HA_IFINDEX Messages

This section contains high availability system messages.

Error Message `%HA_IFINDEX-2-INIT_ERROR: [chars]`

Explanation This is a critical error message about a high availability system initilization status or condition. A message of this type indicates that a failure occurred during high availability system initialization.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HARDWARE Messages

This section contains hardware resources messages.

HARDWARE-3

Error Message `%HARDWARE-3-ASICNUM_ERROR: Port-ASIC number [dec] is invalid`

Explanation Each port ASIC is identified by an ID. The port ASIC number that is specified in the message text is invalid. This condition indicates an internal error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HARDWARE-3-INDEX_ERROR: Index value [dec] is invalid`

Explanation An index was attempted to be placed into the hardware table, but that index is out of the configured range.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HARDWARE-3-INTRNUM_ERROR: Port-ASIC Interrupt number [dec] is invalid`

Explanation An interrupt ID that was used for a port ASIC is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HARDWARE-3-PORTNUM_ERROR: port number [dec] is invalid`

Explanation Each interface in a given port ASIC is identified by an index value. The port number used is not within the specified range.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HARDWARE-3-STATS_ERROR: Statistics ID [dec] is invalid`

Explanation Each statistic that is supported by the port ASIC is identified using an ID. The ID provided by the caller is not within the configured range.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HA_WD Messages

This section contains high availability system messages.

HA_WD-3

Error Message `%HA_WD-3-DM_SEND_PULSE: [chars]: could not send priority pulse to receiver: [chars]`

Explanation An attempt to send a priority pulse to the receiver has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-3-PROCFS_PASS: [chars]: procfs pass ended in error after five consecutive passes`

Explanation A call to the wd_procfs_per_process() function ended in error after five consecutive passes.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-3-PTHRD_SETDETACHSTATE: [chars]: could not set detach state of`
`a POSIX thread: [chars]`

Explanation An internal error was detected when trying to set the detach state of a POSIX thread.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-3-PTHRD_SETSCHEDPARAM: [chars]: could not set scheduler param`
`of a POSIX thread: [chars]`

Explanation An internal error was detected when trying to set the scheduler parameter of a POSIX
thread.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-3-RESTART_WDSYSMON: [chars]: Error returned from`
`sysmgr_restart_self() [chars]`

Explanation An error was returned from the sysmgr_restart_self API.

Copy the message exactly as it appears on the console or in the system log. Research and attempt to
resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages,
these tools and utilities will supply clarifying information. Search for resolved software issues using the
Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require
assistance, open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative

and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HA_WD-6

Error Message `%HA_WD-6-BLOCKED_THREAD: A default priority thread CPU starvation condition was detected`

Explanation Some higher priority threads are blocking the CPU.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-6-CPU: [chars]`

Explanation The CPU is blocked by one or more high priority threads.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HA_WD-6-DLK: [chars]`

Explanation An unresolved process or Cisco IOS scheduler deadlock was detected.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HA_WD-7

Error Message `%HA_WD-7-GUARD_WORD_CORRUPTED: [chars]: [chars] guard word corrupted [hex]`

Explanation The named control block guard word was corrupted.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HDLC Messages

This section contains high-level data link control (HDLC) messages.

HDLC-1

Error Message `%HDLC-1-ISSU_NOMEMORY: Unit [dec], no memory for [chars]`

Explanation The requested operation could not be accomplished because of a low-memory condition.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

HDLC-4

Error Message `%HDLC-4-ISSU_INCOMPATIBLE: hdlc-issu-compat: returned FALSE`

Explanation The compatibility checking has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HDLC-4-ISSU_SENDFAILED: HDLC ISSU: send message failed, rc = [dec]

Explanation An attempt to send a message has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HDLC-4-ISSU_XFORM: [chars]: failed, rc=[chars]

Explanation The transform has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
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following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HLFM Messages

This section contains Forwarding Manager messages.

HLFM-3

Error Message `%HLFM-3-MACFREE_ERROR: MAC address [enet], vlad [dec] is still referenced; cannot free`

Explanation An attempt was made to free a MAC address before all references to it had been released.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HLFM-3-MAP_ERROR: IP address [IP_address] not in mac tables, mac-address [enet], vlan [dec]`

Explanation The IP address and MAC address tables have lost their synchronization.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HLFM-3-MOD_SD: Failed to modify Station Descriptor with index [dec], vlan [dec], di [dec], error [dec], mad [dec], ref-count [dec]`

Explanation The forwarding manager is attempting to modify a station descriptor that is no longer in use or is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HP100VG Messages

This section contains 1PA-100VG AnyLan Port Adapter error messages.

Error Message `%HP100VG-3-NOCAM: [chars] hardware CAM device not found`

Explanation Could not find Hardware CAM on the PA module

Recommended Action Repair or replace the 100VG PA interface module.

HSRP Messages

This section contains Hot Standby Router Protocol (HSRP) messages.

HSRP-3

Error Message `%HSRP-3-MISCONFIG: Attempt to change [chars] MAC address to [enet] when DECNET already running`

Explanation An HSRP group attempted to become active on an interface that can only support a single MAC address and that is running DECnet. If the **standby use-bia** command has not been entered on the interface, HSRP would normally set the interface MAC address to the HSRP virtual MAC address, but this configuration is not allowed if DECnet is running.

Recommended Action Enter the **standby use-bia** command on the interface.

Error Message `%HSRP-3-NOSOCKET: Unable to open socket`

Explanation The system was unable to initialize an IP connection for the Hot Standby protocol.

Recommended Action Make sure that there is at least one interface configured to run IP.

HSRP-4

Error Message `%HSRP-4-BADAUTH: Bad authentication from [IP_address], group [dec], remote state [chars]`

Explanation Two routers participating in HSRP disagree on the valid authentication string.

Recommended Action Use the **standby authentication** command to repair the HSRP authentication discrepancy between the local system and the one whose IP address is reported.

Error Message `%HSRP-4-BADAUTH2: Bad authentication from [IP_address]`

Explanation Two routers participating in HSRP disagree on the valid authentication string.

Recommended Action Use the **standby authentication** command to repair the HSRP authentication discrepancy between the local system and the one whose IP address is reported.

Error Message `%HSRP-4-BADVIP: [chars] Grp [dec] address [IP_address] is in the wrong subnet for this interface`

Explanation The HSRP virtual IP address contained in the Hello message cannot be learned as it is not within a subnet configured on the interface.

Recommended Action Check the configuration on all HSRP routers and ensure that the virtual IP address is within a configured subnet.

Error Message `%HSRP-4-DIFFVIP1: [chars] Grp [dec] active routers virtual IP address [IP_address] is different to the locally configured address [IP_address]`

Explanation The HSRP virtual IP address contained in the Hello message from the active router is different from the virtual IP address configured locally.

Recommended Action Check the configuration on all HSRP routers in the group and ensure they are all configured with the same virtual IP address.

Error Message `%HSRP-4-DUPADDR: Duplicate address [IP_address] on [chars], sourced by [enet]`

Explanation The IP address in an HSRP message received on the specified interface is the same as the IP address of the router. Another router might be configured with the same IP address. The most likely cause is a network loop or a misconfigured switch that is causing the router to see its own HSRP Hello messages.

Recommended Action Check the configurations on all the HSRP routers to ensure that the interface IP addresses are unique. Check that no network loops exist. If port channels are configured, check that the switch is correctly configured for port channels. Enter the **standby use-bia** command so that the error message displays the interface MAC address of the sending router, which can be used to determine if the error message is caused by a misconfigured router or a network loop.

Error Message `%HSRP-4-DUPVIP1: [chars] Grp [dec] address [IP_address] is already assigned to [chars] group [dec]`

Explanation The HSRP virtual IP address contained in the Hello message cannot be learned as it is already assigned to a different HSRP group.

Recommended Action Check the configuration on all HSRP routers and ensure that the virtual IP address of each HSRP group is unique.

Error Message `%HSRP-4-DUPVIP2: [chars] Grp [dec] address [IP_address] is already assigned on this interface`

Explanation The HSRP virtual IP address contained in the Hello message cannot be learned as it is already assigned to this interface.

Recommended Action Check the configuration on all HSRP routers and ensure that the virtual IP address of each HSRP group is unique.

Error Message `%HSRP-4-DUPVIP3: [chars] Grp [dec] address [IP_address] is already assigned to, or overlaps with, an address on another interface or application`

Explanation The HSRP virtual IP address contained in the Hello message cannot be learned as it is already assigned to, or overlaps with, an address on another interface or application.

Recommended Action Check the configuration on all HSRP routers and ensure that the virtual IP address of each HSRP group is unique.

HSRP-5

Error Message `%HSRP-5-STATECHANGE: [chars] Grp [dec] state [chars] -> [chars]`

Explanation The router has changed state.

Recommended Action No action is required.

HTTP Messages

This section contains Hypertext Transfer Protocol (HTTP) messages.

HTTP-3

Error Message %HTTP-3-INIT_FAIL: HTTP Process Init failed.

Explanation Initialization of the HTTP subsystem has failed.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message %HTTP-3-OUTOF_MEM: HTTP out of memory.

Explanation An error occurred during initialization of the HTTP process. The HTTP process could not create crucial internal data structures that are required for operation of the HTTP subsystem. The most likely reason for this condition is an exhaustion of system memory.

Recommended Action Reduce other system activity to ease memory demands. if conditions warrant, upgrade to a larger memory configuration.

Error Message %HTTP-3-PROC_NOCREAT: Unable to create HTTP process.

Explanation An error occurred during initialization of the HTTP process. The HTTP process that processes all HTTP requests and responses could not be created.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message %HTTP-3-SERVER_RESTART_FAILED: Server restart failed. Disabling HTTP server.

Explanation TCP process was restarted affecting the HTTP server. Attempts to restart HTTP server failed.

Recommended Action Check status of TCP process. Enable the HTTP server after TCP process has started.

HTTP-6

Error Message %HTTP-6-SERVER_SETUP_FAILED: Server setup failed

Explanation Setup of the HTTP or HTTPS server to listen on the specified port number has failed.

Recommended Action Disable the server, verify that port number is correct and enable the server. Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

HW Messages

This section contains hardware messages.

HW-2

Error Message `%HW-2-OBSOLETE_HW_VER: Module Version in [chars] is obsolete ** * IMPORTANT !!! * * The module in [chars] is obsolete and must be returned * * via RMA to Cisco Manufacturing. If it is a lab unit, * * it must be returned to Proto Services for upgrade. * **`

Explanation   The specified hardware is obsolete and needs to be replaced.

Recommended Action   If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HW_API Messages

This section contains hardware API messages.

HW_API-3

Error Message `%HW_API-3-BACKWALK_REQUEST: Backwalk request failed, [chars]`

Explanation   A request to walk internal data structures has failed. Depending on the criticality of the data, the accuracy of forwarding may be affected.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-BACKWALK_REQUEST_VALUE: Backwalk request failed, [chars] ([hex])

Explanation A request to walk internal data structures has failed. Depending on the criticality of the data, the accuracy of forwarding may be affected.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-INVALID_CONTEXT: Invalid context [hex]

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-INVALID_OBJ: Invalid object [hex]

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HW_API-3-INVALID_TYPE: Invalid type [dec]`

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HW_API-3-INVALID_WALK_SPEC: Invalid walk spec [hex]`

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HW_API-3-NO_OBJ_TYPE_LIST_ENTRY: Invalid sw_obj_type ([dec]) used with obj_type_list`

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-NO_OBJ_TYPE_LIST_ENTRY2: Invalid sw_obj_link_type ([dec])
used with obj_type_list

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-RESILIENCE_NO_HANDLER: No handlers in place for [chars] sw
object creation failure.

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HW_API-3-VECTOR: Failed to set [chars] vector for [chars], [chars]

Explanation An internal API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HW_API-3-WALK_MODE_UNSUPPORTED: Walk mode '[chars]' unsupported`

Explanation   An internal API error has occurred.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HWIF_QOS Messages

This section contains HWIF QoS messages.

Error Message `%HWIF_QOS-6-EOM_FORCE_TRUSTED: EoMPLS on [chars] caused install of 'trust cos' state`

Explanation   If EoMPLS is configured on the interface or any of its subinterfaces, the no trust state is automatically replaced by trust cos.

Recommended Action   Remove all EoMPLS configurations from the interface to restore the no trust state.

Error Message `%HWIF_QOS-6-EOM_RESTORE_UNTRUSTED: The 'no trust' state is restored on EoMPLS removal from [chars]`

Explanation   If EoMPLS is unconfigured on the interface and all its subinterfaces, the configured no trust state is restored.

