Configure Deskphone Control

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Prerequisites

The Cisco CTIManager service must be running in the Cisco Unified Communications Manager cluster.

Configure Deskphone Control Taskflow

Procedure

	Command or Action	Purpose
Step 1	Enable Device for CTI, on page 2	Allows Cisco Jabber desktop clients to control the desk phone of the user.
Step 2	Configure Desk Phone Video, on page 2.	Let users receive video transmitted to their desk phone devices on their computers through the client.
Step 3	Enable Video Rate Adaptation, on page 3	The client uses video rate adaptation to negotiate optimum video quality.
Step 4	Configure User Associations, on page 5	Associate users with devices and assign users to access control groups.
Step 5	Reset Devices, on page 6	You must reset devices after you configure user associations.

Enable Device for CTI

If you want Cisco Jabber desktop clients to be able to control the desk phone of the user, you must select the **Allow Control of Device from CTI** option when you create the device for the user.

Procedure

Step 1 In Cisco Unified CM Administration, click **Device** > **Phone** and search for the phone.

Step 2 In the **Device Information** section, check **Allow Control of Device from CTI**.

Step 3 Click **Save**.

Configure Desk Phone Video

Desk phone video capabilities let you receive the video signal on your laptop and the audio signal on your desk phone. Physically connect your computer to the desk phone through the computer port for the client to establish a connection to the Jabber client. You cannot use this feature with a wireless connection to your desk phone.

Note If you have both wireless and wired connections available, configure Microsoft Windows to not prioritize wireless connections over wired connections. See Microsoft's *An explanation of the Automatic Metric feature for Internet Protocol routes* for more information.

First, download and install Jabber Desk Phone Video Services Interface from Cisco.com. Jabber Desk Phone Video Services Interface provides the Cisco Discover Protocol (CDP) driver. CDP enables the client to:

- Discover the desk phone.
- Establish and maintain a connection to the desk phone using the Cisco Audio Session Tunnel (CAST) protocol.

Desk Phone Video Considerations

Review the following considerations and limitations before you set up the desk phone video feature:

- You cannot have more than one video device connected with CAST. You cannot use a desk phone with a built-in camera with this feature. If your desk phone has a local USB camera, remove it before using this feature.
- You cannot use this feature with devices that do not support CTI.
- You cannot use both video screen sharing, using the BFCP protocol, and desk phone video.
- It is not possible for endpoints that use SCCP to receive video only. SCCP endpoints must send and receive video. Instances where SCCP endpoints do not send a video signal result in audio only calls.

- 7900 series phones must use SCCP for desk phone video capabilities. 7900 series phones cannot use SIP for desk phone video capabilities.
- If you start a call from a desk phone's keypad, the call starts as an audio call on the desk phone. Jabber then escalates the call to video. For this reason, you cannot make video calls to devices that do not support the escalation, such as H.323 endpoints. To use this feature with devices that do not support escalation, begin calls from the Jabber client.
- A compatibility issue exists with Cisco Unified IP Phones that use firmware version SCCP45.9-2-1S. Upgrade your firmware to version SCCP45.9-3-1 to use this feature.
- Some antivirus or firewall applications, such as Symantec EndPoint Protection, block inbound CDP packets. This blockage disables desk phone video. Configure your antivirus or firewall application to allow inbound CDP packets.

  See the following Symantec technical document for more details about this issue: *Cisco IP Phone version 7970 and Cisco Unified Video Advantage is Blocked by Network Threat Protection*.
- Do not select the **Media Termination Point Required** check box on the SIP trunk configuration for Cisco Unified Communications Manager (Unified CM). That setting disables desk phone video.

Procedure

Step 1 Physically connect your computer to the computer port on your desk phone.

Step 2 Enable the desk phone for video in Unified CM.

Step 3 Install Jabber Desk Phone Video Services Interface on your computer.

Troubleshooting Desk Phone Video

If you encounter an error that indicates desk phone video capabilities are unavailable or the desk phone device is unknown, do the following:

1. Ensure you enable the desk phone device for video in Cisco Unified Communications Manager.
2. Reset the physical desk phone.
3. Exit the client.
4. Run services.msc on the computer where you installed the client.
5. Restart Jabber Desk Phone Video Services Interface from the Services tab of the Windows Task Manager.
6. Restart the client.

Enable Video Rate Adaptation

The client uses video rate adaptation to negotiate optimum video quality. Video rate adaptation dynamically increases or decreases video quality based on network conditions.

