Auto-Attendant

- Auto-Attendant Overview, page 1
- Cisco Unity Connection Configuration, page 2
- Cisco Unified CCX Configuration, page 7
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Auto-Attendant Overview

Auto-Attendant allows callers to locate people in your organization without talking to a receptionist. You can customize the prompts that are played for the caller.

Auto-Attendant works with Cisco Unified Communications Manager to receive calls on specific telephone extensions. The software interacts with the caller and allows the caller to search for and select the extension of the party (in your organization) that the caller is trying to reach.

Auto-Attendant provides the following functions:

- Answers a call
- Plays a user-configurable welcome prompt
- Plays a main menu prompt that asks the caller to perform one of three actions:
  - Press 0 for the operator
  - Press 1 to enter an extension number
  - Press 2 to spell by name

If the caller chooses to spell by name (by pressing 2), the system compares the letters that are entered with the names that are configured to the available extensions. One of the following results can occur:

- If a match exists, the system announces a transfer to the matched user and waits for up to 2 seconds for the caller to press any Dual Tone Multifrequency (DTMF) key to stop the transfer. If the caller does not stop the transfer, the system performs an explicit confirmation: it prompts the user for confirmation of the name and transfers the call to the primary extension of that user.
- If more than one match occurs, the system prompts the caller to choose the correct extension.
If too many matches occur, the system prompts the caller to enter more characters.

If no match occurs, that is, if the user presses wrong options, the system prompts that the user pressed the wrong options and prompts the user to press the correct options.

- When the caller specifies the destination, the system transfers the call.
- If the line is busy or not in service, the system informs the caller accordingly and replays the main menu prompt.

Auto-Attendant solution can be deployed in three different ways as follows using different Cisco products that can provide interactive voice response functionality.

- Auto-Attendant using Cisco Unity Connection (CUC); the most widely used Auto-Attendant solution configuration by customers
- Auto-Attendant using Cisco Unified Contact Center Express (Unified CCX)
- Auto-Attendant using Cisco Unity Express (CUE)

### Cisco Unity Connection Configuration

The Cisco Unity Connection server provides Automated-Attendant functionality for both external and internal callers. An Auto-Attendant allows callers to be automatically transferred to an extension without the intervention of an operator or receptionist.

Auto-Attendants offer a menu system; it may also allow a caller to reach a live operator by dialing a number, usually "0". Multiple Auto-Attendants may be implemented to support individual site locations. Within Cisco Unity Connection, an Auto-Attendant is a customized application tree structure that is built by creating and linking multiple Call Handlers together. The Auto-Attendant is defined by entry and exit points, and intermediate routing decisions based upon the callers DTMF input choices.


### Cisco Unity Connection Configuration Task Flow

You can use this task flow to configure auto-attendant using Cisco Unity Connection:

**Procedure**

<table>
<thead>
<tr>
<th>Command or Action</th>
<th>Purpose</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Step 1</strong> Configure CTI Route Point, on page 3</td>
<td>Perform this task on the Cisco Unified CM Administration. Create a CTI Route Point which maps to the Direct-Inward Dial (DID) number of the company (board number).</td>
</tr>
</tbody>
</table>
## Command or Action | Purpose
---|---
**Step 2** Configure Auto-Attendant System Call Handler, on page 4 | Call handlers answer calls, greet callers with recorded prompts, provide callers with information and options, route calls, and take messages. **Note** You can customize the greeting for the AutoAttendant Call Handler by choosing *Edit > Greetings*. For more information about customizing greetings, see the *System Administration Guide for Cisco Unity Connection* at [http://www.cisco.com/c/en/us/support/unified-communications/unity-connection/products-maintenance-guides-list.html](http://www.cisco.com/c/en/us/support/unified-communications/unity-connection/products-maintenance-guides-list.html).

**Step 3** Configure Caller Input Option, on page 4 | Caller input options enables you to designate a single digit to represent a user extension, alternate contact number, call handler, interview handler, or directory handler. The caller presses a single key during a call handler greeting instead of entering the full extension, and Cisco Unity Connection responds accordingly. Several different keys configured as caller input options offers the callers a menu of choices in the call handler greeting.

**Step 4** Configure Extension for Operator Call Handler, on page 5 | Configure an extension for the operator to allow callers to speak to an operator during a call handler greeting.

**Step 5** Modify Standard Call Transfer Rule for Operator, on page 6 | Modify the Standard Call Transfer Rule to enable the call to be transferred to the operator when the caller presses 0 to speak to an operator.

**Step 6** Update Default System Transfer Restriction Table, on page 6 | Update the Default System Transfer restriction table. The Default System Transfer restriction table restricts numbers that can be used for Caller system transfers, which allow unidentified callers to transfer to a number that they specify.

