to the standard conversation are assigned to the Classic conversation. For information on the Classic conversation, see the "Classic Conversation Added" section on page 13.

Streamlined Send Menu Style Is Applied to All Users

All users send messages by using the Streamlined Send menu style. The Streamlined Send menu is designed so that users use fewer keystrokes to mark messages urgent, request receipts, and perform other tasks after they have addressed and recorded a message. The Streamlined Send menu style was the default setting in Connection 2.x.

Because the Standard Send menu style has been removed, the Send Message Style list is no longer available on the Send Message Settings page when configuring users or user templates in Cisco Unity Connection Administration.

Disaster Recovery System

The Disaster Recovery System, which you use to back up and restore Cisco Unity Connection data, has been enhanced to support Connection clusters.

For information on using the Disaster Recovery System for disaster-recovery purposes, see the applicable document:

- *Disaster Recovery System Administration Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/drs_administration/guide/7xcucdrsag.html.
- *Disaster Recovery System Administration Guide for Cisco Unified Communications Manager Business Edition 7.0* at http://www.cisco.com/en/US/products/ps7273/prod_maintenance_guides_list.html.

For information on using the Disaster Recovery System to replace Connection servers, see the "Replacing Cisco Unity Connection 7.x Servers" chapter of the *Reconfiguration and Upgrade Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/upgrade/guide/7xcucrugx.html.

Dynamic Port Configuration

In most instances, voice messaging ports can be configured without restarting the Cisco Unity Connection server or the Connection Conversation Manager service in Cisco Unity Connection Serviceability.

KPML

For Cisco Unified Communications Manager SIP trunk integrations, Cisco Unity Connection supports DTMF keystrokes in the RTP media stream (in-band) or in SIP messages (out-of-band).

Message-Aging Policy for Secure Messages

Two message-aging rules have been added to the message-aging policy. These rules apply only to secure messages and are based on when messages were created:

- Cisco Unity Connection automatically deletes secure messages that users have touched in some way, such as saving, deleting, or opening but then saving messages as new.

- Connection automatically deletes all secure messages that are older than the specified number of days, regardless of whether the users have listened to or touched the message in any way.

Both of these message-aging rules are disabled by default.

Notification Enhancements

The following changes have been made to notifications:

- Notifications can be sent for fax messages, dispatch messages, calendar appointments, and calendar meetings.
- Notifications can be sent based on the user who sent the message and/or a pattern match against the sender's caller ID.
- Notifications from identified users include the name of the sender.
- Notifications from callers who are not identified users include the originating phone number and, if available, the name of the caller.
- Notifications for urgent and/or private messages indicate that the messages are urgent and/or private.
- SMS and SMTP notifications can be configured to send one notification for each received message or a periodic list of new messages. These notifications indicate the type of message (voice or fax) and can be configured to include the time the message was received.
- When the user chooses an action that marks the message as new, Connection does not initiate a repeat notification for the message. In previous versions, Connection initiated another notification when the user chose an action that marked the message as new.

Personal Contacts

Cisco Unity Connection uses the information in personal contacts to forward incoming calls and to help users place outgoing calls. Users create and edit personal contacts in the Cisco Unity Assistant web tool. In previous versions, personal contacts were in the Cisco Unity Personal Call Transfer Rules web tool. The change allows users who do not need access to the Personal Call Transfer Rules web tool to add personal contacts to place outgoing call by using voice commands.

Playback Devices Provide Full Functionality for TTS

When playing a text-to-speech (TTS) message, playback devices (such as the Media Master) provide fully functional controls for volume, speed, position, pause, and resume.

Port Multiplexing for SIP Integrations

SIP integrations (such as for PIMG/TIMG or Cisco SIP Proxy Server) can share the same receive IP port on the Cisco Unity Connection server.

System Contacts

The fields on the Edit Contact Basics page in Cisco Unity Connection Administration have been rearranged to improve the usability of the page.

System Transfers

In addition to the two "system transfer" conversations that offer callers the ability to transfer to numbers that are not associated with Cisco Unity Connection users, you can configure individual user or call handler greetings to allow callers to transfer to numbers not associated with Connection users or call handlers.

For more information, refer to the "Setting Up System Transfers" chapter of the *System Administration Guide* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Users Can Compose, Reply to, and Forward Messages by Using IMAP Clients

Cisco Unity Connection can receive and process SMTP messages generated by IMAP clients (for example, a voice message recorded in a Microsoft Outlook email client by using Cisco Unity Connection ViewMail for Microsoft Outlook).

When an IMAP client tries to send a message to Connection through SMTP, Connection attempts to categorize the message as a voice message, email, fax, or delivery receipt. Connection also attempts to map the sender and the message recipients to users by comparing the SMTP addresses in the message header to its list of SMTP proxy addresses.

Administrators can configure a number of settings that control how users access the Connection server with IMAP clients. For each type of message that a user can receive (voice, email, fax, and delivery receipt) administrators can also configure whether Connection accepts the message and places it in the user mailbox on the Connection server, relays the message to the user at an alternate SMTP address, or rejects the message.

Installation and Upgrade Information

- Installing Cisco Unity Connection or Cisco Unified CMBE for the First Time, page 36
- Upgrading from Cisco Unity Connection 2.x to 7.0 or from Cisco Unified CMBE 6.x to 7.0, page 37
- Migrating from Cisco Unity or from Cisco Unity Connection 1.x to Cisco Unity Connection 7.0, page 37
- Installation and Upgrade Notes, page 38

Installing Cisco Unity Connection or Cisco Unified CMBE for the First Time

For instructions on installing a new Cisco Unity Connection system, refer to the *Installation Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/installation/guide/7xcucigx.html.

For instructions on installing a new Cisco Unified Communications Manager Business Edition (CMBE) system, refer to *Overview of Mandatory Tasks for Setting Up a Cisco Unified Communications Manager Business Edition 7.x System* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/cucmbe_task_list/7xcucmbetask.html and to the *Installing Cisco Unified Communications Manager Business Edition Release 7.0* at http://www.cisco.com/en/US/products/ps7273/prod_installation_guides_list.html.

