



Release Notes for Cisco Unity Bridge Release 3.0(1)

Published September 5, 2003

These release notes describe download instructions, new and changed support, new and changed functionality, limitations and restrictions, and open and resolved caveats for Cisco Unity[™] Bridge Release 3.0(1).

Access the latest Bridge software upgrades on the Cisco Unity Bridge Software Download page at <http://www.cisco.com/cgi-bin/tablebuild.pl/unity-bridge>.

Contents

These release notes contain the following sections:

- [System Requirements, and Supported Hardware and Software, page 2](#)
- [Determining the Software Version, page 2](#)
- [Downloading the Cisco Unity Bridge Software and Required Service Packs, page 4](#)
- [Upgrading to Cisco Unity Bridge 3.0\(1\) from 2.x, page 4](#)
- [New and Changed Support—Release 3.0\(1\), page 5](#)
- [New and Changed Functionality—Release 3.0\(1\), page 6](#)
- [Installation Note, page 8](#)
- [Limitations and Restrictions, page 8](#)
- [Caveats, page 9](#)
- [Cisco Unity Documentation, page 10](#)
- [Obtaining Documentation, page 10](#)
- [Obtaining Technical Assistance, page 11](#)
- [Obtaining Additional Publications and Information, page 12](#)



Corporate Headquarters:

Cisco Systems, Inc., 170 West Tasman Drive, San Jose, CA 95134-1706 USA

Copyright © 2003 Cisco Systems, Inc. All rights reserved.

System Requirements, and Supported Hardware and Software

The following documents list the most current Cisco Unity Bridge requirements and are available on Cisco.com:

- *Cisco Unity Bridge 3.0 System Requirements, and Supported Hardware and Software* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/sysreq/30bsysrq.htm.
- *Cisco Unity Networking Options Requirements (With Microsoft Exchange)* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/sysreq/netrq.htm.
- *Compatibility Matrix: Required and Recommended Third-Party Service Packs and Updates* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/cmptblty/svpckmx.htm.

Determining the Software Version

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

- [Cisco Unity Bridge](#)
- [Cisco Unity](#)
- [Cisco Unity Voice Connector for Microsoft Exchange](#)

Cisco Unity Bridge

To Determine the Cisco Unity Bridge Version in Use

-
- Step 1** On the Bridge server, open the Bridge Administrator.
- Step 2** Click **About**. The About Cisco Unity Bridge page displays the Bridge version.
-

Cisco Unity

To Determine the Cisco Unity Version in Use by Using the Cisco Unity Administrator

In the Cisco Unity Administrator, go to the **System > Configuration > Software Versions** page. The Cisco Unity version is displayed in the Cisco Unity Build Number field.

To Determine the Cisco Unity Version in Use by Using the AvCsMgr.exe File (Cisco Unity 3.0(4) and Later)

-
- Step 1** Browse to the **CommServer** directory.
- Step 2** Right-click **AvCsMgr.exe**, and click **Properties**.
-

- Step 3** In the Properties window, click the **Version** tab.
- Step 4** In the Item Name list, click **Product Version**. The Cisco Unity version is displayed in the Value window.

Cisco Unity Voice Connector for Microsoft Exchange

This section contains two procedures. Do the procedure for your version of Cisco Unity.

To Determine the Voice Connector Version in Use: Cisco Unity 4.0 and Later, Voice Connector 10.0 and Later

- Step 1** Log on to the Exchange server on which the Voice Connector is installed.
- Step 2** In Windows Explorer or My Computer, browse to the applicable directory:

Exchange 2000 or Exchange 2003	<ExchangeServerPath>\VoiceGateway\Bin
Exchange 5.5	<ExchangeServerPath>\Connect\Voice\Bin

- Step 3** Right-click **GwIvc.exe**, and click **Properties**.
- Step 4** Click the **Version** tab in the Properties window.
- Step 5** In the Item Name box, click **Product Version** to view the product version in the Value box.

To Determine the Voice Connector Version in Use: Cisco Unity 3.0 Through 3.1

- Step 1** Log on to the Exchange server on which the Voice Connector is installed.
- Step 2** In Windows Explorer or My Computer, browse to the applicable directory:

Exchange 2000	<ExchangeServerPath>\VoiceGateway\Bin\LocalizedFiles\ENU
Exchange 5.5	<ExchangeServerPath>\Voice\Bin\LocalizedFiles\ENU

- Step 3** Right-click **SetupRes.dll**, and click **Properties**.
- Step 4** In the Properties window, click the **Version** tab to view the File Version.

