Immediate Divert

The Immediate Divert feature allows you to immediately divert a call to a voice-messaging system. When the call gets diverted, the line becomes available to make or receive new calls.

Although Immediate Divert is not available to CTI applications, the CTI feature Transfer to Voicemail performs the same function as Immediate Divert but performs the function for CTI applications that third-party developers develop.

Access the Immediate Divert feature by using the iDivert softkey. Configure this softkey by using the Softkey Template Configuration window of Cisco Unified CallManager Administration. The softkey template gets assigned to phones that are in the Cisco Unified CallManager system.

This chapter provides the following information about Immediate Divert:

Introducing Immediate Divert

You will find that Immediate Divert, a Cisco Unified CallManager supplementary service, is available for general use within the system. Immediate Divert does not require the user to log in to make the iDivert softkey available on the phone.

The call that is being diverted can be in the call offering, call on hold, or call active state. The call can be incoming or outgoing. The person on the call that is being diverted will receive the greeting of the voice-messaging system of the person who diverted the call.

Immediate Divert coexists with the Transfer to Voicemail feature.

System Requirements for Immediate Divert

Immediate Divert requires the following software component to operate:

- Cisco Unified CallManager 5.0

The following SCCP and SIP phones support Immediate Divert by using the iDivert softkey that is configured in any Cisco Unified CallManager softkey template:

- Cisco Unified IP Phones (Models 7905, 7911, 7912, 7920, 7940, 7941, 7960, 7961, 7970, 7971)

The following voice-messaging systems support Immediate Divert:

- Voice-messaging systems such as Unity that use the skinny protocol
- Voice-messaging systems such as Octel that use SMDI

Call-Processing Requirements for Immediate Divert

The following sections describe call-processing requirements for Immediate Divert:

- Softkey Requirements, page 11-2
- Incoming Calls Requirements, page 11-3
- Outgoing Calls Requirements, page 11-3

Softkey Requirements

Because the iDivert softkey does not automatically get configured in a softkey template, use the Softkey Template Configuration window in Cisco Unified CallManager Administration to configure the iDivert softkey in any available softkey template. You can configure the iDivert softkey in the following call states:

- On hook
- Connected
- On hold
- Ring in

Note The ring-in state in the softkey template represents the call-offering state in the phone call state.

Use the Phone Configuration window in Cisco Unified CallManager Administration to assign the softkey template that contains the iDivert softkey to a phone.

For information about softkey template configuration, see Softkey Template Configuration in the *Cisco Unified CallManager Administration Guide*. For information about assigning softkey templates to phones, see Cisco Unified IP Phone Configuration in the *Cisco Unified CallManager Administration Guide*.

Incoming Calls Requirements

The following list gives called party types in the call-forwarding chain that Immediate Divert supports:

- Party A calls party B.
- Party B forwards to party C.
- Party C forwards to party D.

Party B represents the original called party. Party C represents the last redirecting party. Party D represents the last called party.

Immediate Divert supports the following incoming call states:

- Call offering
- Call on hold
- Call active

A voice-messaging profile can represent either a specified voice-messaging profile or a default voice-messaging profile. (Choose default voice-messaging profiles by choosing None in the Voice Messaging Profile drop-down list box in the Directory Number Configuration window.)

A voice-messaging pilot in the voice-messaging profile identifies the voice-messaging system to which redirected calls go. The combination of a directory number and voice-messaging mask defines the voice-messaging mail box.

For information about voice messaging, see Cisco Voice-Mail Pilot Configuration and Voice-Mail Profile Configuration in the *Cisco Unified CallManager Administration Guide*, and Voice Mail Connectivity to Cisco Unified CallManager in the *Cisco Unified CallManager System Guide*.

Outgoing Calls Requirements

Immediate Divert supports the following outgoing call states:

- Call on hold
- Call active

When the calling party presses the iDivert softkey, Immediate Divert redirects an outgoing call to a voice-messaging mail box that is specified in the voice-messaging profile that is associated with the calling party, regardless of the voice-messaging profiles of the original or last called parties.

For information about voice messaging, see Cisco Voice-Mail Pilot Configuration and Voice-Mail Profile Configuration in the *Cisco Unified CallManager Administration Guide*, and Voice Mail Connectivity to Cisco Unified CallManager in the *Cisco Unified CallManager System Guide*.

Immediate Divert Phone Display Messages

Immediate Divert displays the following messages on the IP phone to indicate the status of an immediate divert action:

- Key is not active—The voice-messaging profile of the user who pressed iDivert does not have a voice-messaging pilot.
- Temporary failure—The voice-messaging system does not work, or a network problem exists.
- Busy—The voice-messaging system is busy.