Upgrading from Cisco Unity Connection 2.x to 7.0 or from Cisco Unified CMBE 6.x to 7.0

Revised February 19, 2009

Caution If any languages other than U.S. English (ENU) are currently installed and in use on the Cisco Unity Connection 2.x or Cisco Unified Communications Manager Business Edition 6.x system, you must install the Connection 7.0 or Cisco Unified CMBE 7.0 versions of the same languages during the upgrade. Otherwise, the Connection conversation will not function properly for users who are configured to use non-ENU languages. For information on downloading and installing languages, see the "Downloading and Installing Cisco Unity Connection Languages" section on page 38.

A change that was made to Connection in version 2.1(3) prevents upgrades from version 2.1(3) to Connection 7.0(1) or 7.0(2). To upgrade from Connection 2.1(3), you will need to wait for Connection 7.1(2) to be released, in the second quarter of 2009.

To upgrade from Cisco Unity Connection 2.x to 7.0 or from Cisco Unified CMBE 6.x to 7.0, you must get DVDs from Cisco. For ordering information, go to the Cisco Ordering website at http://www.cisco.com/en/US/ordering/index.shtml.

For instructions on upgrading a Connection 2.x system to version 7.0, refer to the "Upgrading Cisco Unity Connection 2.x or Later to the Shipping 7.x Version" chapter of the *Reconfiguration and Upgrade Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/upgrade/guide/7xcucrugx.html.

For instructions on upgrading a Cisco Unified CMBE 6.x system to version 7.0, refer to the "Software Upgrade and Installation" section in the "Software Upgrades" chapter of the *Cisco Unified Communications Operating System Administration Guide* at http://www.cisco.com/en/US/products/ps7273/prod_maintenance_guides_list.html.

Migrating from Cisco Unity or from Cisco Unity Connection 1.x to Cisco Unity Connection 7.0

Note There is no supported migration path from Connection 1.x to Cisco Unified Communications Manager Business Edition (CMBE). If you want to migrate from Connection 1.x to Cisco Unified CMBE, you must reinstall all software, and recreate all system and user data.

For information on migrating from Cisco Unity 4.0(5) or later to Connection 7.0 or from Connection 1.x to Connection 7.0, refer to the applicable migrating chapter of the *Reconfiguration and Upgrade Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/upgrade/guide/7xcucrugx.html.

Installation and Upgrade Notes

- Downloading and Installing Cisco Unity Connection Languages, page 38
- License Tag Required to Use the U.S. English Conversation and Personal Call Transfer Rules, page 39

Downloading and Installing Cisco Unity Connection Languages

Revised April 2, 2012

Caution The version of the languages that you download and install must match the Cisco Unified Communications Operating System version installed, or installing languages will fail.

Caution Depending on your license settings, you may not be allowed to use English-United States and, therefore, must install other languages for Cisco Unity Connection to function. For more information, see the "License Tag Required to Use the U.S. English Conversation and Personal Call Transfer Rules" section on page 39.

For language installation instructions, refer to the "Software Upgrades" chapter of the applicable guide:

- *Cisco Unified Communications Operating System Administration Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/os_administration/guide/7xcucosagx.html.
- *Cisco Unified Communications Operating System Administration Guide for Cisco Unified CMBE 7.0* at http://www.cisco.com/en/US/products/ps7273/prod_maintenance_guides_list.html.

If you are installing Japanese because you want Cisco Unity Connection Administration to be localized, you must also install the Cisco Unified Communications Manager Japanese locale. See the "Locale Installation" section in the "Software Upgrades" chapter of the *Cisco Unified Communications Operating System Administration Guide*.

If you are installing other languages because you want the Cisco Personal Communications Assistant to be localized, you must also install the corresponding Cisco Unified Communications Manager locales. See the "Locale Installation" section in the "Software Upgrades" chapter of the *Cisco Unified Communications Operating System Administration Guide*.

To Download Cisco Unity Connection Languages

Step 1 On a computer with a high-speed Internet connection, go to the Voice and Unified Communications Downloads page at http://tools.cisco.com/support/downloads/pub/Redirect.x?mdfid=278875240.

Note To access the software download page, you must be logged on to Cisco.com as a registered user.

Step 2 In the tree control on the Downloads page, expand **Products>Voice and Unified Communications>IP Telephony>Unified Messaging>Cisco Unity Connection**, and click **Cisco Unity Connection Version 7.0**.

Step 3 On the Select a Software Type page, click **Unity Connection Locale Installer**.

Step 4 On the Select a Release page, click **7.0(1)**, and the download links appear on the right side of the page.

Step 5 Confirm that the computer you are using has sufficient hard disk space for the downloaded files. (The download file sizes appear below the download links.)

The filename for each language is uc-locale-<two-letter language abbreviation>_<two-letter country abbreviation>-<version>.cop.sgn.

Step 6 Click the name of a file to download.

Step 7 On the Download Image page, make note of the MD5 value.

Step 8 Follow the on-screen prompts to complete the download.

Step 9 Repeat Step 6 through Step 8 for each Connection language that you want to install.

Note You can install up to five languages on a Connection server.

Step 10 For each downloaded file, use a checksum generator to confirm that the MD5 checksum matches the checksum that is listed on Cisco.com. If the values do not match, the downloaded file is damaged.

Caution Do not attempt to use a damaged file to install software or the results will be unpredictable. If the MD5 values do not match, download the file again until the value for the downloaded file matches the value listed on Cisco.com.

Free checksum tools are available on the Internet—for example, the Microsoft File Checksum Integrity Verifier utility. The utility is described in Microsoft Knowledge Base article 841290, *Availability and Description of the File Checksum Integrity Verifier Utility*. The KB article also includes a link for downloading the utility.

Step 11 Either copy the downloaded files to an FTP or SFTP server, or burn the files to CDs or DVDs. If you burn discs of the files, note the following considerations:

- Use the Joliet file system, which accommodates filenames up to 64 characters long.
- If the disc-burning application that you are using includes an option to verify the contents of the burned disc, choose that option. This causes the application to compare the contents of the burned disc with the source files.
- Label the discs “Cisco Unity Connection 7.0(1) languages.”

Step 12 Delete the downloaded files to free disk space.

License Tag Required to Use the U.S. English Conversation and Personal Call Transfer Rules

If you want to use English-United States for the Cisco Unity Connection conversation or you want users to be able to create personal call transfer rules, the Connection license must include the license tag LicRegionIsUnrestricted. If your Connection licenses do not include the LicRegionIsUnrestricted tag and you want to use these features, install a license that includes the tag. After you install the license, you must restart Connection. (Licenses without this tag are intended only for use outside the United States.)