Downloading the Cisco Unity Bridge Software and Required Service Packs

The Bridge software, Microsoft Windows 2000 Server Service Pack 3, Microsoft Internet Explorer 6 Service Pack 1, and MSXML with Service Pack 1—all of which are required on a new Bridge server or to upgrade to Bridge version 3.0(1)—are available for download from the Cisco Software Center website. Use a computer with a high-speed Internet connection.

To Download the Bridge Software and Required Service Packs

Step 1 Confirm that the computer you are using has enough hard disk space:

Bridge software	13 MB for the download file and 20 MB for the extracted files.
Cisco Unity Service Packs CD 1	1 GB for the download file and for the extracted files.

Step 2 Go to the Cisco Unity Bridge Software Download page at <http://www.cisco.com/cgi-bin/tablebuild.pl/unity-bridge>.

Step 3 Download the file **CiscoUnityBridge3.0.1.exe** to the directory of your choice.

Step 4 Go to the Cisco Unity 4.0 Software Download page at <http://www.cisco.com/cgi-bin/tablebuild.pl/unity-40>.

Step 5 Download the file **CiscoUnity4.0-ServicePacks-ENU-CD1.exe** to the directory of your choice.

Step 6 Double-click **CiscoUnityBridge3.0.1.exe**, and follow the on-screen prompts to extract the files to the directory of your choice on a network drive or on the Bridge server, or to a writeable compact disc.

Step 7 Double-click **CiscoUnity4.0-ServicePacks-ENU-CD1.exe**, and follow the on-screen prompts to extract the files to the directory of your choice on a network drive or on the Bridge server, or to a writeable compact disc.

Step 8 Delete the files **CiscoUnityBridge3.0.1.exe** and **CiscoUnity4.0-ServicePacks-ENU-CD1.exe** to free hard disk space.

If you are installing the Bridge software for the first time, refer to the *Cisco Unity Bridge Installation Guide, Release 3.0* at

http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/big/big30/index.htm.

Upgrading to Cisco Unity Bridge 3.0(1) from 2.x

For instructions on upgrading to Bridge version 3.0(1) from Bridge 2.x, refer to the “Upgrading Bridge Networking” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* on Cisco.com at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

New and Changed Support—Release 3.0(1)

This section contains information on new and changed support in the Cisco Unity Bridge Release 3.0(1) time frame only. Refer to the release notes of the applicable version for information about new and changed support with earlier versions of the Bridge. Release notes for all versions of the Bridge are available at http://www.cisco.com/en/US/products/sw/voicesw/ps2237/prod_release_notes_list.html.

MSXML 3.0 with Service Pack 1 Is Required

MSXML 3.0 with Service Pack 1 is required for Cisco Unity Bridge versions 3.0(1) and later.

The *Cisco Unity Bridge Installation Guide, Release 3.0* has been updated to reflect the change for installing the Cisco Unity Bridge. The *Cisco Unity Bridge Networking Guide, Release 3.0* reflects the change for upgrading from earlier versions of the Cisco Unity Bridge.

Required Versions of Cisco Unity and the Voice Connector

Bridge version 3.0(1) is supported only with Cisco Unity 4.0(3) and later and Cisco Unity Voice Connector for Microsoft Exchange 11.0(1) and later. In installations with multiple Cisco Unity servers, all the servers must be upgraded to Cisco Unity 4.0(3).



Caution

Do not upgrade the Bridge server to version 3.0(1) unless you also plan to upgrade all Cisco Unity servers and the Voice Connector to the required versions. If you upgrade the Bridge server without upgrading Cisco Unity and the Voice Connector, messaging between the Bridge and Cisco Unity will fail. Refer to the “Upgrading Bridge Networking” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* for information on upgrading the Bridge Networking option, including the Bridge server. The guide is available at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

Note that the Bridge Networking option changed significantly in Cisco Unity 4.0(3) with Bridge 3.0(1) and provides many new features. See the “New and Changed Functionality—Release 3.0(1)” section on page 6.

Windows Hot Fix Described in Microsoft Security Bulletin MS03-007 and Microsoft Knowledge Base Article 815021 Is Required

The Windows hot fix described in Microsoft Security Bulletin MS03-007 and Microsoft Knowledge Base Article 815021 is required for Cisco Unity Bridge versions 3.0(1) and later.