Recommended Action   This is an informational message only. No action is required.

Error Message `%HWIF_QOS-6-EOM_TRUST_NOT_INSTALLED: 'no trust' command is not installed on [chars] in presence of EoMPLS`

Explanation   If EoMPLS is configured on the interface or any of its subinterfaces, the **no trust** command is not installed.

Recommended Action   Remove all EoMPLS configurations from the interface.

HYPERION Messages

This section contains Hyperion ASIC (HYPERION) messages.

HYPERION-3

Error Message `%HYPERION-3-FAILURE_INTR_CFG: Failure to setup the Hyperion device interrupts.`

Explanation The internal ASIC on a line card could not be initialized. The device is not operational and has been disabled. The data path is not operational.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HYPERION-4

Error Message `%HYPERION-4-EARL_BUS_SYNC_ERR: Failed to sync Earl bus, Hyperion version [dec]`

Explanation The HYPERION ASIC in the line card failed to synchronize with the Earl bus.

Recommended Action If traffic recovers, no action is required. Otherwise, copy the message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HYPERION-4-HYP_RESET: Hyperion Error Interrupt. Resetting ASIC.

Explanation The Hyperion ASIC in the SPA or Enhanced FlexWAN module has received a fatal error. The ASIC is automatically reset, and the SPA or Enhanced FlexWAN module attempts to continue normal operation.

Recommended Action No action is required if traffic recovers. If traffic does not recover, copy the error message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. If you cannot determine the cause of the error from the error message text or from the **show platform hardware hyperion all** output, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HYPERION-4-HYP_RESET: Hyperion ASIC reset, interrupt [chars]

Explanation The Hyperion ASIC in the SPA or Enhanced FlexWAN module has received a fatal error. The ASIC is automatically reset, and the SPA or Enhanced FlexWAN module attempts to continue normal operation.

Recommended Action No action is required if traffic recovers. If traffic does not recover, copy the error message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. If you cannot determine the cause of the error from the error message text or from the **show platform hardware hyperion all** output, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %HYPERION-4-UNEXPECTED_VERSION: Unexpected Hyperion version.

Explanation The line card is unable to recognize the version of the Hyperion ASIC.

Recommended Action No action is required if traffic passes through the line card. If traffic does not pass through the line card, check the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl to determine in which version this problem is fixed and upgrade accordingly. If traffic does not pass after the upgrade, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

HYPERION-5

Error Message `%HYPERION-5-BUS_MODE_CHANGE: The System Switching Bus Mode changed to [chars] mode`

Explanation The system switching bus interface device mode changed switching bus modes. The mode is specified in the system message.

Recommended Action The supervisor engine instructed the module to change the mode on the switching bus. No action is required.

Error Message `%HYPERION-5-BUS_SEQ_ERR: Constellation bus Sequence Error. Resetting Hyperion ASIC.`

Explanation The switch processor has detected a sequence error on the backplane bus. A reset sequence from the EARL has been called to recover from this error. System traffic should recover and continue normally.

Recommended Action If traffic recovers, no action is required. If traffic does not recover, copy the error message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. If you cannot determine the cause of the error from the error message text or from the **show platform hardware hyperion all** output, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HYPERION-5-HYP_INIT_FAILURE: The Hyperion ASIC initialization failed`

Explanation The Hyperion ASIC initialization was not successful. The Hyperion ASIC is not operational and is disabled.

Recommended Action If traffic recovers, no action is required. If traffic does not recover, copy the error message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. If you cannot determine the cause of the error from the error message text or from the **show platform hardware hyperion all** output, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HYPERION-5-HYP_INTR_INFO: [chars]`

Explanation This message provides more information about the interrupts from the backplane bus ASIC to the line card CPU.

Recommended Action If traffic recovers, no action is required . Otherwise, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HYPERION-5-HYP_RESET_INFO: [chars]`

Explanation This message provides more information about the interrupts leading to the reset of the backplane bus ASIC.

Recommended Action If traffic recovers, no action is required . Otherwise, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%HYPERION-5-NULL_HYP_OBJECT: The Hyperion device object pointer is set to NULL`

Explanation The memory location of the Hyperion ASIC device object is invalid. The Hyperion ASIC operation is disabled, and the device interrupt is now masked.

Recommended Action If traffic recovers, no action is required. If traffic does not recover, copy the error message exactly as it appears on the console or in the system log. Enter the **show platform hardware hyperion all** command to gather data that may help identify the cause of the error. If you cannot determine the cause of the error from the error message text or from the **show platform hardware hyperion all** output, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC Messages

This section contains Inter-Card Communication (ICC) messages.

ICC-3

Error Message `%ICC-3-MAST_BAD_FREE: ICC multicast memory already freed`

Explanation One of the ICC multicast request's memory was found to be free when response arrived

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC-4

Error Message `%ICC-4-BAD_ACCOUNTING: ICC received a bad class %d`

Explanation The intercard communication (ICC) process received an invalid class and therefore cannot account for the message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC-5

Error Message `%ICC-5-REQ_WATERMARK: [dec] pkts for class [chars] request [dec] are waiting to be processed`

Explanation The processor has received packets for the class request and the packets are waiting to be processed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC-6

Error Message `%ICC-6-INFO: [chars] [hex] [hex] [hex]`

Explanation This message provides ICC subsystem generic information or error information.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC-6-MCAST_TIMEOUT: ICC multicast request timed out`

Explanation One of the ICC multicast request timed out without response.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC_ISSU_NEGO Messages

This section contains Inter-Card Communication (ICC) in-service software upgrade (ISSU) negotiation messages.

ICC_ISSU_NEGO-3

Error Message `%ICC_ISSU_NEGO-3-CLIENT_EVENT_QUEUE_CREATE: Failed to create ICC nego client queue (client %d, endpoint 0x%x)`

Explanation The intercard communication (ICC) ISSU negotiation process failed to create a client watched queue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-CLIENT_FREE_EVENTS_ALLOCATION: Failed to allocate ICC Nego free events (client %d, endpoint 0x%x)`

Explanation The ICC negotiation process failed to allocate ICC negotiation free events.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-CLIENT_FREE_EVENT_ENQUEUE: Failed to enqueue event to free event queue (type %d, client %d, endpoint 0x%x)`

Explanation   The ICC negotiation process failed to enqueue an event to the free event queue.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-CLIENT_FREE_EVENT_QUEUE_CREATE: Failed to create ICC nego client queue (client %d, endpoint 0x%x)`

Explanation   The ICC negotiation process failed to create a client free events queue.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-CLIENT_PROCESS_CREATE: Failed to create ICC nego client process (client %d, endpoint 0x%x)`

Explanation   The ICC negotiation process failed to create a client process.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-DROPPING_MSG: Dropping message (client %d)`

Explanation The ICC negotiation process dropped a client message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-ICC_INIT_SEND: Failed to send the ICC Nego Init message (endpoint 0x%x)`

Explanation The ICC negotiation process failed to send the negotiation initialization message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INCONSISTENT_MEDMAN_DATA: Inconsistent MEDMan data (unique key %d)`

Explanation The ICC negotiation process Multiple Endpoint Data Manager (MEDMan) data is inconsistent.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INTERNAL_ICC_PAK: Failed to get an ICC pak (internal message %d, size %d`

Explanation The ICC negotiation process failed to get an ICC packet for an internal message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_CLIENT: Invalid client %d`

Explanation The ICC negotiation client is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_CLIENT_PID_GENERIC: Invalid client process pid, can't be the generic process (client %d, endpoint 0x%x, pid %d)`

Explanation An attempt was made to send a client process message to the ICC negotiation generic process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_DS: Invalid ICC Nego data structure`

Explanation The internal ICC negotiation data structure is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_DS_CLIENT: Invalid ICC Nego data structure (client %d)`

Explanation The internal ICC negotiation data structure is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_MSG: Invalid message (type %d)`

Explanation The ICC negotiation message is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_PCOL_DS: Invalid ICC Nego process collector data structure (client %d, endpoint 0x%x)`

Explanation The ICC negotiation process collector data structure is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_QUEUE: Invalid ICC Nego client queue (client %d)`

Explanation The internal ICC negotiation watched queue is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-INVALID_STATUS: Invalid client negotiation status (client %d, status %s)`

Explanation The ICC negotiation client negotiation status is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-MEDMAN_DS_CREATION: Failed to create the client data structure in MEDMan (client %d, endpoint 0x%x, error %s)`

Explanation The ICC negotiation process could not create the client data structure in the Multiple Endpoint Data Manager (MEDMan).

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-MEDMAN_REGISTRATION: Failed to register with MEDMan`

Explanation The ICC negotiation process failed to register with the Multiple Endpoint Data Manager (MEDMan).

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-MSG_ENQUEUING: Failed to enqueue msg to the ICC Nego generic process (client %d)`

Explanation The ICC negotiation process failed to enqueue a process message to the ICC negotiation generic process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-MSG_ENQUEUING_CLIENT: Failed to enqueue msg to the ICC Nego generic process (client %d, e_id 0x%x, type %d)`

Explanation The ICC negotiation process failed to enqueue a process message to an ICC negotiation client process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NEGO_CANNOT_COMPLETE: Negotiation cannot complete (endpoint 0x%x)`

Explanation The ICC negotiation cannot complete.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NOTIFY_CLIENT: Failed to notify client %d (e_id 0x%x)`

Explanation The ICC negotiation process failed to notify a client.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NO_FREE_EVENT: Couldn't get a free event (type %d, client %d, e_id 0x%x)`

Explanation The ICC negotiation process failed to get a free event for a client.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NO_INTERNAL_CB: No callback for internal message %d`

Explanation No ICC negotiation callback has been defined for this internal message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NO_QUEUE: Couldn't get an event queue (type %d, client %d, e_id 0x%x)`

Explanation The ICC negotiation process failed to get an event queue for a client.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NO_UK: Couldn't retreive the unique key`

Explanation The ICC negotiation process failed to retrieve the unique key for a client endpoint pair.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NVI_EMPTY_MSG: Received an empty NVI ICC message`

Explanation The ICC negotiation process received an empty NVI ICC message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NVI_ICC_SEND: Failed to send the ICC Nego NVI ICC message (endpoint 0x%x)`

Explanation The ICC negotiation process failed to send the NVI ICC message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NVI_REQ_PAK: Failed to get an ICC req pak for the ICC Nego NVI message`

Explanation The ICC negotiation process failed to get an ICC request packet for the NVI internal message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-NVI_RESP_PAK: Failed to get an ICC resp pak for the ICC Nego NVI message`

Explanation The ICC negotiation process failed to get an ICC response packet for the NVI internal message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-OPEN_PORT_RELIABLE: Can't open reliable port (endpoint 0x%x, client %s - %d)`

Explanation The ICC negotiation process cannot open a reliable port to the endpoint for the ISSU client. The ISSU client might not be able to negotiate.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-OPEN_PORT_UNRELIABLE: Can't open unreliable port (endpoint 0x%x, client %d)`

Explanation   The ICC negotiation process cannot open an unreliable port to the endpoint for the ISSU client. The ISSU client might not be able to negotiate.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-OUT_OF_MEMORY: System is running out of memory`

Explanation   There is not enough available memory in the system.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-PCOL_INCONSISTENT_PID: Inconsistent ICC Nego process collector process id (client %d, endpoint 0x%x)`

Explanation   The ICC negotiation process collector process ID is inconsistent.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ICC_ISSU_NEGO-3-PROCESS_CREATE: Failed to create ICC nego process

Explanation The ICC negotiation failed to create a process to handle the messages.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ICC_ISSU_NEGO-3-PROCESS_KILL_INTERNAL: Internal process kill failed (pid %d, process collector pid %d)

Explanation The ICC negotiation process failed to terminate an internal process due to an inconsistent process ID.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ICC_ISSU_NEGO-3-PROC_LEVEL_MSG_GENERIC: Invalid process level message in the generic process (client %d, level %d)

Explanation The level of messages for the ICC negotiation process is invalid in the generic process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-PROC_LEVEL_MSG_INTERRUPT: Invalid process level message in the ICC interrupt (client %d, level %d)`

Explanation The level of messages for the ICC negotiation process is invalid in the ICC interrupt.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-SEND_UK: Failed to send unique key to process (client %d, endpoint 0x%x`

Explanation The ICC negotiation process failed to send the unique key to the new client process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-TIMER_NOT_AWAKE: ICC Nego pcol timer was not awake when getting a timer event`

Explanation The ICC negotiation process collector timer was not awake when receiving a timer event.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-TIMER_NOT_RUNNING: ICC Nego pcol timer was not running when getting a timer event`

Explanation The ICC negotiation process collector timer was not running when getting a timer event.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ICC_ISSU_NEGO-3-WATCHED_QUEUE_CREATION: Failed to create the watched queue`

Explanation The ICC negotiation process could not create the watched queue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ICC_ISSU_TAGGING Messages

This section contains Inter-Card Communication (ICC) in-service software upgrade (ISSU) tagging messages.