If you choose not to install a license that includes the LicRegionIsUnrestricted tag, you must install one or more Connection languages.

Connection demonstration licenses include the LicRegionIsUnrestricted tag, so you can use English-United States on demonstration systems.

To Determine Whether the LicRegionIsUnrestricted License Tag Is Present

Step 1 In Cisco Unity Connection Administration, under System Settings, click **Licenses**.

Step 2 On the Licenses page, click the name of the first license file.

Step 3 On the View License page, in the File Content box, search for the text "LicRegionIsUnrestricted."

Step 4 If you do not find the text in the first file, search all of the other license files listed on the Licenses page.

Step 5 If "LicRegionIsUnrestricted" does not appear in any of the license files, get a license that contains the tag before you install Connection.

Important Notes

Connection IMAP Server Service Should Not Be Stopped or Disabled For An Extended Period of Time

Added October 19, 2010

The Connection IMAP Server service processes events that are placed in the IMAP queue table in the Connection database when voice messages are created, updated, or deleted, even if you do not have active IMAP users. If the service is disabled or stopped, the table continues to grow, and can eventually fill available disk space and cause database instability. Do not stop the service for more than a day at a time or disable the service indefinitely. If you have previously stopped or disabled the service, try restarting the service. If the service does not start, contact Cisco TAC to apply the workaround for caveat CSCti68395.

Limitations and Restrictions

Connection Cannot Be Installed or Operated in IPv6 or Dual-Stack (IPv4 and IPv6) Networks

Revised November 9, 2010

Connection 7.0 does not support IPv6, and cannot be installed or operated in a pure IPv6 network. To install or operate in a dual-stack (IPv4 and IPv6) network, a workaround for CSCtj93659 is required. See the caveat information for CSCtj93659 for more details.

Replacing Disks in a RAID

Connection supports only replacing a defective disk in a RAID with a blank disk to repair the RAID. Replacing disks in a RAID for any other reason is not supported.

Caution Do not replace a disk in a RAID with a disk that contains data, even if the replacement disk was originally a disk in the same RAID in the same server.

Using Media Master to Open a File That Was Saved on a Workstation

Added November 19, 2008

The Media Master cannot open a WAV file that is saved on your workstation if the WAV file was recorded in the G.729a audio format. For example, you might try to open a WAV file of an announcement that was recorded earlier rather than making a recording by using a phone or a computer microphone.

The workaround for this limitation is to do one of the following:

- Convert the WAV file to another audio format (for example, convert it to the G.711 audio format).
- Use a WAV file that is recorded in a supported audio format other than G.729a.
- Make the recording by using a phone or a computer microphone.

Note that when Cisco Unity Connection is configured to record in the G.729a audio format, the Media Master functions correctly for recording and playing by using a phone or a computer microphone.

ViewMail Limitations Regarding Secure Messages

Added February 22, 2010

- Secure messages cannot be forwarded by using Cisco Unity Connection ViewMail for Microsoft Outlook or ViewMail for IBM Lotus Notes.
- ViewMail for Outlook and ViewMail for Notes support only playing secure messages.
- Messages that are composed or replied to by using ViewMail for Outlook or ViewMail for Notes are not sent as secure, even when users are assigned to a class of service for which the Require Secure Messaging field is set to Always or to Ask.

Caveats

The table in this section lists any open Severity 1, 2, and 3 caveats with this release.

You can find the latest caveat information for Cisco Unity Connection version 7.0(1) and for Connection in Cisco Unified Communications Manager Business Edition version 7.0(1)—in addition to caveats of any severity for any release—by using Bug Toolkit, an online tool available for customers to query defects according to their own needs. Bug Toolkit is available at http://www.cisco.com/go/bugs.

Note To access Bug Toolkit, you must be logged on to Cisco.com as a registered user.

This section contains caveat information for Cisco Unity Connection 7.0(1) and Connection in Cisco Unified CMBE 7.0(1) only. Refer to the release notes of the applicable version for caveat information for earlier versions of Cisco Unity Connection.

Release notes for all versions of Cisco Unity Connection are available at http://www.cisco.com/en/US/products/ps6509/prod_release_notes_list.html.

Release notes for all versions of Cisco Unified Communications Manager Business Edition are available at http://www.cisco.com/en/US/products/ps7273/prod_release_notes_list.html.

Open Caveats—Connection Release 7.0(1), and Connection in Cisco Unified CMBE Release 7.0(1)

Click a link in the Caveat Number column to view the latest information on the caveat in Bug Toolkit. (Caveats are listed in order by severity, then by component, then by caveat number.)

Table 1 Connection Release 7.0(1) and Connection in Cisco Unified CMBE 7.0(1) Open Caveats

Caveat Number	Component	Severity	Description
CSCsr83757	telephony	2	ASA blocks skinny registration message if inspect turned on.
CSCsk57879	admin	3	Change of Enduser password with highfrequency-phone voice mail is failed
CSCso46275	admin	3	Conversation settings missing from Bulk Edit
CSCsq05194	admin	3	CIMC: UC 1.2 w/ CUCM 6.x or later, cannot create unity user
CSCsq21618	admin	3	If cluster nodes cant connect disable ports status for that node
CSCsq25661	admin	3	Changing hostname on UC standalone causes tomcat/JAVA crash
CSCsr05934	admin	3	Announce Matched Names Using Extension Format can not be set
CSCsr24025	admin	3	Can't edit or delete alternate name
CSCsr26274	admin	3	BAT does not export contacts vui dialable numbers
CSCsr39778	admin	3	SRM reversing a name change SRM should grey out Activate button
CSCsr42066	admin	3	A/A: After SBR can't login to the secondary node using web page.
CSCsr60804	admin	3	need a way to clean out badmail folder without root access
CSCsr42468	backup	3	failed DB restore, future restore attempts failed
CSCso69745	conversations	3	VUI doesn't identify target when asking for device confirmation
CSCsq88360	conversations	3	Msg Settings conv for Addressing Priority presents max of 50 buddies
CSCsr21076	conversations	3	VUI applies non-ENU user language to email msgs and attachments
CSCsr42373	conversations	3	TUI doesn't obey Send NDR on Failed Message Delivery setting
CSCsr64122	conversations	3	Cancelling out of adding names goes to message cancellation confirmation
CSCsr64595	conversations	3	DN: PCTRs not applied for remote users when defined as caller
CSCsr64677	conversations	3	CC:Calling non-dialable non-addressable contact in VUI DH goes to OG
CSCsr74509	conversations	3	TUI: Failsafe heard in a mailbox full scenario
CSCsr85470	conversations	3	TUI-Optional Conv. Live Reply incorrectly mapped to 8-4
CSCsr85507	conversations	3	TUI-Various invalid keypresses during NDR original msg playback
CSCsr87559	conversations	3	CC: VUI call to VPIM contact without transfer results in failsafe
CSCsr90219	conversations	3	Need to remove Double Key Press Time advanced conversation setting
CSCsr91898	conversations	3	Messages may be delivered to unintended VPIM contact
CSCsr91949	conversations	3	TUI: Can select wrong contact with multiple matches
CSCsr97247	conversations	3	Intermittent core dumps in greeting administrator conversation