The *Cisco Unity Bridge Installation Guide, Release 3.0* has been updated to reflect the change for installing the Cisco Unity Bridge. The *Cisco Unity Bridge Networking Guide, Release 3.0* reflects the change for upgrading from earlier versions of the Cisco Unity Bridge.

New and Changed Functionality—Release 3.0(1)

This section contains information on new and changed functionality for Cisco Unity Bridge Release 3.0(1) only. Refer to the release notes of the applicable version for information about new and changed functionality in earlier versions of the Bridge. Release notes for all versions of the Bridge are available at http://www.cisco.com/en/US/products/sw/voicesw/ps2237/prod_release_notes_list.html.

Bridge Networking Enhancements

The Bridge Networking option changed significantly in Cisco Unity 4.0(3) with Bridge 3.0(1) to provide the following features:

- One Cisco Unity bridgehead server can be configured for messaging with multiple Bridge servers.
- A Cisco Unity bridgehead server combined with a Bridge server (or servers) can represent the serial number of each Avaya Octel server whose subscribers have migrated to Cisco Unity. Up to 998 Octel nodes can be represented.
- The Cisco Unity numbering plan is independent of and not constrained by the numbering plan of the Octel systems that the Bridge communicates with. The extensions for Cisco Unity subscribers who have migrated from Octel do not have to be the same as the mailbox numbers that the subscribers had on the Octel system before migrating to Cisco Unity.
- Cisco Unity supports Octel network addresses, so Octel subscribers address messages to Cisco Unity subscribers who have migrated by using the same network addresses as they did previous to the migration.
- Messages sent from Cisco Unity subscribers who have migrated from an Octel system appear to come from their former Octel network address, so reconfiguration of the existing Octel servers is not required.
- The Avaya Interchange has been added to the list of supported voice messaging systems. (The Avaya Interchange is supported only with Cisco Unity 4.0(3) and later with Bridge 3.0(1) and later.)

For details on the new Bridge Networking features, refer to “Cisco Unity with Exchange: Bridge Networking Enhancements” in the “New and Changed Functionality—Release 4.0(3)” section of *Release Notes for Cisco Unity Release 4.0(3)* at

http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/unity40/relnote/cu403rn.htm.

Cisco Unity Bridge Bulk Node Utility

A command line utility, the Cisco Unity Bridge Bulk Node utility, is available for download from the Cisco Unity Tools website at <http://www.ciscounitytools.com>. With the Bulk Node utility, you can create, modify, and delete Unity or Octel nodes on the Bridge server by using information from a comma-separated value (CSV) file. For details on the Bulk Node utility, refer to the Readme.htm file that is included with the utility.

Designate Ports on the Cisco Unity Bridge Server for Incoming Calls Only

The Line Status page in the Bridge Administrator has been enhanced to allow you to specify whether a phone line connected to the Bridge server is to be used for both incoming and outgoing calls or only for incoming calls. For more information, refer to Bridge Administrator Help or to the “Reference: Settings on the Bridge Server” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

License File Required on the Cisco Unity Bridge Server

In Cisco Unity 4.0(3) and later with Bridge 3.0(1) and later, a license file is required for the Bridge server. In previous versions, a license file with Bridge ports enabled was required for the Cisco Unity server configured for Bridge Networking (referred to as the bridgehead server). As of Cisco Unity 4.0(3), a license file with Bridge ports enabled is not required on the Cisco Unity bridgehead server.

You obtain the license file for the Bridge server by completing registration information on Cisco.com. Shortly after registration, Cisco e-mails the license file. The e-mail from Cisco contains instructions on how to save and store the file. Specific instructions for installing the license file are provided in the “Setting Up Cisco Unity and the Bridge for Networking” chapter and the “Upgrading Bridge Networking” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm. The following information is required during registration:

- The MAC address (physical address) for the network interface card (NIC) in the Bridge server.
- The product authorization key (PAK), which appears on the sticker located on the front of the sleeve for the Bridge CD jewel case or serial number card.

Do the following two procedures in the order listed.