Using Immediate Divert

The following scenarios provide examples of using the Immediate Divert feature.

Called Party Presses iDivert Softkey

1. Party A calls Manager A.
2. Manager A presses the iDivert softkey (call-offering state).
3. Immediate Divert diverts the call to Manager A voice-messaging mail box.
4. Party A receives the voice-messaging mail box greeting of Manager A.

Voice-Messaging Profile of an Original Called Party Does Not Have Voice-Messaging Pilot

1. Party A calls Party B.
2. The call gets forwarded to the personal line of Assistant B.
3. Assistant B presses the iDivert softkey (call-offering state).
4. Immediate Divert diverts the call to Assistant B voice-messaging mail box. Party B does not have a voice-messaging pilot number configured, but Assistant B does.
5. Party A receives the voice-messaging mail box greeting of Assistant B.

Manager A Forwards a Call to Manager B

1. Party A calls Manager A.
2. Manager A has line forwarded to Manager B.
3. Manager B presses the iDivert softkey (call-offering state).
4. Immediate Divert diverts the call to Manager B voice-messaging mail box because Manager B line associates with a default voice-messaging profile with a voice-messaging pilot and the last called party.
5. Party A receives the voice-messaging mail box greeting of Manager B.

Voice-Messaging Port Defined in a Voice-Messaging Profile is Busy

1. Party A calls Party B.
2. Party B presses the iDivert softkey (call offering state).
3. Immediate Divert cannot divert the call to the voice-messaging mail box because the voice-messaging port is busy.
4. Party B sees the message Busy on the IP phone.
5. The original call remains in the call-offering state.

Calling Party Calls a Call Center That Uses a Hunt Pilot Number

1. Party A calls Hunt List A.
2. Hunt List A member presses the iDivert softkey (call offering state).
3. Immediate Divert cannot divert the call to the voice-messaging mail box because Hunt List A does not have a voice-messaging profile.
4. Hunt List A member sees the message Key is Not Active on the IP phone.

Calling Party B Transfers a Call to Party C on Different Cisco Unified CallManager Cluster

1. Party A calls Party B.
2. Party B transfers the call to Party C on a different Cisco Unified CallManager cluster.
3. Party C answers the incoming call.
4. Party C presses the iDivert softkey.
5. Party A receives the voice-messaging mail box greeting of Party C.

Interactions and Restrictions

The following sections describe the interactions and restrictions for Immediate Divert:

Interactions

The following sections describe how Immediate Divert interacts with Cisco Unified CallManager applications and call processing:

Multilevel Precedence and Preemption (MLPP)

The following interactions occur between Immediate Divert and MLPP:

- Immediate Divert diverts calls to voice-messaging mail boxes regardless of the type of call (for example, a precedence call).
- When Alternate Party Diversion (call precedence) is activated, Call Forward No Answer (CFNA) also gets deactivated.

Call Forward

When the Forward No Answer setting on the Directory Number Configuration window is not configured, call forward uses the clusterwide CFNA timer service parameter, Forward No Answer Timer. If a user presses the iDivert softkey at the same time as the call is being forwarded, the call gets diverted to an assigned call forward directory number (because the timer was too short), not the voice-messaging mail box. To solve this situation, set the CFNA timer service parameter to a sufficient time (for example, 60 seconds).

Call Detail Records (CDR)

One CDR gets created for each iDivert invocation. Immediate Divert uses the text “Immediate Divert” for the “Onbehalf of” field in CDR.

Conference

When a conference participant presses the iDivert softkey, the remaining conference participants receive the voice-messaging mail box greeting of the Immediate Divert initiator. Conference types include Ad Hoc, Meet-Me, Barge, cBarge, and Join.

Hunt List

When you use a phone that is part of a line group in a hunt list and it has the iDivert softkey assigned to it, the system grays out the iDivert softkey and makes it not available when the phone receives a call from within the hunt list.

When the phone receives a call that is not associated with a hunt list, the iDivert softkey displays on the phone.