Table 1 Connection Release 7.0(1) and Connection in Cisco Unified CMBE 7.0(1) Open Caveats (continued)

Caveat Number	Component	Severity	Description
CSCsu05293	conversations	3	Reply All to VPIM blind addressed msg isn't delivered to all recipients
CSCso50770	core	3	CuCsMgr core dump during shutdown
CSCsr47650	core	3	DSS: Allow selecting a search space for the Dial Search Scope report
CSCsr47651	core	3	DSS: Dial Search Scope report should report on all DAOs
CSCsr56999	core	3	State information is getting overwritten by replication somehow
CSCsr63851	core	3	Reports to continue or cancel request show ???report.confirm.title?
CSCsr68377	core	3	Reports not working with very large database
CSCsr69626	core	3	Unable to generate Call Handler Traffic Report after a few attempts
CSCsr92677	core	3	Report Query sometimes fails on A/A setup
CSCsr01255	database	3	Core dump in Unityconnection during loadrun
CSCsr05155	database	3	UC should display aliases in the case entered
CSCsr42271	database	3	two copies of messages found after version switchover
CSCsr44829	database	3	Hostname change a/a second node
CSCsr47381	database	3	A/A : Alias Conflicts During Split Brain
CSCsr49610	database	3	Http Error while trying to edit subscriber password
CSCsr52172	database	3	CuCsMgr gradual memory leak due to scavenger
CSCsr58926	database	3	Hostname change requires two reboots in many circumstances
CSCsr89940	database	3	Switchover fails if publisher is restored from subscriber
CSCsr40660	localization	3	JPN: VMO Vista OL 2007 cannot read VMO addin
CSCsr75664	localization	3	Japanese Directory Handler does not provide search results for multiple
CSCsr75671	localization	3	Errornous Japanese prompts for MPE integration
CSCsr75675	localization	3	Errornous Japanese prompts for Private Distribution List settings
CSCsr75682	localization	3	Errornous Japanese prompts for Personal Call Transfer Rule settings
CSCsk13010	mediamaster	3	hang up in trap, then quickly initiate another trap session, plays again
CSCsq30418	messaging	3	Apple Mail 10.4.11 voice mail messages 0kb via IMAP w/UC 2.1
CSCsr02085	messaging	3	DN: Private list undeliverable with global remote user
CSCsr19015	messaging	3	Lotus Note 7.0 running on Mac OS hangs on the folder update view
CSCsr19050	messaging	3	Lotus Note 7.0 failed to do "send" email using UntiyConnection
CSCsr28895	messaging	3	Lotus Note 8.5 running on Mac crashed after the "send" email action
CSCsr42543	messaging	3	A/A: In Split Brain CUCA allows us to delete a mailstore
CSCsr42549	messaging	3	email got deleted in Windows mail inbox after user deleted mail from VM
CSCsr46932	messaging	3	Eudora Inbox failed to display the new email after voice mail deleted it
CSCsr47202	messaging	3	A/A: Dispatch Msg. accepted during Split Brain is lost after SBR
CSCsr49615	messaging	3	Windows Mail gets hang when user tries to play the .wav file
CSCsr49951	messaging	3	TUI failed to play the .wav file attachment if it is sent by Eudora
CSCsr54835	messaging	3	TUI failed to play the "Urgent" announcement for high priority emails

Table 1 Connection Release 7.0(1) and Connection in Cisco Unified CMBE 7.0(1) Open Caveats (continued)

Caveat Number	Component	Severity	Description
CSCsr61897	messaging	3	DN: SMTP Proxy addresses are not replicated
CSCsr68352	messaging	3	A/A hostname change - SMTP server not running after change
CSCsr69319	messaging	3	VMO failed to send the message as "High Priority"
CSCsr87402	messaging	3	DN: Messages not routed if SMTP domain name is a subset of other server
CSCsr91942	messaging	3	Recorded name not sent with VPIM message if sender is on another server
CSCsr96306	messaging	3	Restart of MTA is needed after modifying disk capacity setting
CSCsr98786	messaging	3	Disabling SMTP notification does not stop notification
CSCsu02862	messaging	3	Some VPIM blind addresses aren't resolved for Reply All
CSCso21049	mixer	3	"Popping sounds" audible on endpoint when g.722 negotiated
CSCsm81788	ossetup	3	UC 7 upgrade should check for disk space prior to upgrade
CSCso63423	pca	3	CPCA: Cannot delete rule set
CSCsr02191	pca	3	Type wrong file name hangs Media Master, kill app
CSCsr58274	pca	3	PCA gives error when playing back messages stored in G.729a
CSCsr78261	pca	3	Reply function in PCA does not follow COS in secured messaging
CSCsr92149	pca	3	No way to restrict a user from sending a message to SDL from CPCA
CSCsm69727	reports	3	User Message Activity Report spikes CPU for long time when run w/default
CSCsk89864	serviceability	3	SMTP Server needs to be restarted for traces to take effect
CSCsm02178	serviceability	3	Dependency message is not proper for Voice recognition transport service
CSCsm97073	serviceability	3	Dependent services do not come up after restarting Connection DB service
CSCsr27019	serviceability	3	CUC Serviceability web page does not auto-logoff
CSCso07071	telephony	3	Incorrect caller name played when call transferred to connection
CSCsr54216	telephony	3	Media fails reading localized text in UTF-8
CSCsr30437	vui	3	CC: VUI user can't access VPIM contact
CSCsr46453	vui	3	VUI User cannot call Operator

Documentation Updates

Errors

This section lists errors in the current documentation for Cisco Unity Connection and for Connection in Cisco Unified CMBE documentation and gives corrected information. The correct information will be incorporated in a future documentation release, or as otherwise noted.