ICC_ISSU_TAGGING-3

Error Message `%ICC_ISSU_TAGGING-3-NOT_XFORM: Untransformed message detected (class:%d, request:%d, sender:%x)`

Explanation During runtime, the intercard communication (ICC) ISSU tagging process detected an untransformed ICC message. This message must be transformed or suspended to support ISSU.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IDBINDEX_SYNC Messages

This section contains Interface Descriptor Block (IDB) index synchronizationmessages.

IDBINDEX_SYNC-3

Error Message `%IDBINDEX_SYNC-3-IDBINDEX_ASSIGN: Failed to assign an index to IDB type %d, for interface`

Explanation An interface index cannot be allocated for this interface due to an internal software error. This is an unrecoverable error that results in this interface not being usable for traffic.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-IDBINDEX_ENTRY_MISMATCH: An interface index mismatched its active table entry:`

Explanation An interface index was found which did not match the active interface descriptor block (IDB) index table entry with the corresponding synchronization key. This condition is due to an internal software error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-IDBINDEX_LINK: Driver for IDB type '%d' changed the Identity of interface`

Explanation The interface index table cannot be updated with the new identity provided for this interface due to an internal software error. The driver might not have deleted the old identity first, or the driver might have accidentally changed the identity.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-IDBINDEX_RETRIEVE: Cannot retrieve if-index for this interface:`

Explanation The interface index number was not found in the interface index table for the interface specified in the error message. This condition might have been caused by the interface index number not being properly synchronized by the primary processor card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-INIT_ERR: %s`

Explanation The interface index synchronization ISSU client has an initialization error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-IPC_ERR: %s: %s.`

Explanation The interface index synchronization interprocess communication (IPC) session has an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-ISSU_ERR: %s%s, rc=%d`

Explanation The interface index synchronization ISSU client has an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-RF_ERR: %s %d.`

Explanation An error occurred in the interface index synchronization of the redundancy facility (RF) client.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-TRANSFORM: Require IF-Index ISSU transformation function %s %s`

Explanation The interface index synchronization process has identified a missing ISSU transformation function. This condition may lead to misoperation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-3-VALIDATE: Cannot validate if-index for this interface:`

Explanation The identity of this interface could not be validated against the stored identity within the interface descriptor block (IDB) index table. This condition probably occurred due to the identity of the IDB changing without first explicitly unlinking the previous identity.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IDBINDEX_SYNC-4

Error Message `%IDBINDEX_SYNC-4-RESERVE: Failed to lookup existing ifindex for an interface on the Standby, allocating a new ifindex from the Active (ifindex=%d, idbtype=%s)`

Explanation A lookup failure occurred for an interface on the standby unit. An attempt was made to resolve the issue by reserving a new interface index on the active unit. If this failure was caused by a defect in the key encoding, then traffic may stop on this interface if the system switches over.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBINDEX_SYNC-4-TRUNCATE: Overflow in %s when encoding interface sync key, got %d maximum is %d`

Explanation During the creation of a unique synchronization key to represent an interface, one of the attributes making up the key was truncated to fit in the allocated space in the key. This condition might lead to overlapping key allocations, which would cause an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IDBINDEX_SYNC_KEY Messages

This section contains Interface Descriptor Block (IDB) key synchronizationmessages.

IDBINDEX_SYNC_KEY-3

Error Message `%IDBINDEX_SYNC_KEY-3-UNKNOWN_TYPE: Interface type is unknown and cannot be synced:`

Explanation An internal software error has occurred related to the interface descriptor block (IDB) key synchronization.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IDBMAN Messages

This section contains Interface Descriptor Block Manager (IDBMAN) messages.

IDBMAN-4

Error Message `%IDBMAN-4-CONFIG_WRITE_FAIL: FFailed to generate configuration for interface [chars]`

Explanation The system failed to generate a configuration for the specified interface because of a problem with the file system. The active and standby supervisor engines will have configurations that do not match.

Recommended Action The standby supervisor engine is reloaded automatically to recover from the problem. If the standby supervisor engine does not recover, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IDBMAN-4-IDB_LIMIT: Maxinum interface count reached the limit of [dec]([dec]+[dec]). Module is disabled.`

Explanation The number of interfaces has reached the maximum limit and the module has been disabled.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IDMGR Messages

This section contains ID manager messages.

Error Message `%IDMGR-3-INVALID_ID_TABLE_SIZE: bad new ID table size`

Explanation A bad new table request to ID manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IF Messages

This section contains interface messages.

IF-2

Error Message `%IF-2-IDB_TABLE_INIT: Malloc failed while initializing idb table`

Explanation A memory allocation failure occurred while an IDB table was being initialized.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

IF-3

Error Message `%IF-3-BADMACADDRTYPE: illegal mac address type, [dec]`

Explanation This is an internal error that was recovered gracefully.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IF-4

Error Message `%IF-4-BACKWARD_COUNTERS: Corrected for backward [chars] counters ([int] -> [int]) on [chars]`

Explanation The interface specified in the message has a packet counter that has decreased in number. This condition can occur if a packet is counted and then dropped. This event was detected and corrected.

Recommended Action If this condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IF-4-NOBGPROCESS: Network background process not running. [chars]`

Explanation A process which manages network interface background processing is not yet running, but another system process has tried to send the process a message. An interface on the router may have missed a request to bring itself up.

Recommended Action Reset the interface by entering a **shutdown** command followed by a **no shutdown command.**

IFDAMP Messages

This section contains interface dampening (IFDAMP) messages.

IFDAMP-5

Error Message `%IFDAMP-5-ZERODELAY: dampening reuse timer is updated with 0 delay time`

Explanation An inconsistency was detected in the dampening reuse timer wheel.

Recommended Action No action is required.

IFMGR Messages

This section contains interface manager messages.

IFMGR-3

Error Message `%IFMGR-3-BADIFINDEXTABLE: The file nvram:ifIndex-table is corrupt.`

Explanation The file is not in the expected format.

Recommended Action If possible, delete the file. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-DUP_IFINDEX: Duplicate ifIndex (%d) found for ifDescr`

Explanation Two interfaces have the same interface index in the interface manager assigned list. The second interface registered with the interface manager will be assigned a new index.

Recommended Action If interface index persistence is not required, then no action is required. Otherwise, reload the router with the proper interface index table and image. If the error message only appears from the standby route processor (RP), reload the standby RP.

Error Message `%IFMGR-3-IFDB: IF manager interface database [chars] failure- [dec]`

Explanation An internal software error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-IFINDEX_PERSIST_ENTRY_CORRUPT: [chars] seems to be corrupted. Trying to read [dec] size`

Explanation   The ifIndex table is corrupted.

Recommended Action   Delete the ifindex table.

Error Message `%IFMGR-3-INVALID_PERSISTENT_DATA: Invalid persistent data`

Explanation   An attempt was made to write invalid persistent data.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-NOIMACP: IF manager control process failed to start`

Explanation   An internal software error has occurred.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-NOVECTOR: Interface manager failed to allocate IF vector. size %d`

Explanation   The interface vector could not be allocated with the number of elements required, either initially or by a resize operation.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-VECTOREXD: IF manager attempted to use interface [dec] outside vector range.`

Explanation An internal software error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-VECTORIFSUSPECT: IF manager added interface %d which is unexpectedly large.`

Explanation The ifIndex allocation scheme is trying to add an ifIndex value much larger than the former greatest ifIndex value in the DB. It should assign sequential ifIndex values.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-3-VECTORPOSUSED: IF manager attempted to add interface [dec] which was already added.`

Explanation An internal software error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IFMGR-4

Error Message %IFMGR-4-NOIFINDEX: All SNMP if indices are exhausted

Explanation All SNMP MIB indexes have been exhausted. Interfaces will not be able to obtain an interface index that they can use to register with the interface MIB.

Recommended Action Attempt a system reload. If the problem persists after the system reload, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IFMGR-4-NOSYNC: ifIndex not being synced between active and standby

Explanation When the standby module comes up, the tuple of ifIndex and ifDescr is synchronized so that interfaces get the same ifIndex when they come up. This error happens when the interface does not get the ifIndex for the given ifDescr.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IFMGR-4-STACK_RELATIONSHIP_ADD_ERROR: [chars]: Request for creating invalid stack relationship [dec], [dec]

Explanation The IF MGR received the call to add invalid stack relationship. The higher and lower ifIndex are shown in the message. The module of the IF MGR from which this message is generated is also shown in the message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IFMGR-4-VECTORIFSUSPECT: IF manager added interface [dec] which is unexpectedly large.`

Explanation The ifIndex allocation scheme gives out sequential ifIndex values. This message comes from the IF-MGR DB when it is trying to add an ifIndex value much larger than the former greatest ifIndex value in the DB.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IFMGR-7

Error Message `%IFMGR-7-NO_IFINDEX_FILE: Unable to open [chars] [chars]`

Explanation This is a informational message. This means system found no saved ifIndex information, and ifIndex is not persisted across reboots. The ifIndices will be reassigned.

Recommended Action 1. No Action, if 'snmp-server ifIndex persist' is not configured. 2. If 'snmp-server ifindex persist' is configured then copy the error message exactly as it appears, and report it to your technical support representative.

IFS Messages

This section contains Cisco IOS file system messages.

Error Message `%IFS-3-FS_STRUCT_ERROR: Data does not match expected internal representation`

Explanation A mismatch exists between the representation of data extracted from the file system and the expectation of its formatting. This condition may occur when running in a dual-RP environment, with different Cisco IOS versions running on the two RPs.

Recommended Action Ensure that both RPs are running the same Cisco IOS version, if running in a dual-RP environment. If not, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IGMP Messages

This section contains Internet Group Management Protocol (IGMP) messages.

IGMP-3

Error Message `%IGMP-3-NO_DNS_SERVER: No DNS server is configured. DNS-based SSM mapping should be disabled if no DNS server is configured.`

Explanation No domain name service (DNS) server is present. Processing of Internet Group Management Protocol (IGMP) packets may be delayed if the DNS lookup is done continuously.

Recommended Action Disable DNS-based source specific multicast (SSM) mapping if no DNS server is present in the network.

Error Message `%IGMP-3-QUERY_INT_MISMATCH: Received a non-matching query interval %d, from querier address %i`

Explanation An IGMP version mismatch was detected between routers.

Recommended Action Configure both interfaces with the same IGMP version.

IIGMP-6

Error Message `%IGMP-6-IGMP_CHANNEL_LIMIT: IGMP limit exceeded for channel (%i, %i)`
`on %s by host %i`

Explanation The allowed number of IGMP joiners reached the configured limit. New joiners cannot
be allowed unless the configuration is changed.

Recommended Action Enter the global or interface **ip igmp limit** command to adjust the allowed
number of IGMP joiners. If the exceeding of current limits was unexpected, find the IP address of
the denied host in the system log.

Error Message `%IGMP-6-IGMP_GROUP_LIMIT: IGMP limit exceeded for group (*, %i) on %s`
`by host %i`

Explanation The allowed number of IGMP joiners has exceeded the configured limit. New joiners
cannot be allowed unless the configuration is changed.

Recommended Action Enter the global or interface **ip igmp limit** command to adjust the allowed
number of IGMP joiners. If the exceeding of current limits was unexpected, find the IP address of
the denied host in the system log.

ILPOWER Messages

This section contains inline power messages.

ILPOWER-3

Error Message `%ILPOWER-3-CONTROLLER_ERR: Controller error, Controller number [dec]:`
`[chars]`

Explanation An error involving the inline power controller has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ILPOWER-3-CONTROLLER_IF_ERR: Controller interface error, [chars]: [chars]`

Explanation An interface error has been detected between the inline power controller and the system.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ILPOWER-3-CONTROLLER_PORT_ERR: Controller port error, Interface [chars]: [chars]`

Explanation A port error has been reported by the inline power controller.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ILPOWER-5

Error Message `%ILPOWER-5-AC_DISCONNECT: Interface [chars]: AC disconnect`

Explanation The AC power has been disconnected.