To Get the MAC Address of the Bridge Server

-
- Step 1** Open a Command Prompt window on the Bridge server. (On the Windows Start menu, click **Programs > Accessories > Command Prompt**.)
- Step 2** In the Command Prompt window, enter **ipconfig /all**, and press **Enter**.
- Step 3** Write down the value of Physical Address, excluding the hyphens, or save it to a file that you can access during online registration. (For example, if the physical address is 00-A1-B2-C3-D4-E5, record 00A1B2C3D4E5.)
- If the server contains more than one NIC, one value will appear for each NIC. Use the value for the primary NIC.
- Step 4** Close the Command Prompt window.
-

To Register and Obtain the License File

-
- Step 1** Browse to the applicable registration site (URLs are case sensitive):

Registered user on Cisco.com	http://www.cisco.com/go/license
Not a registered user on Cisco.com	http://www.cisco.com/go/license/public

- Step 2** In the Voice Products section, under Cisco Unity Software, click the Cisco Unity Bridge link.
- Step 3** Enter the requested information, and click **Submit**.
- Step 4** Shortly after registration, you will receive an e-mail with the Bridge license file.
- If license files are lost, it can take up to one business day to get another copy.

If you do not receive the license files within 1 hour or to get another copy of a license file, call the Cisco Technical Assistance Center (TAC) and ask for the Licensing Team:

In the U.S.	800 553-2447
Outside the U.S.	For your local Cisco TAC phone number, refer to the website http://www.cisco.com/warp/public/687/Directory/DirTAC.shtml .

Or send e-mail to licensing@cisco.com.

You will need to provide information to verify Cisco Unity Bridge ownership—for example, the purchase order number or the PAK (which appears on the sticker located on the front of the sleeve for the Bridge CD).

Queue Viewer

The Queue Status page has been added to the Bridge Administrator. The page allows you to monitor status information in the outbound message queue on the Bridge server. The status information displayed includes the number of normal and urgent messages that are in the queue for each Octel node, and the number of analog lines currently in use for sending messages to each Octel node. For more information, refer to Bridge Administrator Help or to the “Reference: Settings on the Bridge Server” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

Installation Note

For detailed information on installing the Cisco Unity Bridge, refer to the *Cisco Unity Bridge Installation Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/big/big30/index.htm.

For detailed information on configuring Bridge Networking, refer to the *Cisco Unity Bridge Networking Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

Limitations and Restrictions

Refer to the “Notable Behavior” section in the “About Bridge Networking” chapter of the *Cisco Unity Bridge Networking Guide, Release 3.0* at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/bridge30/bnet/bnet30/index.htm.

Caveats

This section describes severity 1, 2, and select severity 3 caveats.

If you have an account with Cisco.com, you can use Bug Toolkit to find more information on the caveat in this section, in addition to caveats of any severity for any release. Bug Toolkit is available at the website http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl.

Note that this section contains caveat information for Cisco Unity Bridge Release 3.0(1) only. Refer to the release notes of the applicable version for caveat information for earlier versions of the Bridge.

Release notes for all versions of the Bridge are available at http://www.cisco.com/en/US/products/sw/voicesw/ps2237/prod_release_notes_list.html.

Open Caveat—Release 3.0(1)

Table 1 Cisco Unity Bridge Release 3.0(1) Open Caveat

Caveat Number	Severity	Description
CSCdz75011	3	<p>Cisco Unity Bridge analog port appears to be in a locked state after playing analog message to remote Octel. This behavior has been observed on Cisco Unity Bridge server running Network Associates McAfee NetShield Anti-Virus software. The anti-virus software can cause an otherwise gracefully handled error condition to hang.</p> <p>Workaround</p> <p>The exact conflict between the McAfee anti-virus software and error handling of Cisco Unity Bridge and/or Brooktrout software is unknown at this time.</p> <p>When running McAfee anti-virus software on the Cisco Unity Bridge, set exclusions for on-access scanning of both in and out scanning for the Bridge folder. Be sure to include all files and subdirectories.</p> <p>To clear the condition, restart the Unity Bridge service on the Bridge server. If the Unity Bridge service will not stop, reboot the Bridge server.</p>

Resolved Caveats—Release 3.0(1)

Table 2 Cisco Unity Bridge Release 3.0(1) Resolved Caveats

Caveat Number	Severity	Description
CSCdz89183	3	Intermittent analog call failures are being observed on the Cisco Unity Bridge when receiving inbound messages from remote Octel servers.