Cisco Unified Serviceability Administration Guide Release 7.0(1): SNMP Traps and Informs

Added July 13, 2009

In the "SNMP Traps and Informs" section in the "Understanding Simple Network Management Protocol" chapter of the *Cisco Unified Serviceability Administration Guide Release 7.0(1)*, the first note (after the first paragraph) should read as follows:

Note Cisco Unified Communications Manager, Cisco Unified Communications Manager Business Edition, and Cisco Unity Connection support SNMP traps.

Reconfiguration and Upgrade Guide for Cisco Unity Connection: Renaming the 7.x Publisher Server in a Connection Cluster

Added November 19, 2008

The procedure in the "Renaming the 7.x Publisher Server in a Connection Cluster" section of the "Renaming Cisco Unity Connection 7.x Servers" chapter of the *Reconfiguration and Upgrade Guide for Cisco Unity Connection Release 7.x* is incomplete. Use the following procedure instead.

Do the following procedure to change the host name of the publisher server in a Connection cluster.

To Rename the 7.x Publisher Server in a Connection Cluster

Step 1 If Digital Networking is configured, remove the server from the digital network. See the "Using Digital Networking" chapter of the *System Administration Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

Caution Re-adding a server to a digital network can be a time-consuming process. Ensure that you thoroughly understand the work required to re-add a server to a digital network before you begin this procedure.

Step 2 On a DNS server, change the DNS record of the publisher server to the new host name.

Step 3 Confirm that the DNS change propagates to the publisher server. Log on to the publisher server by using an SSH application, and run the following CLI command:

```
utils network host <hostname>
```

Do not proceed if the new host name does not resolve to the correct IP address.

Step 4 Repeat Step 3 on the subscriber server.

Step 5 On the publisher server, change the SMTP domain in Cisco Unity Connection Administration:

a. Expand **System Settings > SMTP Configuration**, and click **Server**.

b. Click **Change SMTP Domain**, and change the value of the SMTP Domain field.

c. Click **Save**.

Step 6 On the publisher server, change the host name of the publisher server in Connection Administration:

a. Expand **System Settings**, and click **Cluster**.

b. Click **Find** to display a list of servers.

c. Click the host name of the server that you want to rename.

d. On the Server Configuration page, change the value of the **Host Name/IP Address** field to the new name.

e. Click **Save**.

Step 7 On the subscriber server, change the name by which the subscriber server knows the publisher server:

a. In Cisco Unified Operating System Administration, from the Settings menu, click **IP > Publisher**.

b. Change the host name of the publisher server.

c. Click **Save**.

d. Log on to the subscriber server by using an SSH application, and run the following CLI command to restart the server:

```
utils system restart
```

Step 8 On the publisher server, change the name of the publisher server in Cisco Unified Operating System Administration.

a. From the Settings menu, click **IP > Ethernet**.

b. Change the host name of the publisher server.

c. Click **Save**. The publisher server automatically restarts.

d. Wait for the publisher server to finish restarting. When you can log on to Connection Administration on the publisher server, continue with Step 9.

Step 9 Log on to the subscriber server by using an SSH application, and run the following CLI command to restart the server:

```
utils system restart
```

Step 10 Wait for the subscriber server to finish restarting. When you can log on to Connection Administration on the subscriber server, continue with Step 11.

Step 11 On the publisher server, run the following CLI command to reset replication:

```
utils dbreplication reset all
```

Step 12 Wait until the replication reset process is complete. To determine when the process is completed:

a. Log on to Real-Time Monitoring Tool (RTMT) by connecting to the publisher server.

b. On the System menu, click **Performance > Open Performance Monitoring**.

c. In the right pane, expand **Number of Replicates Created and State of Replication**, then double-click **Replicate_State**.

d. In the Object Instances dialog box, click **ReplicateCount** and click **Add**.

e. Wait until the value reaches **2.0**.

For more information on possible values and their meaning, right-click **Replicate_State**, and click **Counter Description**.

f. On the File menu, click **Exit** to exit RTMT.

Step 13 Log on to the publisher server by using an SSH application, and run the following CLI command to restart the server:

```
utils system restart
```

This command causes the Connection cluster servers to change server status so the publisher server has the Secondary status and the subscriber server has the Primary status.

Step 14 Run the following CLI command to change the publisher server to Primary status.

```
utils cuc cluster makeprimary name_of_publisher_server
```

Step 15 If the server was part of a digital network before you renamed the server, readd the server to the digital network. See the "Using Digital Networking" chapter of the *System Administration Guide for Cisco Unity Connection Release 7.x* at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html.

System Administration Guide for Cisco Unity Connection: Creating a Calendar Integration with Exchange 2007

Added July 9, 2010

The "Creating a Calendar Integration with Exchange 2007" section in the "Creating Calendar Integrations" chapter of the *System Administration Guide for Cisco Unity Connection Release 7.x* (at http://www.cisco.com/en/US/docs/voice_ip_comm/connection/7x/administration/guide/7xcucsagx.html) incorrectly indicates that you can do a calendar integration with Exchange 2007 Server. Calendar integrations with Exchange 2007 Server are no longer supported in Cisco Unity Connection 7.0(1).

Note however that contact and text to speech integrations are still supported with Exchange 2007 Server.

System Administration Guide for Cisco Unity Connection: Converting Phone Numbers into Extensions

Added November 19, 2008

The procedure in the "Converting Phone Numbers into Extensions" section of the "Integrating Cisco Unity Connection with an LDAP Directory" chapter of the *System Administration Guide for Cisco Unity Connection Release 7.x* gives the wrong format for a regular expression that converts the first four digits of a phone number into an extension. The correct format is:

^[0-9][0-9][0-9][0-9]

System Administration Guide for Cisco Unity Connection: Creating and Installing an SSL Server Certificate

Added November 19, 2008

In the "Creating and Installing an SSL Server Certificate" section in the "Securing Cisco PCA and IMAP Email Client Access to Cisco Unity Connection" chapter of the *System Administration Guide for Cisco Unity Connection Release 7.x*, the task list and two procedures were incorrect, and a procedure was missing. Use the information in this section instead of the information in the *System Administration Guide for Cisco Unity Connection*.

