



## Switch Overview

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Each contact center device (ACD, PBX, or VRU) communicates with an Unified ICM Peripheral Gateway (PG). The PG reads status information from the device and passes it back to the Unified ICM software. The PG runs one or more Peripheral Interface Manager (PIM) processes, which are the software components that communicate with proprietary ACD systems. One PIM is required for each peripheral to which the PG will interface, so if you have two identical ACDs, your PG requires two PIMs.

A single PG can serve multiple peripherals of the same kind. For example, one computer with an Aspect PG and several Aspect PIMs can serve several Aspect ACDs in the contact center. Another PG and PIM on the same computer can serve an VRU.



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**Note** A single PG can support both ACD PIMs and VRU PIMs, though the ACD PIMs must all be of the same kind.

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This chapter provides an overview of how the PG interfaces with ACDs in a contact center environment.

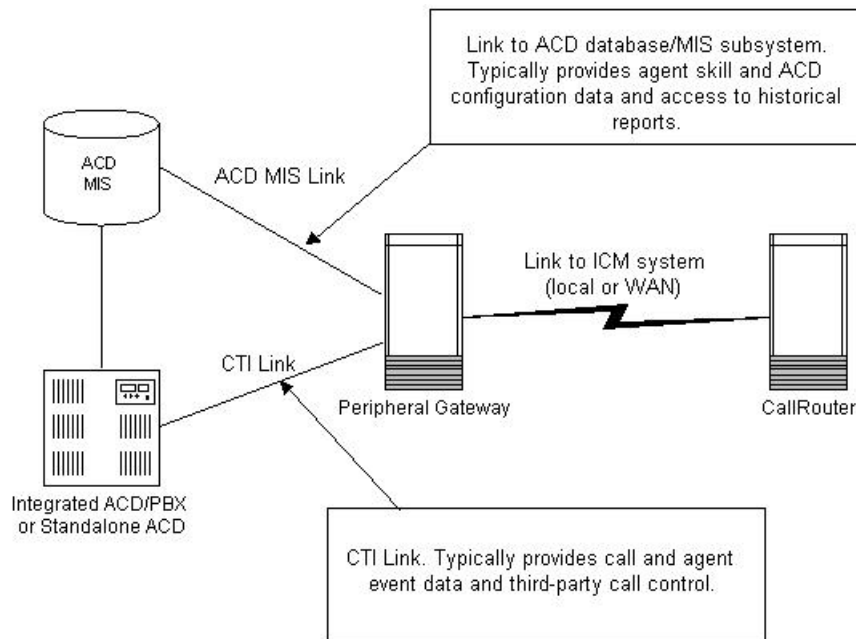
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## PG-to-Peripheral Connections

Each contact center peripheral (ACD, PBX, or VRU) requires a connection to a Cisco Peripheral Gateway (PG). The Peripheral Gateway provides a software interface between ACD, PBX, and VRU systems and the Unified ICM routing software.

The PG connects to a peripheral via the peripheral's computer telephony integration (CTI) link. In some cases, the PG also connects to the peripheral's MIS subsystem. The MIS subsystem can be on a separate hardware platform or it can be integrated with the ACD, PBX, or VRU. The relationship of the Peripheral Gateway to an ACD system is shown in the following figure.

Figure 1: Peripheral Gateway ACD/PBX Interface



Through the CTI link, the PG monitors changes in agent status, calculates call handling performance statistics, and forwards events to the CallRouter. The MIS connection provides additional information such as the mapping of individual agents to skill types and the current status of agents (either by themselves or relative to a given agent group or skill group). Typical agent states include Logged In, Ready, Talking In, Talking Out, and Work Not Ready. The MIS link also provides the Unified ICM system with ACD configuration data and historical reports.

Each PG has one or more connections to the peripheral. The type of connection used depends on the type of peripheral. For example, some ACDs use a TCP/IP Ethernet connection, while others require X.25 links. Refer to the Cisco Unified ICM Software Supported Switches (ACDs) documentation for more information.

## Supported ACD Switches

To ensure that your ACD software version is compatible with Unified ICM software, refer to the Cisco Unified ICM ACD PG Supportability Matrices document [http://www.cisco.com/c/dam/en/us/td/docs/voice\\_ip\\_comm/cust\\_contact/contact\\_center/ipcc\\_enterprise/compatibility\\_matrix/icmacdmx.pdf](http://www.cisco.com/c/dam/en/us/td/docs/voice_ip_comm/cust_contact/contact_center/ipcc_enterprise/compatibility_matrix/icmacdmx.pdf). This document contains the latest information on Unified ICM switch support.



### Note

For more details on how ACDs interface with the Unified ICM software, see the appropriate Cisco Unified ICM software ACD Supplement. The ACD Supplements provide more technical details on the ICM-to-ACD interface than is provided in this document.