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### Configure CTI Route Point

**Procedure**

**Step 1** From Cisco Unified CM Administration, choose Device > CTI Route Point. The Find and List CTI Route Points window is displayed.

**Step 2** Click Add New. The CTI Route Point Configuration window is displayed.

**Step 3** In the Device Name field, enter a device name for the route point.

**Step 4** From the Device Pool drop-down list, choose Default.

**Step 5** Click Save. The Add successful message is displayed.

**Step 6** From the Association area, click Line [1] - Add a new DN.
The Directory Number Configuration window is displayed.

**Step 7** In the Directory Number field, enter the directory number that matches with the DID of the company.

**Step 8** From the Route Partition drop-down list, choose the required route partition.

**Step 9** From the Call Forward and Call Pickup Settings area, for Forward All, choose the appropriate calling search space and check the Voice Mail check box.

**Step 10** Click Save.

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**What to Do Next**

Configure Auto-Attendant System Call Handler, on page 4

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**Configure Auto-Attendant System Call Handler**

**Before You Begin**

Ensure that you Configure CTI Route Point, on page 3

**Procedure**

**Step 1** From Cisco Unity Connection Administration, from the Cisco Unity Connection tree on the left, navigate to Call Management and choose System Call Handlers. The Search Call Handlers window is displayed.

**Step 2** Click Add New.

The New Call Handler window is displayed.

**Step 3** In the Display Name field, enter AutoAttendant.

**Step 4** In the Extension field, enter the same extension that you provided for the CTI Route Point.

**Step 5** Click Save.

The Edit Call Handler Basics (AutoAttendant) window is displayed.

**Step 6** Edit the required fields and click Save.

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**What to Do Next**

Configure Caller Input Option, on page 4

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**Configure Caller Input Option**

**Before You Begin**

Ensure that you:

- Configure CTI Route Point, on page 3
- Configure Auto-Attendant System Call Handler, on page 4
Procedure

Step 1 From Cisco Unity Connection Administration, from the Cisco Unity Connection tree on the left, navigate to Call Management and choose System Call Handlers. The Search Call Handlers window is displayed.

Step 2 Click AutoAttendant. The Edit Call Handler Basics (AutoAttendant) window is displayed.

Step 3 Choose Edit > Caller Inputs. The Caller Input window is displayed.

Step 4 In the Key column, click 0. The Edit Caller Input (0) window is displayed.

Step 5 Click the Call Handler radio button, choose Operator from the drop-down list, and click the Attempt Transfer radio button.

Step 6 Click Save. The Updated Caller Input status message is displayed.

Step 7 Choose Edit > Caller Inputs. The Caller Input window is displayed.

Step 8 In the Key column, click 1. The Edit Caller Input (0) window is displayed.

Step 9 In the Conversation radio button, choose Caller System Transfer from the drop-down list.

Step 10 Click Save. The Updated Caller Input status message is displayed.

What to Do Next

Configure Extension for Operator Call Handler, on page 5

Configure Extension for Operator Call Handler

Before You Begin

Ensure that you:

- Configure CTI Route Point, on page 3
- Configure Auto-Attendant System Call Handler, on page 4
- Configure Caller Input Option, on page 4

Procedure

Step 1 From Cisco Unity Connection Administration, from the Cisco Unity Connection tree on the left, navigate to Call Management and choose System Call Handlers. The Search Call Handlers window is displayed.

Step 2 Click Operator.
The Edit Call Handler Basics (Operator) window is displayed.

**Step 3** Enter the extension of the operator in the **Extension** field and click **Save**.
The Updated Caller Input status message is displayed.

What to Do Next
Modify Standard Call Transfer Rule for Operator, on page 6

Modify Standard Call Transfer Rule for Operator

**Before You Begin**
Ensure that you:

- Configure CTI Route Point, on page 3
- Configure Auto-Attendant System Call Handler, on page 4
- Configure Caller Input Option, on page 4
- Configure Extension for Operator Call Handler, on page 5

**Procedure**

**Step 1** From Cisco Unity Connection Administration, from the Cisco Unity Connection tree on the left, navigate to **Call Management** and choose **System Call Handlers**.
The Search Call Handlers window is displayed.

**Step 2** Click **Operator**.
The Edit Call Handler Basics (Operator) window is displayed.

**Step 3** From the **Edit** menu, choose **Transfer Rules**.
The Transfer Rules window is displayed.

**Step 4** Click **Standard**.
The Edit Transfer Rule (Standard) window is displayed.

**Step 5** In the **Transfer Calls to** option, click the **Extension** radio button and enter the configured operator extension number.