Do the following tasks to create and install an SSL server certificate to secure Cisco Personal Communications Assistant and IMAP email client access to Cisco Unity Connection:

1. If you are using Microsoft Certificate Services to issue certificates, install Microsoft Certificate Services. Do the "To Install the Microsoft Certificate Services Component" procedure on page 48.

   If you are using another application to issue certificates, install the application. See the manufacturer documentation for installation instructions. Then skip to Step 2.

   If you are using an external certification authority to issue certificates, skip to Step 2.

Note If you already have installed Microsoft Certificate Services or another application that can create certificate signing requests, skip this procedure.

2. Create a certificate signing request. Then download the certificate signing request to the server on which you installed Microsoft Certificate Services or another application that issues certificates, or download the request to a server that you can use to send the certificate signing request to an external certification authority (CA). Do the "To Create and Download a Certificate Signing Request" procedure on page 49.
3. If you are using Microsoft Certificate Services to export the root certificate and issue the server certificate, do the "To Export the Root Certificate and Issue the Server Certificate (Only When You Are Using Microsoft Certificate Services to Issue the Certificate)" procedure on page 49.

   If you are using another application to issue the certificate, see the documentation for the application for information on issuing certificates.

   If you are using an external CA to issue the certificate, send the certificate signing request to the external CA. When the external CA returns the certificate, continue with Step 4.
4. Upload the root certificate and the server certificate to the Cisco Unity Connection server. Do the "To Upload the Root and Server Certificates to the Cisco Unity Connection Server" procedure on page 50.
5. Restart the Connection IMAP Server service so that Connection and the IMAP email clients use the new SSL certificates. Do the "To Restart the Connection IMAP Server Service" procedure on page 51.

To Install the Microsoft Certificate Services Component

Step 1 On any server whose DNS name (FQDN) or IP address can be resolved by all client computers that will use the Cisco PCA or that will use an IMAP client to access Cisco Unity Connection voice messages, log on to Windows by using an account that is a member of the local Administrators group.

Step 2 On the Windows Start menu, click **Settings > Control Panel > Add or Remove Programs**.

Step 3 In the left pane of the Add or Remove Programs control panel, click **Add/Remove Windows Components**.

Step 4 In the Windows Components dialog box, check the **Certificate Services** check box. Do not change any other items.

Step 5 When the warning appears about not being able to rename the computer or to change domain membership, click **Yes**.

Step 6 Click **Next**.

Step 7 On the CA Type page, click **Stand-alone Root CA**, and click **Next**. (A stand-alone certification authority (CA) is a CA that does not require Active Directory.)

Step 8 On the CA Identifying Information page, in the Common Name for This CA field, enter a name for the certification authority.

Step 9 Accept the default value in the Distinguished Name Suffix field.

Step 10 For Validity Period, accept the default value of **5 Years**.

Step 11 Click **Next**.

Step 12 On the Certificate Database Settings page, click **Next** to accept the default values.

If a message appears indicating that Internet Information Services is running on the computer and must be stopped before proceeding, click **Yes** to stop the services.

Step 13 If you are prompted to insert the Windows Server 2003 disc into the drive, insert either the Cisco Unity Connection disc, which contains the same required software, or a Windows Server 2003 disc.

Step 14 In the Completing the Windows Components Wizard dialog box, click **Finish**.

Step 15 Close the Add or Remove Programs dialog box.

To Create and Download a Certificate Signing Request

Step 1 Log on to Cisco Unified Operating System Administration.

Step 2 On the Security menu, click **Certificate Management**.

Step 3 On the Certificate List page, click **Generate CSR**.

Step 4 On the Generate Certificate Signing Request page, in the **Certificate Name** list, click **tomcat**.

Step 5 Click **Generate CSR**.

Step 6 When the Status area displays a message that the CSR was successfully generated, click **Close**.

Step 7 On the Certificate List page, click **Download CSR**.

Step 8 On the Download Certificate Signing Request page, in the **Certificate Name** list, click **tomcat**.

Step 9 Click **Download CSR**.

Step 10 In the File Download dialog box, click **Save**.

Step 11 In the Save As dialog box, in the **Save As Type** list, click **All Files**.

Step 12 Save the file **tomcat.csr** to a location on the server on which you installed Microsoft Certificate Services or on a server that you can use to send the CSR to an external certification authority.

Step 13 On the Download Certificate Signing Request page, click **Close**.

To Export the Root Certificate and Issue the Server Certificate (Only When You Are Using Microsoft Certificate Services to Issue the Certificate)

Step 1 On the server on which you installed Microsoft Certificate Services, log on to Windows by using an account that is a member of the Domain Admins group.

Step 2 On the Windows Start menu, click **Programs > Administrative Tools > Certification Authority**.

Step 3 In the left pane, expand **Certification Authority (Local) > <Certification authority name>**, where <Certification authority name> is the name that you gave to the certification authority when you installed Microsoft Certificate Services in the "To Install the Microsoft Certificate Services Component" procedure on page 48.

Step 4 Export the root certificate:

a. Right-click the name of the certification authority, and click **Properties**.

b. On the General tab, click **View Certificate**.

c. Click the **Details** tab.

d. Click **Copy to File**.

e. On the Welcome to the Certificate Export Wizard page, click **Next**.

f. On the Export File Format page, click **Next** to accept the default value of **DER Encoded Binary X.509 (.CER)**.

g. On the File to Export page, enter a path and file name for the .cer file. Choose a network location that you can access from the Cisco Unity Connection server.

Write down the path and file name. You will need it in a later procedure.

h. Follow the onscreen prompts until the wizard has finished the export.

i. Click **OK** to close the Certificate dialog box, and click **OK** again to close the Properties dialog box.

Step 5 Issue the server certificate:

a. Right-click the name of the certification authority, and click **All Tasks > Submit New Request**.

b. Browse to the location of the certificate signing request file that you created in the "To Create and Download a Certificate Signing Request" procedure on page 49, and double-click the file.

c. In the left pane of Certification Authority, click **Pending Requests**.

d. Right-click the pending request that you submitted in b., and click **All Tasks > Issue**.

e. In the left pane of Certification Authority, click **Issued Certificates**.

f. Right-click the new certificate, and click **All Tasks > Export Binary Data**.

g. In the Export Binary Data dialog box, in the Columns that Contain Binary Data list, click **Binary Certificate**.

h. Click **Save Binary Data to a File**.

i. Click **OK**.

j. In the Save Binary Data dialog box, enter a path and file name. Choose a network location that you can access from the Cisco Unity Connection server.