Recommended Action No action is required.

Error Message `%ILPOWER-5-DC_DISCONNECT: Interface [chars]: DC disconnect`

Explanation The DC power has been disconnected.

Recommended Action No action is required.

Error Message `%ILPOWER-5-ILPOWER_MISCONFIG: Interface [chars] is denied power as it requires more power than configured maximum wattage([dec]).`

Explanation The interface is denied power as it requires more power than the configured maximum wattage.

Recommended Action No action is required.

Error Message `%ILPOWER-5-ILPOWER_NOPOWER_AVAIL: Interface [chars] is denied power because either the system ran out of power or module limit reached.`

Explanation There is not enough power left in the system to supply to the interface specified in the error message.

Recommended Action No action is required.

Error Message `%ILPOWER-5-ILPOWER_POWEROVERDRAWN: Interface [chars] is shutdown as it is consuming more power ([dec]) than the configured maximum value ([dec]).`

Explanation The specified interface is shut down because it is consuming more power than the configured maximum value.

Recommended Action No action is required.

Error Message `%ILPOWER-5-LINKDOWN_DISCONNECT: Interface [chars]: Link down disconnect`

Explanation A link has been disconnected.

Recommended Action No action is required.

Error Message `%ILPOWER-5-POWER_GRANTED: Interface [chars]: Power granted`

Explanation Power has been granted for the interface specified.

Recommended Action No action is required.

ILPOWER-7

Error Message `%ILPOWER-7-DETECT: Interface [chars]: Power Device detected: [chars]`

Explanation A power device has been detected.

Recommended Action No action is required.

ILPOWER_RF Messages

This section contains inline power redundancy facility (RF) messages.

ILPOWER_RF-3

Error Message `%ILPOWER_RF-3-CREATE_PROCESS: Inline power RF client failed to create %s process`

Explanation The inline power redundancy facility (RF) client could not create a process. This condition will cause bulk synchronization to fail.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IMAGEMGR Messages

This section contains image manager messages.

IMAGEMGR-6

Error Message `%IMAGEMGR-6-AUTO_ADVISE_SW: [chars]`

Explanation A line of output from the auto-advise-software process is being displayed.

Recommended Action No action is required.

Error Message `%IMAGEMGR-6-AUTO_ADVISE_SW_INITIATED: Auto-advise-software process initiated for switch number(s) [chars]`

Explanation Systems with incompatible software have been detected in the stack. The stack will now determine whether or not software is available to be copied to the incompatible systems, and if so, advise the user how to copy it. Otherwise, the system lets the user know that the software on the stack needs to be updated.

Recommended Action No action is required.

Error Message `%IMAGEMGR-6-AUTO_COPY_SW: [chars]`

Explanation A line of output from the auto-copy-software process is being displayed.

Recommended Action No action is required.

Error Message `%IMAGEMGR-6-AUTO_COPY_SW_INITIATED: Auto-copy-software process initiated for switch number(s) [chars]`

Explanation Systems with incompatible software have been detected in the stack. The stack determines whether or not software is available to be copied to the incompatible systems, and whether or not it is appropriate to copy the software automatically.

Recommended Action No action is required.

Error Message `%IMAGEMGR-6-AUTO_DOWNLOAD_SW: [chars]`

Explanation A line of output from the automatic software download process is being displayed.

Recommended Action No action is required.

Error Message `%IMAGEMGR-6-AUTO_DOWNLOAD_SW_INITIATED: Auto-download-software process initiated for switch number(s) [chars]`

Explanation Systems with incompatible software have been detected in the stack. The stack attempts to download software from a previously configured location, and install it to make the systems compatible.

Recommended Action No action is required.

IMAGE_SIMFS Messages

This section contains In-Memory System Image File System messages.

Error Message `%IMAGE_SIMFS-3-NOPROCESS: Failure spawning Memory Reclaim process`

Explanation The creation of an Cisco IOS process to compact memory previously held by in-memory image files has failed, probably due to a software defect.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IMAGE_VFS Messages

This section contains Image Virtual File System messages.

Error Message `%IMAGE_VFS-3-CHECKSUM_FAIL: [chars] image checksum mismatch.`

Explanation   The checksum of the image in memory is different from the expected checksum.

Recommended Action   Verify that the image file is complete and uncorrupted.

Error Message `%IMAGE_VFS-3-LOAD_FAIL: Failed to locate all the Image files,on bootup`

Explanation   The relevant image file is missing or it could not be extracted (due to corruption), or the router has insufficient memory to load the entire image

Recommended Action   Copy the message exactly as it appears on the console or in the system log. If the TAR file is part of a system image, enter the **show image contents file** *archive-name*, where *archive-name* is the name of the archive. Enter the **show region** and **show version** commands to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IMAGE_VFS-3-LOCATE_FAIL: Failed to open [chars], which was loaded from archive [chars]`

Explanation   The relevant image file is missing or it could not be extracted (due to corruption), or the archive itself is missing (in the case of flash-based access).

Recommended Action   Copy the message exactly as it appears on the console or in the system log. If the file is not in memory, check the archive file. If the file is a TAR archive file and not part of a system software image, enter the **archive tar table** *archive-name* command, where *archive-name* is the name of the TAR archive. If the TAR file is part of a system image, enter the **show image contents file** *archive-name*, where *archive-name* is the name of the archive. Enter the the **dir all** and **show version** commands to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IMAGE_VFS-3-NOPROCESS: Failure spawning No Cache process`

Explanation The creation of a Cisco IOS process to delete in-memory image files has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IMAGE_VFS-3-VERIFY_FAIL: archive verification failed for file [chars] & archive [chars].`

Explanation The archive in the local device is different from the version whose image file has been loaded into memory. This condition can happen if the archive was deleted from the local device or replaced by another file of the same name.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Check whether the archive file is complete and uncorrupted. Also check if the size of the archive and the last modification time (if available) is what you expect it to be. Enter the **dir all** and **show version** commands to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

INBAND Messages

This section contains inband management messages.

Error Message `%INBAND-3-BAD_PAK: Possibly un-encapsulated packet passed to Mistral: int [chars] type [int] stat [hex] flags [hex] size [dec] offset [dec] requeue_token [int] r1 [int] r2 [int] total detected [int]`

Explanation There is a badly encapsulated packet from the process level.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INBAND-3-INVALID_SEND: Invalid send operation (packet on [chars])`

Explanation An internal error caused illegal call to device driver: normal operation continues.

Recommended Action If this message recurs, copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

Error Message `%INBAND-3-NO_BUFFER_POOLS: Initialization of private buffer pools failed`

Explanation Private buffer pools were not created for etsec ibc.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

Error Message `%INBAND-3-TOOBIG: An attempt made to send giant packet on [chars] ([dec] bytes from [hex], max allowed [dec])`

Explanation An attempt was made to send an oversized packet.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

INTERFACE_API Messages

This section contains binary API for the interface descriptor block messages.

INTERFACE_API-1

Error Message `%INTERFACE_API-1-NOMOREHWIDBNUMBERS: No more hardware IDB numbers can be issued. The maximum allowed numbers, [dec], has been reached for this platform.`

Explanation No more hardware IDB numbers can be issued. The maximum allowed number has been reached for this platform.

Recommended Action In addition to the following, copy the information from the **show idb** command output. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INTERFACE_API-1-NOMORESWIDBNUMBERS: No more software IDB numbers can be issued. The maximum allowed numbers, [dec], has been reached for this platform.`

Explanation No more software IDB numbers can be issued. The maximum allowed number has been reached for this platform.

Recommended Action In addition to the following, copy the information from the **show idb** command output. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

INTERFACE_API-3

Error Message `%INTERFACE_API-3-CANNOTGETMTU: Error [dec] received while getting MTU: [chars]. Using default [int]`

Explanation A software error has occurred while attempting to retrieve the MTU value from the interface.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INTERFACE_API-3-IFNUMTOIDBERROR: Error occurred while using the ifnum to idb table for interface [chars], if number [dec], during [chars]`

Explanation A software error has occurred. An operation on the interface number to the IDB mapping table could not be performed successfully.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INTERFACE_API-3-INVALIDSUBBLOCKPARAMETERS: Invalid subblock parameters for [chars] were supplied.`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INTERFACE_API-3-NOADDSUBBLOCK: The [chars] subblock named [chars] was not added to [chars]`

Explanation A software error has occurred. IDB subblocks could not be added.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%INTERFACE_API-3-SUBNUMDBERR: subnum [hex] error in [chars]`

Explanation A software error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

INTERFACE_API-4

Error Message `%INTERFACE_API-4-TBLERROR: A error occurred while using the Index Table utility for [chars].`

Explanation A software error has occurred. This message is displayed when an index table feature could not be used successfully.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

INTR_MGR Messages

This section contains interrupt manager messages.

Error Message %INTR_MGR-3-BURST: [chars] [chars] [[dec]]

Explanation A burst of hardware interrupts of the specified type has occurred.

Recommended Action The message text on the console or in the system log provides more information on the specific cause of the error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %INTR_MGR-3-INTR: [chars] [chars]

Explanation The specified interrupt event has been detected.

Recommended Action The message text on the console or in the system log provides more information on the specific cause of the error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %INTR_MGR-3-MAXBURST: [chars] [chars] [[dec]]

Explanation The specified hardware interrupt has exceeded the maximum allowed number of bursts.

Recommended Action The message text on the console or in the system log provides more information on the specific cause of the error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IP Messages

This section contains Internet Protocol (IP) messages.

IP-3

Error Message `%IP-3-LOOPPAK: Looping packet detected and dropped src=[IP_address], dst=[IP_address],hl=[int], tl=[int], prot=[int], port=[int], dport=[int] in=[chars], nexthop=[IP_address], out=[chars] options=[chars]`

Explanation A looping packet was detected. A common cause is a misconfiguration of an IP helper address. The helper address should be the same address as that of the server of the intended service. Putting the address of the router in the helper address causes a routing loop to be created.

Recommended Action To resolve this issue, analyze the source and destination address of the looped packets. Verify that the configuration of IP helper addresses in the switch correctly point to the right device (for example the DHCP server, the DNS server, or WINS server).

Error Message `%IP-3-MAXIRDP: Attempt to send IRDP to proxies exceeding configurable limit: [dec], interface: [chars], secondary = [dec], proxy = [dec]`

Explanation The sum of configured secondary addresses and configured proxy addresses exceeds the number of total addresses that the IRDP can support in its implementation.

Recommended Action Reduce the number of either the secondary IP addresses or proxy addresses configured for the interface.

Error Message `%IP-3-NOOUTINTF: Output interface not available. source address: [IP_address], destination address: [IP_address], routing type: [int]`

Explanation The output interface for this packet is not set.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IP-4

Error Message `%IP-4-DUPADDR: Duplicate address %i on %s, sourced by %e`

Explanation Another system is using your IP address.

Recommended Action Change the IP address of one of the two systems.

IP-5

Error Message `%IP-5-TURBOACL: [chars]`

Explanation An error occurred while the TurboACL feature was being initialized.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IP-6

Error Message `%IP-6-L2MCASTDROP: Layer 2 Multicast packet detected and dropped, src=[IP_address], dst=[IP_address]`

Explanation Layer 2 Multicast packet with Layer3 Unicast Destination was dropped.

Recommended Action No action is required.

Error Message `%IP-6-PHYBCASTDROP: Physical broadcast packet detected and dropped, src=[IP_address], dst=[IP_address]`

Explanation Layer 2 Broadcast packet with Layer3 Unicast Destination was dropped.

Recommended Action No action is required.

IPACCESS Messages

This section contains IP security messages.

IPACCESS-4

Error Message `%IPACCESS-4-INVALIDACL: Invalid ACL field: [chars] is [dec]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPC Messages

This section contains InterProcessor Communication (IPC) messages.

IPC-2

Error Message `%IPC-2-INVALIDZONE: The IPC Zone is invalid. zone=[hex]`

Explanation   The zone ID entry is not in the zone table.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPC-3

Error Message   `%IPC-3-INVALID_PORT_INFO: Invalid port_info in the retry queue message - SRC_PORT = [hex], DEST_PORT = [hex], MSG_TYPE = [hex]`

Explanation   The IPC protocol subsystem detected that the port information is inconsistent. The port information is probably already freed by the application.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Enter the **show tech ipc** command from the master and the slave, to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPC-3-ISSU_API_ERR: [chars] failed with error code [dec]`

Explanation An ISSU API could not perform an operation for the IPC layer. The message text includes the error code from ISSU library.