**Step 6** Click **Save**.

What to Do Next
Update Default System Transfer Restriction Table, on page 6

Update Default System Transfer Restriction Table

**Before You Begin**
Ensure that you:
Procedure

**Step 1**
From Cisco Unity Connection Administration, from the Cisco Unity Connection tree on the left, navigate to System Settings and choose Restriction Tables. The Search Restriction Tables window is displayed.

**Step 2**
Click Default System Transfer. The Edit Restriction Table Basics (Default System Transfer) window is displayed.

**Step 3**
Uncheck the check box in the Blocked column for 6 in the Order column.

**Step 4**
Click Save.

Cisco Unity Connection Auto-Attendant Troubleshooting

For information about troubleshooting Auto-Attendant using Cisco Unity Connection, see the following:


Cisco Unified CCX Configuration

Auto-Attendant comes standard with the five-seat bundle of Cisco Unified Contact Center Express (Unified CCX).

**Note**

**Cisco Unified CCX Prerequisites**

- Install and configure Cisco Unified CCX before you can use Auto-Attendant. Cisco Unified CCX controls the software and its connection to the telephony system.
- Configure users on Cisco Unified Communications Manager.

**Cisco Unified CCX Auto-Attendant Task Flow**


**Before You Begin**

- Learn more about the Auto-Attendant feature by reviewing *Auto-Attendant Overview*, on page 1.
- Learn more about Cisco UCCX with Auto-Attendant functionality by reviewing *Cisco Unified CCX Configuration*, on page 7.
- Review *Cisco Unified CCX Prerequisites*, on page 8.

**Procedure**

<table>
<thead>
<tr>
<th>Command or Action</th>
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</tr>
</thead>
<tbody>
<tr>
<td><strong>Step 1</strong> Configure Unified CM Telephony call control groups.</td>
<td>The Unified CCX system uses Unified CM Telephony call control groups to pool together a series of CTI ports, which the system uses to serve calls as they arrive or depart from the Unified CCX server.</td>
</tr>
<tr>
<td><strong>Step 2</strong> Add a Cisco Media Termination (CMT) dialog control group.</td>
<td>The Cisco Media subsystem is a subsystem of the Unified CCX Engine. The Cisco Media subsystem manages the CMT media resource. CMT channels are required for Unified CCX to be able to play or record media. The Cisco Media subsystem uses dialog groups to organize and share resources among applications. A dialog group is a pool of dialog channels in which each channel is used to perform dialog interactions with a caller, during which the caller responds to automated prompts by pressing buttons on a touch-tone phone.</td>
</tr>
<tr>
<td>Command or Action</td>
<td>Purpose</td>
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<tr>
<td>---------------------------</td>
<td>-------------------------------------------------------------------------</td>
</tr>
<tr>
<td>Caution</td>
<td>All media termination strings begin with “auto” and contain the same ID as the call control group—not the CMT dialog group. Perform this procedure if the default media termination is configured and the ID differs.</td>
</tr>
<tr>
<td>Step 3</td>
<td>Configure a Cisco script application.</td>
</tr>
<tr>
<td></td>
<td>The Unified CCX script applications are applications that are based on scripts created in the Unified CCX Editor. These applications come with every Unified CCX system and executes scripts that are created in the Unified CCX Editor.</td>
</tr>
<tr>
<td>Step 4</td>
<td>Provision a Unified CM Telephony trigger.</td>
</tr>
<tr>
<td></td>
<td>A Unified CM Telephony trigger responds to calls that arrive on a specific route point by selecting telephony and media resources to serve the call and invoking an application script to handle the call.</td>
</tr>
<tr>
<td>Step 5</td>
<td>Customize Auto-Attendant.</td>
</tr>
<tr>
<td></td>
<td>• Modify an existing Auto-Attendant instance</td>
</tr>
<tr>
<td></td>
<td>• Configure the Auto-Attendant prompts</td>
</tr>
<tr>
<td></td>
<td>The Cisco Unified CCX Administration page allows you to modify any existing Auto-Attendant instance as necessary. Cisco Unified CCX allows you to customize the Auto-Attendant prompts from the Cisco Unified CCX Administration Media Configuration window. It allows you to record the welcome prompt, configure the welcome prompt, and upload a spoken name.</td>
</tr>
</tbody>
</table>

**What to Do Next**

If you have any problems configuring Cisco Unified CCX, see Cisco Unified CCX Auto-Attendant Troubleshooting, on page 9.

**Cisco Unified CCX Auto-Attendant Troubleshooting**

For information about troubleshooting Auto-Attendant using Cisco Unified CCX, see http://docwiki.cisco.com/wiki/List_of_Troubleshooting_Tips_for_Unified_CCX_7.0#/Cisco_Unified_Communications_Manager_Automated_Attendant (applicable only for Windows version).

**Cisco Unity Express Configuration**


**Cisco Unity Express Auto-Attendant Troubleshooting**