Write down the path and file name. You will need it in a later procedure.

k. Click **OK**.

Step 6 Close Certification Authority.

To Upload the Root and Server Certificates to the Cisco Unity Connection Server

Step 1 Log on to Cisco Unified Operating System Administration.

Step 2 On the Security menu, click **Certificate Management**.

Note If you click **Find** and display a list of the certificates currently installed on the server, you will see an existing, automatically generated, self-signed certificate for Tomcat. That certificate is unrelated to the Tomcat certificates that you upload in this procedure.

Step 3 Upload the root certificate:

a. On the Certificate List page, click **Upload Certificate**.

b. On the Upload Certificate page, in the Certificate Name list, click **tomcat-trust**.

c. Leave the Root Certificate field blank.

d. Click **Browse**, and browse to the location of the root CA certificate.

If you used Microsoft Certificate Services to issue the certificate, this is the location of the root certificate that you exported in the "To Export the Root Certificate and Issue the Server Certificate (Only When You Are Using Microsoft Certificate Services to Issue the Certificate)" procedure on page 49.

If you used an external certification authority to issue the certificate, this is the location of the root CA certificate that you received from the external certification authority.

e. Click the name of the file.

f. Click **Open**.

g. On the Upload Certificate page, click **Upload File**.

h. When the Status area reports that the upload succeeded, click **Close**.

Step 4 Upload the server certificate:

a. On the Certificate List page, click **Upload Certificate**.

b. On the Upload Certificate page, in the Certificate Name list, click **tomcat**.

c. In the Root Certificate field, enter the filename of the root certificate that you uploaded in Step 3.

d. Click **Browse**, and browse to the location of the server certificate.

If you used Microsoft Certificate Services to issue the certificate, this is the location of the server certificate that you issued in the "To Export the Root Certificate and Issue the Server Certificate (Only When You Are Using Microsoft Certificate Services to Issue the Certificate)" procedure on page 49.

If you used an external certification authority to issue the certificate, this is the location of the server certificate that you received from the external certification authority.

e. Click the name of the file.

f. Click **Open**.

g. On the Upload Certificate page, click **Upload File**.

h. When the Status area reports that the upload succeeded, click **Close**.

Step 5 Restart the Tomcat service (the service cannot be restarted from Cisco Unified Serviceability):

a. Log on to the Connection server by using an SSH application.

b. Run the following CLI command to restart the Tomcat service:

```
utils service restart Cisco Tomcat
```

To Restart the Connection IMAP Server Service

Step 1 Log on to Cisco Unity Connection Serviceability.

Step 2 On the Tools menu, click **Service Management**.

Step 3 In the Optional Services section, for the Connection IMAP Server service, click **Stop**.

Step 4 When the Status area displays a message that the Connection IMAP Server service was successfully stopped, click **Start** for the service.

User Moves, Adds, and Changes Guide for Cisco Unity Connection: Creating Cisco Unity Connection Users from LDAP Data by Using the Bulk Administration Tool

Added November 19, 2008

The procedure in the "Creating Cisco Unity Connection Users from LDAP Data by Using the Bulk Administration Tool" section in the "Creating User Accounts from LDAP User Data" chapter of the *User Moves, Adds, and Changes Guide for Cisco Unity Connection Release 7.x* is incorrect. Use the following procedure instead.

To Create Cisco Unity Connection Users by Using the Bulk Administration Tool

Step 1 Log on to Cisco Unity Connection Administration as a user that has the System Administrator role.

Step 2 Expand **Tools** and click **Bulk Administration Tool**.

Step 3 Export the data that is currently in the hidden Cisco Unified CM database on the Connection server:

a. Under Select Operation, click **Export**.

b. Under Select Object Type, click **Users from LDAP Directory**.

c. In the **CSV File** field, enter the full path to the file in which you want to save exported data.

d. Click **Submit**.

Step 4 Open the CSV file in a spreadsheet application or in a text editor, and update the data as applicable. For more information, see the "Using the Cisco Unity Connection Bulk Administration Tool" section.

Step 5 Import the data in the updated CSV file:

a. Log on to Cisco Unity Connection Administration as a user that has the System Administrator role.

b. Expand **Tools** and click **Bulk Administration Tool**.

c. Under Select Operation, click **Create**.

d. Under Select Object Type, click **Users with Mailbox**.

e. In the **CSV File** field, enter the full path to the file from which you want to import data.

f. In the Failed Objects Filename field, enter the full path of the file to which you want Connection to write error messages about users who could not be created.

g. Click **Submit**.

Step 6 When the import is complete, review the file that you specified in the Failed Objects Filename field to verify that all users were created successfully.

Omissions

This section lists new and additional information that is not included in the current documentation for Cisco Unity Connection and for Connection in Cisco Unified Communications Manager Business Edition. The new and additional information will be incorporated in a future documentation release, or as otherwise noted.

Cisco Unified Serviceability Administration Guide Release 7.0(1): SNMP Services

Added July 13, 2009

In the "SNMP Services" section in the "Understanding Simple Network Management Protocol" chapter of the *Cisco Unified Serviceability Administration Guide Release 7.0(1)*, the following row was omitted from Table 15-2, "SNMP Services."

Table 2 SNMP Services

MIB	Service	Window
CISCO-UNITY-MIB	Connection SNMP Agent	**Cisco Unity Connection Serviceability > Tools > Service Management.** Choose a server; then, choose Base Services category.

Cisco Unified Serviceability Administration Guide Release 7.0(1): SNMP Management Information Base (MIB)

Added July 13, 2009

In the "SNMP Management Information Base (MIB)" section in the "Understanding Simple Network Management Protocol" chapter of the *Cisco Unified Serviceability Administration Guide Release 7.0(1)*, the following section was omitted.

CISCO-UNITY-MIB

The CISCO-UNITY-MIB uses the Connection SNMP Agent to get information about Cisco Unity Connection.

To view the CISCO-UNITY-MIB definitions, go to the following link and click **SNMP V2 MIBs**:

http://www.cisco.com/public/sw-center/netmgmt/cmtk/mibs.shtml

Note Cisco Unity Connection supports this MIB. Cisco Unified Communications Manager does not support this MIB.