To use video rate adaptation, you must enable Real-Time Transport Control Protocol (RTCP) on Cisco Unified Communications Manager.

Note RTCP is enabled on software phone devices by default. However, you must enable RTCP on desk phone devices.

Enable RTCP on Common Phone Profiles

You can enable RTCP on a common phone profile to enable video rate adaptation on all devices that use the profile.

Note RTCP is an integral component of Jabber Telephony services. Jabber will continue to send RTCP packets even when disabled.

Procedure

Step 1 Open the **Cisco Unified CM Administration** interface.

Step 2 Select **Device** > **Device Settings** > **Common Phone Profile**.

The **Find and List Common Phone Profiles** window opens.

Step 3 Specify the appropriate filters in the **Find Common Phone Profile where** field and then select **Find** to retrieve a list of profiles.

Step 4 Select the appropriate profile from the list.

The **Common Phone Profile Configuration** window opens.

Step 5 Locate the **Product Specific Configuration Layout** section.

Step 6 Select **Enabled** from the **RTCP** drop-down list.

Step 7 Select **Save**.

Enable RTCP on Device Configurations

You can enable RTCP on specific device configurations instead of a common phone profile. The specific device configuration overrides any settings you specify on the common phone profile.

Procedure

Step 1 Open the **Cisco Unified CM Administration** interface.

Step 2 Select **Device** > **Phone**.

The **Find and List Phones** window opens.

Step 3 Specify the appropriate filters in the **Find Phone where** field and then select **Find** to retrieve a list of phones.

Step 4 Select the appropriate phone from the list.

The **Phone Configuration** window opens.

Step 5 Locate the **Product Specific Configuration Layout** section.

Step 6 Select **Enabled** from the **RTCP** drop-down list.

Step 7 Select **Save**.

Configure User Associations

When you associate a user with a device, you provision that device to the user.

Before you begin

Create and configure Cisco Jabber devices.

Procedure

Step 1 Open the **Cisco Unified CM Administration** interface.

Step 2 Select **User Management** > **End User**.

The **Find and List Users** window opens.

Step 3 Specify the appropriate filters in the **Find User where** field and then select **Find** to retrieve a list of users.

Step 4 Select the appropriate user from the list.

The **End User Configuration** window opens.

Step 5 Locate the **Service Settings** section.

Step 6 Select the appropriate service profile for the user from the **UC Service Profile** drop-down list.

Step 7 Locate the **Device Information** section.

Step 8 Select **Device Association**.

The **User Device Association** window opens.

Step 9 Select the devices to which you want to associate the user. Jabber only supports a single softphone association per device type. For example, only one TCT, BOT, CSF, and TAB device can be associated with a user.

Step 10 Select **Save Selected/Changes**.

Step 11 Select **User Management** > **End User** and return to the **Find and List Users** window.

Step 12 Find and select the same user from the list.

The **End User Configuration** window opens.

Step 13 Locate the **Permissions Information** section.

Step 14 Select **Add to Access Control Group**.

The **Find and List Access Control Groups** dialog box opens.

Step 15 Select the access control groups to which you want to assign the user.

At a minimum you should assign the user to the following access control groups:

- **Standard CCM End Users**
- **Standard CTI Enabled**

Remember If you are provisioning users with secure phone capabilities, do not assign the users to the **Standard CTI Secure Connection** group.

Certain phone models require additional control groups, as follows:

- Cisco Unified IP Phone 9900, 8900, or 8800 series or DX series, select **Standard CTI Allow Control of Phones supporting Connected Xfer and conf**.
- Cisco Unified IP Phone 6900 series, select **Standard CTI Allow Control of Phones supporting Rollover Mode**.

Step 16 Select **Add Selected**.

The **Find and List Access Control Groups** window closes.

Step 17 Select **Save** on the **End User Configuration** window.

Reset Devices

After you create and associate users with devices, you should reset those devices.

Procedure

Step 1 Open the **Cisco Unified CM Administration** interface.

Step 2 Select **Device** > **Phone**.

The **Find and List Phones** window opens.

Step 3 Specify the appropriate filters in the **Find Phone where** field and then select **Find** to retrieve a list of devices.

Step 4 Select the appropriate device from the list.

The **Phone Configuration** window opens.

Step 5 Locate the **Association Information** section.

Step 6 Select the appropriate directory number configuration.

The **Directory Number Configuration** window opens.

Step 7 Select **Reset**.

The **Device Reset** dialog box opens.

Step 8 Select **Reset**.

Step 9 Select **Close** to close the **Device Reset** dialog box.