Recommended Action Enter the **show issu client** command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPC-3-ISSU_ERROR: [chars] failed with error code [dec] for seat [hex]`

Explanation An ISSU API could not perform an operation for the IPC layer. The message text includes the error code from ISSU library.

Recommended Action Enter the **show issu fsm** command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPC-4

Error Message `%IPC-4-MSGMAXTIMEOUT: Invalid maximum timeout value [dec] seconds; Period - [dec]; Retries - [dec]`

Explanation The maximum message timeout for an IPC message exceeds 2 minutes.

Recommended Action Enter the **show version** command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IPC-4-NOPORT: Port Not Found. [hex] --> [hex], Index:[hex], Seq: [dec], flags: [hex], size: [dec]

Explanation IPC received a message which is destined for a port that cannot be found by IPC.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show ipc status**, **show ipc ports**, and **debug ipc errors** commands to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPC-5

Error Message %IPC-5-INVALIDINPUT: [chars]

Explanation An IPC API was called with an invalid argument.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IPC-5-NULLBPHANDLER: Passed Null backpressure handler

Explanation IPC cannot register the application's null function in the IPC backpressure handler list.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPC-5-QFULL: Q=[hex] [chars] [dec]`

Explanation   The IPC queue is full.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPC-5-WATERMARK:[dec] messages pending in [hex] for the port [chars] [hex].[hex]`

Explanation   A particular IPC port is overused. An application is not draining packets quickly, which suggests that the CPU might be busy. [dec] is the number of messages pending in the IPC to be processed by the application. [chars] is the IPC port name. The first [hex] is the IPC port number, the second [hex] is the IPC seat number, and the third [hex] is the IPC index.

Recommended Action   Reduce the traffic on this port to a minimal level. If the error message recurs, upgrade the system software to a release containing a fix for Cisco bug ID CSCdw74873 (watermark messages appear continuously with no traffic).

IPC-6

Error Message `%IPC-6-MAXRPCTIMEOUT: Maximum RPC timeout value [dec] seconds set for port [hex]`

Explanation   The maximum RPC timeout for an IPC message exceeds the maximum expected value of 10 minutes.

Recommended Action   Enter the **show techsupport ipc** command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPC-6-STATEFUL: %s`

Explanation A stateful interprocess communication (IPC) event occurred.

Recommended Action No action is required.

IP_DEVICE_TRACKING Messages

This section contains switch IP host tracking HA (IP_DEVICE_TRACKING) messages.

IP_DEVICE_TRACKING-4

Error Message `%IP_DEVICE_TRACKING-4-TABLE_LOCK_FAILED: Table already locked by process-id [dec]([chars])`

Explanation The IP device tracking table could not be updated because of another process holds a lock on the table.

Recommended Action No action is required.

Error Message `%IP_DEVICE_TRACKING_HA-4-ENTRY_OUT_OF_SYNC: Host mac-address [enet] ip-address [IP_address] interface [chars]`

Explanation An inconsistency has been detected between the active supervisor engine IP device tracking table and the standby supervisor engine IP device tracking table for this host.

Recommended Action No action is required.

IPFAST Messages

This section contains IP fast-switching (IPFAST) messages.

IPFAST-2

Error Message `%IPFAST-2-FAILOPENIPCPORT: Could not open the IPC ports. [chars]`

Explanation The IPFAST process could not open the IPC port to communicate to the line card or route processor.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-FASTPORTCREATEERR: Attempt to create [chars] failed after [dec] retries (last error:[chars])`

Explanation The line card attempted to create a port to the route processor but has failed after a few retries. This condition might result in the CEF becoming disabled on the line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-FASTPORTOPEN: Requested to open [chars], id [int] when already open. Attempting to re-open.`

Explanation The line card is attempting to open a port to the route processor when one is already open. This behavior could be transient but might result in multiple ports opened for the same purpose.

Recommended Action The router should be able to recover from this situation. If CEF problems develop for this line card, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-FASTPORTOPENERR: Attempt to open [chars] failed after [dec] retries (last error:[chars])`

Explanation The line card attempted to open a port to the route processor but has failed after a few retries. This condition might result in the CEF becoming disabled on the line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-FASTPORTREGISTERERR: Attempt to register [chars] failed after [dec] retries (last error:[chars])`

Explanation The line card attempted to register a port to the route processor but has failed after a few retries. This condition might result in the CEF becoming disabled on the line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-INVALSIZE: The IP fast path received an IPC message with an invalid size(size/type - [dec]/[dec])`

Explanation The IP fast path switching module has received an IPC message with an invalid size.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-2-MSGDROP: IPC queue limit is reached and message is dropped. queue limit = [dec] cumulative drops = [dec]`

Explanation The IPC raw queue limit for IP fast path has been reached.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPFAST-4

Error Message %IPFAST-4-FAILATTEMPTOPENIPCPORT: Attempt to open the IPC ports failed. [chars]

Explanation The IPFAST process failed an attempt to open the IPC port to communicate to the line card or route processor.

Recommended Action This is an informational message only. No action is required.

Error Message %IPFAST-4-FASTPORTCREATEWARN: Attempt to create [chars] failed. Will be retried [dec] times (last error:[chars])

Explanation The line card is attempting to create a port to the route processor but has failed. This behavior could be transient. The system will reattempt to create the port.

Recommended Action The system should be able to recover from this condition. If CEF becomes disabled on this line card, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IPFAST-4-FASTPORTOPENWARN: Attempt to open [chars] failed. Will be retried [dec] times (last error:[chars])

Explanation The line card is attempting to open a port to the route processor but has failed. This behavior could be transient. The system will reattempt to create the port.

Recommended Action The system should be able to recover from this condition. If CEF becomes disabled on this line card, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPFAST-4-FASTPORTREGISTERWARN: Attempt to register [chars] failed. Will be retried [dec] times (last error:[chars])`

Explanation The line card is attempting to register a port to the route processor but has failed. This could be transient behavior so retries will be attempted.

Recommended Action The router should be able to recover from this situation. If CEF gets disabled for this line card, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPFAST-5

Error Message `%IPFAST-5-SUCCEEDOPENIPCPORT: Attempt to open the IPC ports succeeded. [chars]`

Explanation The IP fast switching has succeeded in an attempt to open the IPC port to communicate with the line card or route processor.

Recommended Action No action is required.

IP_HOST_ISSU Messages

This section contains IP host in-service software upgrade (ISSU) messages.

IP_HOST_ISSU-2

Error Message `%IP_HOST_ISSU-2-GET_BUFFER: IP Host ISSU client failed to get buffer for message. Error: %d (%s)`

Explanation The IP host ISSU client failed to get buffer space for building a negotiation message. A negotiation message cannot be sent to the standby device. If a problem occurs with the ISSU session negotiation, the standby device cannot be brought up properly.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show checkpoint client** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-2-INIT: IP Host ISSU client initialization failed to %s. Error: %d (%s)`

Explanation   The IP host ISSU client could not be initialized. This initialization failure must be addressed before an in-service software upgrade or downgrade can be performed successfully. Otherwise, a software upgrade or downgrade will result in downtime.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-2-SEND_NEGO_FAILED: IP Host ISSU client failed to send negotiation message. Error: %d (%s)`

Explanation   The IP host ISSU client failed to send a session negotiation message to the peer device. If a problem occurs with the ISSU session negotiation, the standby device cannot be brought up properly.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show checkpoint client** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-2-SESSION_NEGO: IP Host ISSU client encountered unexpected client nego_done. Error: %d (%s)`

Explanation The IP host ISSU client encountered a client negotiation done state that was unexpected. If a problem occurs with the ISSU session negotiation, the standby device cannot be brought up properly.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging, show issu session,** and **show issu negotiated capability** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-2-SESSION_REGISTRY: IP Host ISSU client failed to register session information. Error: %d (%s)`

Explanation The IP host ISSU client failed to register session information. If a problem occurs with the ISSU session registration, the standby device cannot be brought up properly.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, **show issu capability entries, show issu session,** and **show issu negotiated capability** commands and your pertinent troubleshooting logs.

IP_HOST_ISSU-3

Error Message `%IP_HOST_ISSU-3-CAP_INVALID_SIZE: IP_HOST ISSU client capability list is empty.`

Explanation The IP host ISSU client capability exchange list is empty, which is an invalid condition.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show issu capability entries** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-CAP_NOT_COMPATIBLE: IP Host ISSU client capability exchange result incompatible.`

   Explanation Based on the results of the capability exchange, the IP host ISSU client is not compatible with the peer.

   Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging,** and **show issu negotiated capability** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-INVALID_SESSION: IP Host ISSU client does not have a valid registered session.`

   Explanation The IP host ISSU client does not have a valid registered session.

   Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, **show issu capability entries, show issu session,** and **show issu negotiated capability** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-MSG_NOT_OK: IP Host ISSU client 'Message Type %d' is not compatible`

   Explanation The IP host ISSU client received an incompatible message from the peer device. The message cannot be processed.

   Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging**, **show tech-support, show logging, show issu session, show issu message group**, and
show issu negotiated version commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-MSG_SIZE: IP Host ISSU client failed to get the MTU
for Message Type %d. Error: %d (%s)`

Explanation   The IP host ISSU client was unable to calculate the MTU for the specified message. As
a result, the client is not able to send the message to the standby device.

Recommended Action   Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging**, **show tech-support, show logging, show issu session, show issu message group**, and
show issu negotiated version commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-SESSION_UNREGISTRY: IP Host ISSU client failed to
unregister session information. Error: %d (%s)`

Explanation   The IP host ISSU client failed to unregister session information.

Recommended Action   Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging**, **show tech-support, show logging, show issu session**, and **show issu negotiated
capability** commands and your pertinent troubleshooting logs.

Error Message `%IP_HOST_ISSU-3-TRANSFORM_FAIL: IP Host ISSU client %s transform failed for 'Message Type %d'. Error: %d (%s)`

Explanation The IP host ISSU client could not transform the specified message type. If the transmit transformation failed, the checkpoint message was not sent to the standby device. If the receive transformation failed, the checkpoint message was not applied on the standby device. In either case, the IP host state between the active device and the standby device is not identical.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging, show issu session**, and **show issu negotiated version** commands and your pertinent troubleshooting logs.

IPMCAST_LIB Messages

This section contains IP multicast library messages.

IPMCAST_LIB-4

Error Message `%IPMCAST_LIB-4-RPF_DEPTH_ERR: Depth for rpf lookup greater than [dec] for [chars]`

Explanation The number of recursions for resolution of a given route has exceeded the allowed maximum. This is usually due to misconfiguration.

Recommended Action Review and fix the router configuration. If you require further assistance, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPMCAST_LIB-4-RPF_STATIC_ERR: No match for RIB static route [ipv6_addr]/[dec] in static table for root [ipv6_addr]`

Explanation An internal error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPMCAST_LIB-6

Error Message `%IPMCAST_LIB-6-TIMER_BUSY: Timer drift is accumulating, [dec] msecs`

Explanation There is large amount of processing load and the timers are accumulating delay.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPNAT Messages

This section contains IP Network Address Translation (IPNAT) messages.

IPNAT-4

Error Message `%IPNAT-4-ADDR_ALLOC_FAILURE: Address allocation failed for [IP_address], pool [chars] might be exhausted`

Explanation An address could not be allocated from the IP NAT pool. This condition can cause a translation failure and might result in packets being dropped. The counter for missed packets will be incremented.

Recommended Action Determine if the NAT pool has been exhausted. To reuse any existing addresses in the NAT pool for new packet flows, clear the current NAT entries using the **clear ip nat translation** command.

IPNAT-6

Error Message %IPNAT-6-CREATED: [chars]

Explanation A NAT flow entry was created.

Recommended Action No action is required.

Error Message %IPNAT-6-DELETED: [chars]

Explanation A NAT flow entry was deleted.

Recommended Action No action is required.

IPRT Messages

This section contains IP routing (IPRT) messages.

IPRT-4

Error Message %IPRT-4-TRACKOBJECTNONE: Illegal tracking number 0 on static route %i%m [%d/0] via %i, table %d, client %d

Explanation The tracking number 0 was assigned to a static route, but 0 is not a legal value.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPSECV6 Messages

This section contains encryption feature messages.

IPSECV6-4

Error Message `%IPSECV6-4-PKT_PROTOCOL_MISMATCH: IP protocol in packet mismatched`
`with tunnel mode, packet from [chars] to [chars] dropped by [chars]`

Explanation The system tried to send an IPv4 packet into an IPsec IPv6 tunnel, or an IPv6 packet into an IPsec IPv4 tunnel. The tunnel cannot handle this type of packet, and so the packet is dropped.