The Connection SNMP Agent supports the following objects.

Table 3 Cisco-unity-MIB Objects

Object	Description
ciscoUnityTable	This table contains general information about the Cisco Unity Connection servers such as host name and version number.
ciscoUnityPortTable	This table contains general information about the Cisco Unity Connection voice messaging ports.
General Unity Usage Info objects	This group contains information about capacity and utilization of the Cisco Unity Connection voice messaging ports.

Cisco Unified Serviceability Administration Guide Release 7.0(1): Configuring CISCO-UNITY-MIB Trap Parameters

Added July 13, 2009

In the "Configuring SNMP Trap/Inform Parameters" chapter of the *Cisco Unified Serviceability Administration Guide Release 7.0(1)*, the following text should be included as the "Configuring CISCO-UNITY-MIB Trap Parameters" section.

Connection only: The Connection SNMP Agent does not enable trap notifications, though traps can be triggered by Cisco Unity Connection alarms. You can view Cisco Unity Connection alarm definitions in Cisco Unity Connection Serviceability, on the Alarm > Definitions screen.

You can configure trap parameters by using the CISCO-SYSLOG-MIB. See the "Configuring CISCO-SYSLOG-MIB Trap Parameters" section.

Command Line Interface Reference Guide for Cisco Unified Communications Solutions Release 7.0: Utils Commands

The command below should be included in the "Utils Commands" section of the *Command Line Interface Reference Guide for Cisco Unified Communications Solutions Release 7.0*.

utils cuc networking clear_replication (Cisco Unity Connection Only)

This command stops all Digital Networking replication activities occurring on the server.

Command Syntax

utils cuc networking clear_replication

Usage Guidelines

This command stops the Connection Digital Networking Replication Agent, deletes the drop, queue, and pickup replication folders, clears the status of in-progress directory pushes to or pulls from this server, and restarts the Connection Digital Networking Replication Agent. Depending on the size of the replication folders, this operation may take several minutes

Requirements

Command privilege level: 1

Allowed during upgrade: No

User Moves, Adds, and Changes Guide for Cisco Unity Connection: Integrating Existing Cisco Unity Connection User Accounts with LDAP User Accounts

Added March 9, 2009

The following text should be included as the "Integrating Existing Cisco Unity Connection User Accounts with LDAP User Accounts" section in the "Creating User Accounts from LDAP User Data" chapter of the *User Moves, Adds, and Changes Guide for Cisco Unity Connection Release 7.x*.

When you configured Cisco Unity Connection to integrate with an LDAP directory by using the procedures in the "Integrating Cisco Unity Connection with an LDAP Directory" chapter of the *System Administration Guide for Cisco Unity Connection*, you synchronized Connection data with data in the LDAP directory. That process invisibly imported the LDAP data into a cache on the Connection server.

When you use the Bulk Administration Tool to integrate existing Connection users with LDAP users, you:

1. Export the data from the cache into a CSV file.
2. Remove from the CSV file any users who you do not want to synchronize with users in the LDAP directory.

3. Import the updated CSV file into the Connection database, which synchronizes Connection users with LDAP users and sets the LDAP flag in the Connection database.

Caution When you import LDAP user data into the Connection database, existing values for the fields being imported are overwritten with values from the LDAP database.

If you have configured Connection to periodically resynchronize Connection data with LDAP data, new values in the LDAP directory are automatically imported into the Connection database during the next automatic resynchronization. However, if new users have been added to the LDAP directory, this resynchronization does not create new Connection users. You must manually create new Connection users by using either the Import Users tool or the Bulk Administration Tool.

To Integrate Existing Cisco Unity Connection Users with LDAP Users

Step 1 Log on to Cisco Unity Connection Administration as a user that has the System Administrator role.

Step 2 Expand **Tools** and click **Bulk Administration Tool**.

Step 3 Export the data that is currently in the cache on the Connection server:

a. Under Select Operation, click **Export**.

b. Under Select Object Type, click **Users from LDAP Directory**.

c. In the CSV File field, enter the full path to the file in which you want to save exported data.

d. Click **Submit**.

This exports LDAP user data from the cache and sets the LDAP-integrated flag in the CSV file.

Step 4 Edit the CSV file to remove any Connection users who you do not want to synchronize with users in the LDAP directory. For more information, see the "Using the Cisco Unity Connection Bulk Administration Tool" appendix in the *User Moves, Adds, and Changes Guide for Cisco Unity Connection Release 7.x*.

If you want every user in the LDAP directory to be a Connection user, you skip this step.

Step 5 Import the data that you edited in Step 4:

a. Log on to Cisco Unity Connection Administration as a user that has the System Administrator role.

b. Expand **Tools** and click **Bulk Administration Tool**.

c. Under Select Operation, click **Update**.

d. Under Select Object Type, click **Users with Mailbox**.

e. In the CSV File field, enter the full path to the file from which you want to import data.

f. In the Failed Objects Filename field, enter the full path of the file to which you want Connection to write error messages about users who could not be created.

g. Click **Submit**.

Step 6 When the import is complete, review the file that you specified in the Failed Objects Filename field to verify that all Connection users were successfully integrated with the corresponding LDAP users.

User Workstation Setup Guide for Cisco Unity Connection Release 7.x: Creating and Configuring an Account in IBM Lotus Notes

In the "Creating and Configuring an Account in IBM Lotus Notes" section in the "Configuring an Email Account to Access Cisco Unity Connection Voice Messages" chapter of the *User Workstation Setup Guide for Cisco Unity Connection Release 7.x*, the following information was omitted:

When using Lotus Notes version 7.x to access Connection voice messages, you must first configure Notes to connect to a Domino account before configuring the Connection account.

Obtaining Documentation and Submitting a Service Request

For information on obtaining documentation, submitting a service request, and gathering additional information, see the monthly *What's New in Cisco Product Documentation*, which also lists all new and revised Cisco technical documentation, at:

http://www.cisco.com/en/US/docs/general/whatsnew/whatsnew.html

Subscribe to the *What's New in Cisco Product Documentation* as a Really Simple Syndication (RSS) feed and set content to be delivered directly to your desktop using a reader application. The RSS feeds are a free service and Cisco currently supports RSS version 2.0.

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