Table 2 Cisco Unity Bridge Release 3.0(1) Resolved Caveats (continued)

Caveat Number	Severity	Description
CSCeb61746	3	Fax transmissions from Octel Serenade server to the Cisco Unity Bridge fail periodically.
CSCea35313	3	<p>The Cisco Unity Bridge receives a call from a remote Octel node, but hangs up immediately. The sf logs show that the calling Octel sent an initial handshake packet of 'CD'.</p> <p>The Bridge now logs the following warning to the Windows Event Log:</p> <p>Event Type: Warning Event Source: Bridge Event Category: None Event ID: 108</p> <p>Bridge received an incoming call that could not be processed. The calling server does not have a Serial Number defined in its Bridge node profile. Verify that all remote servers configured to communicate with Bridge have Serial Numbers for all Bridge nodes.</p>

Cisco Unity Documentation

For descriptions and URLs of Cisco Unity documentation on Cisco.com, refer to *About Cisco Unity Documentation*. The document is shipped with Cisco Unity and is available at http://www.cisco.com/univercd/cc/td/doc/product/voice/c_unity/about/aboutdoc.htm.

Obtaining Documentation

Cisco provides several ways to obtain documentation, technical assistance, and other technical resources. These sections explain how to obtain technical information from Cisco Systems.

Cisco.com

You can access the most current Cisco documentation on the World Wide Web at this URL:

<http://www.cisco.com/univercd/home/home.htm>

You can access the Cisco website at this URL:

<http://www.cisco.com>

International Cisco websites can be accessed from this URL:

http://www.cisco.com/public/countries_languages.shtml

Documentation CD-ROM

Cisco documentation and additional literature are available in a Cisco Documentation CD-ROM package, which may have shipped with your product. The Documentation CD-ROM is updated regularly and may be more current than printed documentation. The CD-ROM package is available as a single unit or through an annual or quarterly subscription.

Registered Cisco.com users can order a single Documentation CD-ROM (product number DOC-CONDOCCD=) through the Cisco Ordering tool:

http://www.cisco.com/en/US/partner/ordering/ordering_place_order_ordering_tool_launch.html

All users can order annual or quarterly subscriptions through the online Subscription Store:

<http://www.cisco.com/go/subscription>

Ordering Documentation

You can find instructions for ordering documentation at this URL:

http://www.cisco.com/univercd/cc/td/doc/es_inpk/pdi.htm

You can order Cisco documentation in these ways:

- Registered Cisco.com users (Cisco direct customers) can order Cisco product documentation from the Networking Products Marketplace:
<http://www.cisco.com/en/US/partner/ordering/index.shtml>
- Nonregistered Cisco.com users can order documentation through a local account representative by calling Cisco Systems Corporate Headquarters (California, USA) at 408 526-7208 or, elsewhere in North America, by calling 800 553-NETS (6387).

Documentation Feedback

You can submit comments electronically on Cisco.com. On the Cisco Documentation home page, click **Feedback** at the top of the page.

You can send your comments in e-mail to bug-doc@cisco.com.

You can submit comments by using the response card (if present) behind the front cover of your document or by writing to the following address:

Cisco Systems
Attn: Customer Document Ordering
170 West Tasman Drive
San Jose, CA 95134-9883

We appreciate your comments.

Obtaining Technical Assistance

For all customers, partners, resellers, and distributors who hold valid Cisco service contracts, the Cisco Technical Assistance Center (TAC) provides 24-hour, award-winning technical support services, online and over the phone. Cisco.com features the Cisco TAC website as an online starting point for technical assistance.

Cisco TAC Website

The Cisco TAC website (<http://www.cisco.com/tac>) provides online documents and tools for troubleshooting and resolving technical issues with Cisco products and technologies. The Cisco TAC website is available 24 hours a day, 365 days a year.

Accessing all the tools on the Cisco TAC website requires a Cisco.com user ID and password. If you have a valid service contract but do not have a login ID or password, register at this URL:

<http://tools.cisco.com/RPF/register/register.do>

Opening a TAC Case

The online TAC Case Open Tool (<http://www.cisco.com/tac/caseopen>) is the fastest way to open P3 and P4 cases. (Your network is minimally impaired or you require product information). After you describe your situation, the TAC Case Open Tool automatically recommends resources for an immediate solution. If your issue is not resolved using these recommendations, your case will be assigned to a Cisco TAC engineer.

For P1 or P2 cases (your production network is down or severely degraded) or if you do not have Internet access, contact Cisco TAC by telephone. Cisco TAC engineers are assigned immediately to P1 and P2 cases to help keep your business operations running smoothly.