Restrictions

The following restrictions apply to Immediate Divert:

- Immediate Divert does not support QSIG devices (MGCP PRI QSIG T1 gateways and MGCP PRI QSIG E1 gateways).
- When Call Forward All (CFA) and Call Forward Busy (CFB) are activated, the system does not support Immediate Divert (CFA and CFB have precedence over Immediate Divert).
- Immediate Divert cannot divert a call to a busy voice-messaging port; however, voice-messaging ports can be members of a route/hunt list, thus reducing the busy port scenario.
- A member of a hunt list cannot invoke the iDivert softkey for a direct call because a hunt list does not have a voice-messaging profile. The message, Key is Not Active, displays on the IP phone.
- When Cisco Unified CallManager goes down, users cannot receive voice messages unless a media path was established between a redirected party and the voice-messaging system before the Cisco Unified CallManager went down.
- System does not support using Malicious Caller ID and Immediate Divert together.
- CTI applications do not have Immediate Divert available (applications use Transfer to Voicemail).
- Use the Call Park Display Timer service parameter to control the timer for the Immediate Divert text display on the IP phones. When the service parameter gets changed, the text display timer for Immediate Divert also gets changed.
- See the “Multilevel Precedence and Preemption (MLPP)” section on page 11-5 for restrictions about using MLPP.
- A race condition in connection with the Forward No Answer Timeout exists when the iDivert softkey gets pressed. For example, if a manager presses the iDivert softkey right after the Forward No Answer timeout, call forward will forward the call to a preconfigured directory number. However, if the manager presses the iDivert softkey before the Forward No Answer timeout, Immediate Divert diverts the call to the voice-messaging mail box of the manager.

- The calling and called parties can divert the call to their voice-messaging mail boxes if both take turns pressing the iDivert softkey. The voice-messaging mail box of the calling party would contain a portion of the outgoing greeting of the called party. Similarly, the voice-messaging mail box of the called party would contain a portion of the outgoing greeting of the calling party.
- When one participant in a conference presses the iDivert softkey, all remaining participants will receive an outgoing greeting of the participant who pressed iDivert. Conference types include Meet-Me, Ad Hoc, cBarge and Join.

Installing and Activating Immediate Divert

Immediate Divert, a system feature, comes standard with Cisco Unified CallManager software. Immediate Divert does not require special installation.

Configuring Immediate Divert

This section contains the following information:

Immediate Divert Configuration Checklist

Table 11-1 provides a checklist to configure Immediate Divert.

Table 11-1 Immediate Divert Configuration Checklist

Configuration Steps		Related procedures and topics
Step 1	Change the Call Park Display Timer if the default is not appropriate.	Setting the Service Parameter for Immediate Divert, page 11-8
Step 2	Using the Directory Number Configuration window, associate a voice-mail profile to each user who will have access to Immediate Divert. **Note** This step assumes that voice-mail profiles and pilots are configured. See Configuring a Voice-Mail Profile and Configuring the Voice-Mail Pilot Number.	Configuring a Directory Number, *Cisco Unified CallManager Administration Guide*
Step 3	Assign the iDivert softkey to the Standard User or Standard Feature softkey template. Assign the softkey in the On Hook, Connected, On Hold, and Ring In states.	Softkey Template Configuration, *Cisco Unified CallManager Administration Guide*

Table 11-1 Immediate Divert Configuration Checklist (continued)

Configuration Steps		Related procedures and topics
Step 4	Using the Phone Configuration window, assign the Standard User or Standard Feature softkey template, to which you added the iDivert softkey, to each device that has Immediate Divert access. **Tip** To make the iDivert softkey available to many users, configure a softkey template with the iDivert softkey; then, assign that softkey template to a device pool and, finally, assign that device pool to all users who need iDivert.	Configuring Cisco Unified IP Phones, *Cisco Unified CallManager Administration Guide*
Step 5	Notify users that the Immediate Divert feature is available.	Refer to the phone documentation for instructions on how users access Immediate Divert on their Cisco Unified IP Phone.

Setting the Service Parameter for Immediate Divert

Immediate Divert uses the Cisco Unified CallManager clusterwide service parameter Call Park Display Timer. The default for this service parameter specifies 10 seconds. Use the Call Park Display Timer service parameter to control the timer for the Immediate Divert text display on the IP phones. When the service parameter gets changed, the text display timer for Immediate Divert also gets changed. Set this timer for each server in a cluster that has the Cisco CallManager service and Immediate Divert configured.

For information about text displays, see the "Immediate Divert Phone Display Messages" section on page 11-3.

Where to Find More Information

Additional Cisco Documentation

- Cisco Unified IP Phone administration documentation for Cisco Unified CallManager
- Cisco Unified IP Phone user documentation

Additional Information

See the "Related Topics" section on page 11-8.

Related Topics

- Cisco Unified IP Phone Configuration, *Cisco Unified CallManager Administration Guide*
- Softkey Template Configuration, *Cisco Unified CallManager Administration Guide*
- Cisco Voice-Mail Pilot Configuration, *Cisco Unified CallManager Administration Guide*
- Voice-Mail Profile Configuration, *Cisco Unified CallManager Administration Guide*
- Voice Mail Connectivity to Cisco Unified CallManager, *Cisco Unified CallManager System Guide*