Recommended Action Modify the tunnel configuration, either by removing the incorrect IP address type from the tunnel interface, or by changing the tunnel mode to match the IP address type.

Error Message `%IPSECV6-4-RECVD_PKT_NOT_IPSECV6: Rec'd packet not an IPSEC packet.`
`(ip) dest_addr=[ipv6_addr], src_addr=[ipv6_addr], prot= [dec]`

Explanation A received packet matched the crypto map ACL, but is not IPsec-encapsulated. An IPsec peer is sending unencapsulated packets. There may be a policy setup error on the peer. This activity could be considered a hostile event.

Recommended Action Contact the administrator of the router or host that sent the packet to compare policy settings.

Error Message `%IPSECV6-4-RECVD_PKT_V6_INV_PROT: decapsulate: packet missing`
`[chars], destadr[ipv6_addr], actual prot=[dec]`

Explanation A received IPsec packet is missing an expected AH or ESP header The peer is sending packets that do not match the negotiated security policy. This activity could be considered a hostile event.

Recommended Action Contact the administrator of the router or host that sent the packet to compare policy settings.

Error Message `%IPSECV6-4-RECVD_PKT_V6_INV_SPI: decaps: rec'd IPSEC packet has`
`invalid spi for`
`destaddr[ipv6_addr], prot=[dec], spi=[hex]([dec]), srcaddr[ipv6_addr]`

Explanation A received IPsec packet specifies SPI that does not exist in SADB. This may be a temporary condition due to slight differences in aging of SAs between the IPsec peers, or it may be because the local SAs have been cleared. It may also be because of invalid packets sent by the IPsec peer. This activity could be considered a hostile event.

Recommended Action If the local SAs have been cleared, the peer may not know this. In this case, if a new connection is established from the local router, the two peers may reestablish successfully. Otherwise, if the problem occurs for more than a brief period, either attempt to establish a new connection or contact the peer's administrator.

Error Message `%IPSECV6-4-RECVD_PKT_V6_MSG_LEN_ERR: decapsulate: packet has bad [chars] length destadr[ipv6_addr], prot=[dec], len=[dec]`

Explanation A received IPsec packet is malformed, possibly because of an encapsulation error. The peer is sending malformed packets. It may be due to a decryption error. This activity could be considered a hostile event.

Recommended Action Contact the peer's administrator.

IP_SNMP Messages

This section contains IP Simple Network Management Protocol (SNMP) messages.

IP_SNMP-4

Error Message `%IP_SNMP-4-NOTRAPIPV6: SNMP trap source %s has no ipv6 address`

Explanation The user entered an **snmp-server trap-source** command. The interface requested for use as the source address has no IPv6 address associated with it. The SNMP trap is being sent anyway, but without the source address that the user intended.

Recommended Action Enter a **no snmp-server trap-source** command to disable the request for a specific source IP address, or add an IPv6 address to the interface referenced in the **snmp-server trap-source** configuration command.

IPV6 Messages

This section contains IP version 6 messages.

IPV6-3

Error Message `%IPV6-3-(-1): Cannot start the IPv6 process; router will not process IPv6 packets.`

Explanation The IPv6 process could not be started. This machine will not be able to process any IPv6 packets.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message `%IPV6-3-INTERNAL: Internal error, [chars]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPV6-3-INTERNAL_PAK: Internal error ([chars]): [hex] [hex] [chars]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPV6-3-NO_UNIQUE_IDENTIFIER: Cannot determine an unique IPv6 identifier for the system.IPv6 will not be started.`

Explanation An unique IPv6 Identifier could not be determined for the system. Therefore the IPv6 process will not be started.This machine will not be able to process any IPv6 packets.

Recommended Action Verify that there is at least one interface in this machine that supports IEEE-style addresses.

Error Message `%IPV6-3-RIB: [chars]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IPV6-3-UNFRAGMENTABLE: Cannot fragment packet: unfragmentable part length [dec], MTU of [dec]`

Explanation An internal software error occurred. A single packet originated by this system could not be fragmented and has been dropped. Normal system operation continues.

Recommended Action This is a transient error. However, this condition indicates other errors in the software that will require further examination by your Cisco technical support representative. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IPV6-4

Error Message `%IPV6-4-DUPLICATE_OPTIMISTIC: Duplicate address %P on %s`

Explanation You have elected not to run duplicate address detection (DAD), but another system is using your IPv6 address.

Recommended Action Change the IPv6 address of one of the two systems.

Error Message `%IPV6-4-LLA_CONFLICT: LLA conflict for static neighbor on [chars] : [chars]`

Explanation A neighborhood discovery (ND) message from the specified neighbor carries a link-layer address (LLA) other than the configured address.

Recommended Action Reconfigure the static neighbor with the correct link-layer address.

Error Message `%IPV6-4-MAXPDB: Exceeded maximum supported IPv6 Routing Protocol instances`

Explanation Configuration of a routing protocol has failed because it would exceed the maximum supported number of routing protocols.

Recommended Action Reduce the number of IPv6 routing protocol instances configured.

IPV6-6

Error Message %IPV6-6-ACCESSLOGSP: list [chars]/[dec] [chars] [chars] [chars]->, [dec] packet[chars]

Explanation A packet matching the log criteria for the given access list was detected.

Recommended Action No action is required.

Error Message %IPV6-4-MULTICAST: Application does not support multicast destination address , packet dropped.

Explanation An internal software error occurred. A multicast destination address was used in an local application which does not yet handle IPv6 multicast.

Recommended Action Use a unicast address in commands on the router. If the problem persists, or you feel the command should support multicast, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IP_VRF Messages

This section contains IP VPN routing/forwarding instance common error (IP_VRF) messages.

IP_VRF-3

Error Message %IP_VRF-3-VRF_CACHE_ADD_ERROR: [chars]

Explanation A cached VRF entry could not be created.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_CACHE_INIT_ERROR: [chars]`

Explanation A cached VRF entry could not be initialized.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_CACHE_UPDATE_IF_LIST_FAIL: [chars]`

Explanation An update of the cached interface list for VRF failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_CHKPT_TX_FAIL: [chars]`

Explanation An attempt to send a VRF table ID checkpoint message has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_CMN_INVALID_PARAM: [chars]`

Explanation An invalid parameter was used.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_CREATE_FAIL: [chars]`

Explanation Creation of an IP VRF has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_ID_INVALID_ERROR: Invalid VRF id [hex] in [chars]`

Explanation The VRF ID is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_IFLIST_NOT_EMPTY: VRF [chars] iflist is not empty in` `[chars]`

Explanation The VRF interface list is not empty

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_IVRF_ERROR: [chars]`

Explanation A VRF infrastructure failure for platform VRFs occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_MALLOC_FAIL: Memory allocation failure`

Explanation Memory could not be allocated for a VRF.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_MISSING_NAME_REC: VRF [dec] name record is null [chars]`

Explanation VRF name record is null

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_TABLEID_INCONSISTENT: [chars]`

Explanation The VRF table ID is inconsistent between two RPs.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IP_VRF-3-VRF_TABLEID_INVALID: [chars]`

Explanation The VRF table ID is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IP_VRF-4

Error Message `%IP_VRF-4-VRF_DELETE_WAIT: The VRF [chars] is getting deleted after a wait`

Explanation There are routes remaining in the deleted VRF routing table. To ensure reusablity of the same VRF, the system forcibly clears the routes in the VRF routing table, which causes the VRF to be deleted.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISA Messages

This section contains Integrated Services Adapter (ISA) messages.

Error Message `%ISA-1-ALIGN: Alignment failure on packet buffer: [hex]`

Explanation A software error has occurred. The ISA driver detected that the buffer is not aligned correctly.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISA-1-ERROR: [chars]`

Explanation An error occurred in the application using ISA.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISA-6-INFO: [chars]

Explanation This is an informational message from ISA.

Recommended Action This is an informational message only and occurs in normal operation. No
action is required.

Error Message %ISA-1-INITDESCRING: Slot [dec]: The ISA driver failed to allocate
"descriptor offsets" write_offsets: [hex], read_offsets: [hex], stored_offsets:
[hex]

Explanation The ISA driver failed to initialize at the specified point.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISA-1-INITFAIL: Slot [dec]: [chars]

Explanation The ISA driver failed to initialize at the specified point.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISA-1-NOMEMORY: [chars] creation failed for slot [dec]`

Explanation The ISA driver, in its initialization phase, could not allocate memory for the specified data structure.

Recommended Action Consider adding more shared memory. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISA-1-OWNER: [chars] packet buffer, pak=[hex]`

Explanation A software or hardware error has occurred. The ISA driver detected that the buffer ring is in an inconsistent and unrecoverable state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISA-6-SHUTDOWN: [chars] shutting down`

Explanation The specified ISA is shutting down. It may have been physically removed.

Recommended Action This is an informational message only and occurs in normal operation. No action is required.

Error Message `%ISA-1-TOOBIG: [chars] received a packet with size [dec].`

Explanation The system has received a packet that is larger than the allowed size.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU Messages

This section contains In-Service Software Upgrade (ISSU) messages.

ISSU-3

Error Message %ISSU-3-BAD_PARAMS: %s

Explanation Bad parameters were detected in the ISSU process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-BASE_CLIENT_CHECK_COMPATIBILITY: %s

Explanation An error was found during checking of the ISSU base client compatibility.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-CLIENT_OR_ENTITY_NOT_REG: Client([dec]) or entity([dec]) is not registered [chars].

Explanation The specified client or entity is not registered.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and

utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-CLIENT_REG_DIST: Failed to %s distributed client %d

Explanation A distributed client reservation or unreservation failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-DEBUG_ERROR: [chars]

Explanation An error occurred when turning on ISSU debug.

Recommended Action Enter the **show issu client** | **grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-DUMY_ENTRY_NOT_LAST: Dumy cap entry is not last one for cap group([dec]) registration under client([dec]) and entity([dec])

Explanation The dummy cap entry is not the last one for the cap group registration.

Recommended Action Enter the **show issu client** | **grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-DUMMY_VERSION_OUT_OF_RANGE: Dummy msg version (%d) is out of range for msg(%d) under client %s(%d) and entity(%d).

Explanation The dummy message version is out of range.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show issu message type | include** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-DUP_DUMMY_VERSION_REG: %s is already registered under client %s(%d), entity(%d), and msgtype(%d)

Explanation The specified item is registered already under that message type.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show issu message type | include** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-DUP_ENTITY_REG: Entity([dec]) is registered already under client([dec])

Explanation The entity is duplicated under the client.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-DUP_ITEM_IN_REG_UNDER_ENTITY: [chars] is duplicated [chars]`
`under client([dec]) and entity([dec])`

Explanation Item is duplicated under the client and entity.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly
as it appears on the console or in the system log. Research and attempt to resolve the issue using the
tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and
utilities will supply clarifying information. Search for resolved software issues using the Bug
Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require
assistance, open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-DUP_REG_ENDPOINT: Endpoint is registered already.`

Explanation The endpoint is already registered.

Recommended Action Enter the **show issu endpoint** command to check if the ISSU subsystem was
initialized twice.

Error Message `%ISSU-3-DUP_REG_UNDER_ENDPOINT: [chars]([dec]) is registered already`
`under endpoint.`

Explanation The item is already registered under the endpoint.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly
as it appears on the console or in the system log. Research and attempt to resolve the issue using the
tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and
utilities will supply clarifying information. Search for resolved software issues using the Bug
Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require
assistance, open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-DUP_REG_UNDER_ENTITY: [chars]([dec]) is registered already`
`under client([dec]) and entity([dec])`

Explanation The item is already registered under the client and entity.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly
as it appears on the console or in the system log. Research and attempt to resolve the issue using the
tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and

utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-EMPTY_DUMMY_VERSION: %s is empty under client %s(%d), entity(%d).`

Explanation The dummy version is empty.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-EMPTY_UNDER_CLIENT: [chars] is empty under client([dec]).`

Explanation The item is empty in the client.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-EMPTY_UNDER_ENDPOINT: [chars] is empty under endpoint.`

Explanation The item is empty under the endpoint.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-EMPTY_UNDER_ENTITY: [chars] is empty [chars] under client([dec]) and entity([dec]).

Explanation   The item is empty in the client and entity.

Recommended Action   Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-ENDPOINT_NOT_REG: Endpoint is not registered yet.