To open a case by telephone, use one of the following numbers:

Asia-Pacific: +61 2 8446 7411 (Australia: 1 800 805 227)

EMEA: +32 2 704 55 55

USA: 1 800 553-2447

For a complete listing of Cisco TAC contacts, go to this URL:

<http://www.cisco.com/warp/public/687/Directory/DirTAC.shtml>

TAC Case Priority Definitions

To ensure that all cases are reported in a standard format, Cisco has established case priority definitions.

Priority 1 (P1)—Your network is “down” or there is a critical impact to your business operations. You and Cisco will commit all necessary resources around the clock to resolve the situation.

Priority 2 (P2)—Operation of an existing network is severely degraded, or significant aspects of your business operation are negatively affected by inadequate performance of Cisco products. You and Cisco will commit full-time resources during normal business hours to resolve the situation.

Priority 3 (P3)—Operational performance of your network is impaired, but most business operations remain functional. You and Cisco will commit resources during normal business hours to restore service to satisfactory levels.

Priority 4 (P4)—You require information or assistance with Cisco product capabilities, installation, or configuration. There is little or no effect on your business operations.

Obtaining Additional Publications and Information

Information about Cisco products, technologies, and network solutions is available from various online and printed sources.

- The Cisco Product Catalog describes the networking products offered by Cisco Systems, as well as ordering and customer support services. Access the Cisco Product Catalog at this URL:

http://www.cisco.com/en/US/products/products_catalog_links_launch.html

- Cisco Press publishes a wide range of networking publications. Cisco suggests these titles for new and experienced users: Internetworking Terms and Acronyms Dictionary, Internetworking Technology Handbook, Internetworking Troubleshooting Guide, and the Internetworking Design Guide. For current Cisco Press titles and other information, go to Cisco Press online at this URL:
<http://www.ciscopress.com>
- Packet magazine is the Cisco quarterly publication that provides the latest networking trends, technology breakthroughs, and Cisco products and solutions to help industry professionals get the most from their networking investment. Included are networking deployment and troubleshooting tips, configuration examples, customer case studies, tutorials and training, certification information, and links to numerous in-depth online resources. You can access Packet magazine at this URL:
<http://www.cisco.com/go/packet>
- iQ Magazine is the Cisco bimonthly publication that delivers the latest information about Internet business strategies for executives. You can access iQ Magazine at this URL:
<http://www.cisco.com/go/iqmagazine>
- Internet Protocol Journal is a quarterly journal published by Cisco Systems for engineering professionals involved in designing, developing, and operating public and private internets and intranets. You can access the Internet Protocol Journal at this URL:
http://www.cisco.com/en/US/about/ac123/ac147/about_cisco_the_internet_protocol_journal.html
- Training—Cisco offers world-class networking training. Current offerings in network training are listed at this URL:
<http://www.cisco.com/en/US/learning/index.html>

CCVP, the Cisco logo, and the Cisco Square Bridge logo are trademarks of Cisco Systems, Inc.; Changing the Way We Work, Live, Play, and Learn is a service mark of Cisco Systems, Inc.; and Access Registrar, Aironet, BPX, Catalyst, CCDA, CCDP, CCIE, CCIP, CCNA, CCNP, CCSP, Cisco, the Cisco Certified Internetwork Expert logo, Cisco IOS, Cisco Press, Cisco Systems, Cisco Systems Capital, the Cisco Systems logo, Cisco Unity, Enterprise/Solver, EtherChannel, EtherFast, EtherSwitch, Fast Step, Follow Me Browsing, FormShare, GigaDrive, HomeLink, Internet Quotient, IOS, iPhone, IP/TV, iQ Expertise, the iQ logo, iQ Net Readiness Scorecard, iQuick Study, LightStream, Linksys, MeetingPlace, MGX, Networking Academy, Network Registrar, *Packet*, PIX, ProConnect, ScriptShare, SMARTnet, StackWise, The Fastest Way to Increase Your Internet Quotient, and TransPath are registered trademarks of Cisco Systems, Inc. and/or its affiliates in the United States and certain other countries.

All other trademarks mentioned in this document or Website are the property of their respective owners. The use of the word partner does not imply a partnership relationship between Cisco and any other company. (0705R)

Copyright © 2003 Cisco Systems, Inc. All rights reserved.