Explanation   The endpoint is not registered yet.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-ERP_AGENT: [chars]

Explanation   One of the primary functions for the ERP agent failed.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-ERP_AGENT_SEND_MSG: [chars]; error code is [chars]`

Explanation The send message function call failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-ERP_CLIENT: [chars]`

Explanation One of the primary functions for the ERP client failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-ERP_CLIENT_EVENT: Unknown [chars] event - [dec]`

Explanation An unknown event was received.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-EXTERNAL_MATRIX_FILE_ERR: Line %u: %s`

Explanation An error was found in the external matrix data file.

Recommended Action Open a case with TAC, and attach the output of the **more ivfs:/***matrix_cm_file* command, where *matrix_cm_file* is the output of the **dir system:image** command.

Error Message `%ISSU-3-FAILED_TO_ALLOC_CHUNK_MEMORY: [chars] type chunk allocation failed.`

Explanation A memory allocation has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_DUMMY_VERSION: Can not allocate %s under client %s(%d) and entity(%d)`

Explanation The ISSU process could not allocate a dummy version under the client and entity.

Recommended Action Enter the **show proc mem** or **show buffs** command to determine whether the memory or buffer is full, indicating a possible memory leak. To recover, shut down any unused tasks and reset the cards. If these actions do not help, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_ENTITY: Can not allocate entity([dec]) under client([dec])`

Explanation Cannot allocate an entity control block under the client.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_FUNCT_UNDER_ENDPOINT: Can not allocate [chars].`

Explanation Cannot allocate the function callback.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shutingt down unused tasks or resetting cards usually can recover those memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/pcgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_FUNCT_UNDER_ENTITY: Can not allocate [chars] under client([dec]) and entity([dec])`

Explanation Cannot allocate control block under the client and entity.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_MEMORY: memory allocation for %s failed.`

Explanation The ISSU process could not allocate memory.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_UNDER_ENDPOINT: Can not allocate [chars]([dec]) control block.`

Explanation Cannot allocate a control block.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_UNDER_ENTITY: Can not allocate [chars]([dec]) under client([dec]) and entity([dec])`

Explanation Cannot allocate a control block under the client and entity.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_UNDER_GROUP: Can not allocate [chars]([dec]) for [chars]([dec]) registration under client([dec]) and entity([dec])`

Explanation Cannot allocate an item for group registration under the client and entity.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_UNDER_MSG: Can not allocate [chars] for msg ([dec]) registration under client([dec]) and entity([dec])`

Explanation Cannot allocate a control block for message registration.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_ALLOC_UNDER_MSG_SES: Can not allocate [chars] for msg session([dec]) registration under client([dec]) and entity([dec])`

Explanation Cannot allocate a control block for message session registration.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_CREATE_ID32_SPACE: Failed to create ID32 space.`

Explanation Failed to create ID32 space.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak problem. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_INIT_ISSU_PROTO: Failed to initialize ISSU proto.`

Explanation Failed to initialize the ISSU protocol.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FAILED_TO_UNREG_SES: Failed to unregister [chars] session
under client([dec]) and entity([dec])`

Explanation Failed to unregister the session.

Recommended Action Enter the **show proc mem** or **show buffs** command to check if memory or
buffer is full. Shuting down unused tasks or resetting cards usually can recover a memory leak
problem. If this message recurs, copy the message exactly as it appears on the console or in the
system log. Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FOREIGN_OWNED_FIELDS: %s; err code [%s]`

Explanation The transformation of a foreign owned field (FOF) has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FSM_BADMSG: Session [dec] in received message [chars] is wrong.`

Explanation Sessions on peers are mismatched or were not found.

Recommended Action Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FSM_DUP_UID: Duplicate unique_id on session [dec]: my_uid [dec], peer_uid [dec].`

Explanation The requirement that each endpoint must have distinctive identifier has been violated.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-FSM_INIT: Fail to create process during FSM init.`

Explanation Creation of an FSM timer process has failed.

Recommended Action Check what system resources are available during bootup.

Error Message `%ISSU-3-FSM_MISMATCH_MTU: ISSU nego failed for client %s(%d) entity_id %d session %d due to mismatch of mtu size %d & %d.`

Explanation The ISSU negotiation failed due to a mismatch in the negotiation version MTU size.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging, show issu message types**, and **show issu fsm | include** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-FSM_NEGO_SEND_ERR: Client '%s' with ID %d encountered '%s' in session %d.

Explanation The ISSU negotiation message could not be sent.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging, show issu session | include**, and **show issu fsm** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-FSM_RUNTIME_ERR: [chars] occurs during FSM negotiation in session [dec].

Explanation Runtime error occurs during FSM negotiation.

Recommended Action Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-HANDLE_SIZE: Handle buffer size is %d, should be %d

Explanation A statically defined handle buffer size is incorrect.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-INCOMPATIBLE_BASE_CLIENTS: %s

Explanation This message displays a list of ISSU base clients found to be incompatible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-INCOMPATIBLE_PEER_UID: Setting image (%s), version (%s) on peer uid (%d) as incompatible

Explanation The peer client is incompatible.

Recommended Action Synchronize the configurations and reload the standby supervisor.

Error Message %ISSU-3-INCONSISTENT_MSG_TYPE: %s

Explanation A runtime registration error has occurred. Message types passed for foreign owned fields (FOFs) are inconsistent.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-IN_USE_UNDER_ENDPOINT: [chars]([dec]) is in use under endpoint

Explanation Item is in use under the endpoint.

Recommended Action Enter the **show issu session** | **grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools

and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-IN_USE_UNDER_ENTITY: [chars]([dec]) is in use under client([dec]) and entity([dec])`

Explanation Item is in use under the client and entity.

Recommended Action Enter the **show issu session** | **grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-INVALID_ITEM_UNDER_ENDPOINT: Invalid [chars] under endpoint`

Explanation Invalid item under the endpoint.

Recommended Action Enter the **show issu session** | **grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-INVALID_ITEM_UNDER_ENTITY: Invalid [chars] under client([dec]) and entity([dec])`

Explanation Invalid item under the client and entity.

Recommended Action Enter the **show issu session** | **grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-INVALID_PARAM_UNDER_SES: Invalid params %s under session(%d)

Explanation Invalid parameters were detected under the session.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show issu session | include** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-INVALID_VERSION_LOWHIGH: Invalid low([dec]) and high([dec]) value for msg([dec]) under client([dec]) and entity([dec]).

Explanation Invalid low and high value for group registration.

Recommended Action Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU-3-IPC_PORT: Port name '[chars]' failure; reason is '[chars]'.

Explanation Creation or removal of the named port failed for IPC.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-ISSU_INIT_NOT_COMPLETE: %s`

Explanation ISSU initialization has not been completed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-JID: Failed to get the local process JID with err %d`

Explanation The system manager call to collect the job ID has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-MISSING_ITEM_IN_REG: [chars]([dec]) is not available [chars] under client([dec]) and entity([dec])`

Explanation Item is not available for registration.

Recommended Action Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-MSG_NEGO_RESULT_CHUNK: Failed to %s element %x`

Explanation The message negotiation result element could not be locked or freed, indicating an invalid element or corrupted memory.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-MSG_SES_IN_MSG_NOT_FOUND: The intended session %d specified in received %s for client %s(%d) is not found.`

Explanation No session could be found with the session ID specified in the received message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show issu session | include** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NON_ISSU_ID_UNDER_ENDPOINT: Non ISSU [chars]`

Explanation Peer endpoint does not support ISSU.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NO_PEER_UID: No peer uid found at [chars]`

Explanation No peer UID with this value was found registered in the ISSU database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_DUMY_CAP_TYPE: Cap type([dec]) is not dumy one.`

Explanation Cap type is not dummy.

Recommended Action Enter the **show issu cap type** | **grep** *cap type* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_ENTITY: Can not find entity([dec]) under client([dec]).`

Explanation Cannot find entity under the client.

Recommended Action Enter the **show issu session** | **grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_FUNCT_UNDER_SESSION: Can not find [chars] under [chars] session([dec]).`

Explanation   Cannot find function under the session.

Recommended Action   Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_MSG_SES: Can not find message session([dec]) [chars].`

Explanation   Cannot find message session.

Recommended Action   Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_UNDER_ENDPOINT: Can not find [chars]([dec]) control block under endpoint.`

Explanation   Cannot find a control block under the endpoint.

Recommended Action   Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_UNDER_ENTITY: Can not find [chars]([dec]) control block under client([dec]) and entity([dec]).`

Explanation Cannot find a control block under the client and entity.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_FIND_UNDER_SESSION: Can not find [chars]([dec]) under [chars] session([dec]).`

Explanation Cannot find item under the session.

Recommended Action Enter the **show issu session | grep** *session id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_REG_UNDER_ENDPOINT: [chars]([dec]) is not registered under endpoint.`

Explanation Item is not registered under the endpoint.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NOT_REG_UNDER_ENTITY: [chars]([dec]) is not registered under client([dec]) and entity([dec])`

Explanation Item is not registered under the client and entity.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NO_UID: No uid ([dec]) registered with ISSU at [chars]`

Explanation No UID with this value was found registered in the ISSU database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NULL_CALLBACK_UNDER_ENDPOINT: [chars] callback is NULL for registration.`

Explanation Callback is NULL for registration.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NULL_CALLBACK_UNDER_ENTITY: [chars] callback is NULL for msg session registration under client([dec]) and entity([dec])`

>   **Explanation**   Callback is NULL for message session registration.

>   **Recommended Action**   Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-NULL_CALLBACK_UNDER_SESSION: Can not register null [chars] callback in [chars] session([dec]).`

>   **Explanation**   Cannot register NULL callback in the session.

>   **Recommended Action**   Enter the **show issu session | grep** *session id* and **show issu fsm | grep** *session id* commands. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-PEER_IMAGE_INCOMPATIBLE: Peer image (%s), version (%s) on peer uid (%d) is incompatible`

>   **Explanation**   The peer client is incompatible.

>   **Recommended Action**   Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-PEER_IMAGE_NOT_IN_INCOMP_LIST: Peer image (%s), version (%s) on peer uid (%d) is not in the incompatible images list`

>   **Explanation**   The peer client is incompatible.

>   **Recommended Action**   Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-PEER_IMAGE_REM_FROM_INCOMP_LIST: Peer image (%s), version (%s) on peer uid (%d) being removed from the incompatibility list`

Explanation The peer client is incompatible.

Recommended Action Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-PEER_INCOMP_SET: Peer incompatibility set for image (%s), version (%s) on peer uid (%d)`

Explanation The peer client is incompatible.

Recommended Action Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-PEER_UID_CB_IS_NULL: Peer uid control block is NULL`

Explanation The peer client is incompatible.

Recommended Action Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-PROTO_CLIENT_ENTITY_UNREG: Proto Client entity unreg for [chars] has failed`

Explanation A protocol client has failed to unregister its entity with ISSU.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-PROTO_CLIENT_REG: Proto Client registration for [chars] has failed`

Explanation Protocol client has failed to register with ISSU.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-REF_TREE: %s reference tree %s failed`

Explanation   The AVL-based ISSU reference tree operation failed.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-SESSION_ID_ERROR: Failed to %s session id %d for %s`

Explanation   A session ID related operation failed.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-SESSION_RENEGOTIATE: Client Attemptiong to renegotiate on session [dec]`

Explanation   A client is attempting to renegotiate a session without unregistering it and doing the negotiation over again. This is not allowed.

Recommended Action   Unregister the message session first, and then reregister and attempt the negotiation.

Error Message `%ISSU-3-SET_UNKNOWN_UID: Unknown unique_id is set.`

Explanation   Platform team should provide distinctive identifier for the endpoint.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-TRANSPORT_ERP_UID_CB_IS_NULL: Transport ERP uid control block is NULL`

Explanation The peer client is incompatible.

Recommended Action Synchronize the configurations and reload the standby supervisor.

Error Message `%ISSU-3-UNKNOWN_ENTITY_ID: Unknown entity id under client([dec])`

Explanation There is an unknown entity ID under the specified client.

Recommended Action Enter the **show issu client** | **grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-UNKNOWN_ID_UNDER_ENDPOINT: Can not use unknown [chars].`

Explanation Cannot use the specified unknown ID.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-UNKNOWN_ID_UNDER_ENTITY: Unknown [chars] under client([dec]) and entity([dec])`

Explanation Unknown ID under the specified client and entity.

Recommended Action Enter the **show issu client** | **grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug

Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-VERSION_LOWHIGH_NOT_MATCH_TABLE_SIZE: Version low([dec]) and high([dec]) value for msg([dec]) does not match table size([dec]) under client([dec]) and entity([dec]).`

Explanation Version low and high values for the specified message do not match the specified table size.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-VERSION_OUT_OF_ORDER: Msg version([dec],[dec]) is out of order for msg([dec]) under client([dec]) and entity([dec]).`

Explanation The specified message version is out of order for the specified group registration.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-3-VERSION_OUT_OF_RANGE: Msg version([dec],[dec]) is out of range for msg([dec]) under client([dec]) and entity([dec]).`

Explanation The specified message version is out of range for the specified group registration.

Recommended Action Enter the **show issu client | grep** *client id* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require

assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU-4

Error Message `%ISSU-4-FSM_INCOMP: Version of local ISSU client [dec] in session [dec] is incompatible with remote side.`

Explanation The protocol versions of the local and remote clients are incompatible. These clients cannot communicate with each other.

Recommended Action Use the **show version** and **show issu clients** commands to help verify that the software images are incompatible. Upgrade the software images on each unit to versions that are compatible. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-4-MSG_INCOMP: Message([dec]) is incompatible under msg session([dec]).`

Explanation The specified message is incompatible under the specified message session.

Recommended Action Enter the **show issu session | grep** *session id* and **show issu fsm | grep** *session id* commands. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU-4-NEGO_NOT_FINISHED: Negotiation is not finished for client [dec], msg session([dec]).`

Explanation Negotiation is not finished for the specified client and message session.

Recommended Action Enter the **show issu session | grep** *session id* and **show issu fsm | grep** *session id* commands. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU_CS Messages

This section contains ISSU configuration synchronization messages.

ISSU_CS-3

Error Message `%ISSU_CS-3-BULK_CONFIG_TR: [chars] [chars]`

Explanation ISSU bulk configuration synchronization transformation failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_CS-3-DL: [chars] [chars]`

Explanation The ISSU configuration synchronization difference list is displayed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU_CS-3-DL_STATS: [chars][dec][chars]

Explanation ISSU configuration synchronization difference list statistics are displayed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU_CS-3-LBL_CONFIG_TR: [chars] [chars]

Explanation ISSU line-by-line configuration synchronization transformation failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU_CS-3-SKL: [chars] [chars]

Explanation An ISSU configuration synchronization SKL operation failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU_CS_DL_MESSAGES Messages

This section contains ISSU configuration synchronization difference list messages.

ISSU_CS_DL_MESSAGES-3

Error Message %ISSU_CS_DL_MESSAGES-3-DL_CLI_DUMP: [chars][dec][chars][dec][chars]

Explanation ISSU configuration synchronization difference list CLI generation statistics are displayed.

Recommended Action No action is required.

ISSU_ERROR Messages

This section contains ISSU error messages.

ISSU_ERROR-2

Error Message %ISSU_ERROR-2-CLIENT_INCOMPATIBLE: %s(%d): ISSU Client not compatible

Explanation The ISSU client is incompatible with the current version.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %ISSU_ERROR-2-NEGO_NOT_DONE: %s(%d): ISSU Negotiation not complete

Explanation The ISSU client was unable to complete ISSU negotiation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-2-NTI_EP_TYPE_REG: %s(%d): Failed to register EP type (%d) with NTI: %s (%d)`

Explanation The ISSU client could not register the endpoint (EP) type with the Negotiation Trigger Infrastructure (NTI).

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-2-NTI_EP_TYPE_UNREG: %s(%d): Failed to unregister EP type (%d) with NTI: %s (%d)`

Explanation The ISSU client could not unregister the endpoint type with NTI.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-2-NTI_REG: %s(%d): Failed to register with NTI: %s (%d)`

Explanation The ISSU client could not register with NTI.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-2-NTI_UNREG: %s(%d): Failed to unregister with NTI: %s (%d)`

Explanation The ISSU client could not be unregistered with NTI.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU_ERROR-3

Error Message `%ISSU_ERROR-3-CAPENTRY_REG: %s(%d): failed to register a capability entry (%s)`

Explanation The ISSU client failed to register a capability entry.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CAPGROUP_REG: %s(%d): failed to register a capability group (%s)`

Explanation The ISSU client failed to register a capability group.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CAPTYPE_REG: %s(%d): failed to register capability type (%s)`

Explanation The ISSU client failed to register a capability type.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CAP_EXCHANGE: %s(%d): Capability exchange failed with error (%s)`

Explanation The capability exchange failed and the ISSU client is unable to process the received capability.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CAP_REG: %s(%d): failed to register its capabilities (%s)`

Explanation The capabilities of the ISSU client could not be registered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CF_SEND: %s(%d): Client failed to send message (%d)`

Explanation The ISSU client cannot send a negotiation message to a peer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CLIENT_REG: %s(%d): Client failed to register (%s)`

Explanation The ISSU client could not be registered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-CLIENT_REG_FAILED: %s(%d): Client is not initialized`

Explanation The ISSU client is not initialized. The negotiation for this client is not yet done.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-ENTITY_REG: %s(%d): failed to register the entity (%s)`

Explanation The ISSU entity could not be registered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-ENTITY_UNREG: %s(%d): failed to unregister the entity (%s)`

Explanation The ISSU entity could not be unregistered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-ICC_SEND: %s(%d): Client failed to send message`

Explanation The ISSU client cannot send a negotiation message to a peer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSGGROUP_REG: %s(%d): failed to register a message group (%s)`

Explanation The ISSU client cannot register a message group.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSGTYPE_REG: %s(%d): failed to register a message type (%s)`

Explanation The ISSU client cannot register a message type.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSG_MTU: %s(%d): Client failed to get mtu for message %d (%s)`

Explanation The ISSU client cannot get the MTU for the message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSG_NOT_OK: %s(%d): ISSU message type (%d) is not compatible`

Explanation The ISSU process received a message not compatible with the running version.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show message type** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSG_POLICY: %s(%d): Client failed to negotiate version for message type (%d), error (%s)`

Explanation The ISSU client cannot negotiate the message type with a peer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MSG_REG: %s(%d): failed to register its messages (%s)`

Explanation Messages for the ISSU client could not be registered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-MTU_NOT_ENOUGH: %s(%d): Requested buffer size (%d) is greater than the max MTU size (%d)`

Explanation The checkpoint buffer size requested is greater than the maximum MTU size supported by the checkpoint feature.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-NEGO_PROCESS: %s(%d): Cannot create process: %s`

Explanation The process to negotiate the session for the specified ISSU client cannot be created.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-REG_ARBITRATE_CALLBACK: %s(%d): Failed to register first speaker arbitration callback - %s)`

Explanation The ISSU client could not register the first speaker arbitration callback.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-SESSION_REG: %s(%d): session failed to register (%s)`

Explanation   The client's ISSU session could not be registered.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-SESSION_UNREG: %s(%d): session (%d) failed to unregister (%s)`

Explanation   The client's ISSU session could not be unregistered.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-START_NEGO_FAILED: %s(%d): failed to start negotiation (%s)`

Explanation   The ISSU client cannot start its negotiation.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-TRANSFORM_FAILED: %s(%d): %s transformation failed (%s)`

Explanation The transformation operation for the ISSU message has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_ERROR-3-TRANSFORM_FAILED_DETAILED: %s(%d): %s transformation failed for message %d, endpoint %d (%s)`

Explanation The transformation operation for the ISSU message has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU_PROCESS Messages

This section contains ISSU process messages.

ISSU_PROCESS-3

Error Message `%ISSU_PROCESS-3-ABORTVERSION: issu loadversion; %s`

Explanation The ISSU **abortversion** command can be run only from the LoadVersion or RunVersion ISSU state.

Recommended Action Reinitialize the ISSU process.

Error Message %ISSU_PROCESS-3-ACCEPTVERSION: issu acceptversion; %s

Explanation The ISSU **acceptversion** command did not execute because one of the following conditions was not met:
— The active supervisor was not in the RunVersion ISSU state.
— The active supervisor's ROMMON does not contain the current version.
— The active supervisor's ROMMON does not contain the primary version.
— The primary and current versions are not the same.
— The standby supervisor's ROMMON does not contain the current version.
— The standby supervisor's current and primary image names are different.
— The active supervisor does not have the secondary version.
— The active's secondary version and the standby's current version are different.

Recommended Action Correct the condition and retry the command.

Error Message %ISSU_PROCESS-3-COMMITVERSION: issu commitversion; %s

Explanation The ISSU **commitversion** command did not execute because one of the following conditions was not met:
— The current ISSU state is not RunVersion.
— The secondary version does not exist on the standby supervisor.
— The standby BOOT variable does not exist.
— The new image is not the first in BOOT on the standby supervisor.
— The active BOOT variable is not set.
— The primary version does not exist on the active supervisor.
— The new image is not the first in the active BOOT.
— The configuration register is not 0x2102.

Recommended Action Correct the error condition and retry the command.

Error Message %ISSU_PROCESS-3-CONFIGREG: ISSU process is in progress; Changing configuration register might disrupt the upgrade process

Explanation The configuration register value should not be changed while the ISSU process is in progress.

Recommended Action The low-order byte of the configuration register should be 0x02 during the upgrade process.

Error Message %ISSU_PROCESS-3-FILESYS: '[chars]' filesystem does not exist

Explanation Verification of the file system failed.

Recommended Action Download the file to the flash disk.

Error Message `%ISSU_PROCESS-3-IMAGE: %s is loading the wrong image [ %s ], expected image [ %s ]`

Explanation The wrong image is being loaded during the ISSU process.

Recommended Action Check the detail state of the ISSU process and make sure that the correct images are loaded on the active and standby supervisors.

Error Message `%ISSU_PROCESS-3-IPC_AGENT: [chars] [ [chars] ]`

Explanation The ISSU process IPC agent had an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_PROCESS-3-IPC_MSG: %s`

Explanation An error occurred in the setup of the interprocess communication (IPC) message queue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_PROCESS-3-LOADVERSION: %s`

Explanation The ISSU **loadversion** command did not execute because one of the following conditions was not met:
— The standby device is not yet in the HOT state.
— The active or standby device's unit ID is wrong.
— The ISSU process is not in the INIT state.
— The active or standby image does not exist in flash memory.
— The active and standby image names are not the same.
— The configuration register value is not 0x2102.

Recommended Action Correct the error condition and retry the command.

Error Message `%ISSU_PROCESS-3-NVRAM: [chars]`

Explanation NVRAM variables are not set properly.

Recommended Action The ISSU commands or the hardware module command did not set the variables properly. Fix the error and retry the command.

Error Message `%ISSU_PROCESS-3-PARAMETERS: [chars] ([chars]) parameters are wrong`

Explanation The system could not be configured for ISSU.

Recommended Action Fix the error and retry the command.

Error Message `%ISSU_PROCESS-3-PEER: %s`

Explanation The ISSU process cannot continue with negotiation because it cannot verify the peer's state.

Recommended Action Make sure the peer is present and try again. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show version,** and **show issu state** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_PROCESS-3-PRST: %s`

Explanation The specified persistent variables are not set properly.

Recommended Action Check the ISSU commands and the **hw-module** command to determine whether the specified variables are set properly.

Error Message `%ISSU_PROCESS-3-RF: [chars] [ [chars] ]`

Explanation The ISSU process RF client had an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_PROCESS-3-ROLLBACK_TIMER: [chars]`

Explanation The rollback timer could not be configured.

Recommended Action Fix the error and retry the command.

Error Message `%ISSU_PROCESS-3-RUNVERSION: issu runversion; %s`

Explanation The ISSU **runversion** command did not execute because one of the following conditions was not met:
— The standby device is not in the RF STANDBY HOT state.
— The current ISSU state is not LoadVersion.
— The primary version image does not exist in the active supervisor's ROMMON.
— The configuration register value is not 0x2102.
— The ISSU state could not be set to RunVersion.

Recommended Action Correct the error condition and retry the command.

Error Message `%ISSU_PROCESS-3-SYSTEM: [chars]`

Explanation The system could not be configured for ISSU.

Recommended Action Correct the error condition and retry the command.

Error Message `%ISSU_PROCESS-3-TRANSFORM: [chars] [ [chars] ]`

Explanation The ISSU process transform utility had an error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%ISSU_PROCESS-3-UAM: %s`

Explanation An unexpected return code failure was received from the Upgrade Analysis Module (UAM).

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

ISSU_PROCESS-7

Error Message `%ISSU_PROCESS-7-DEBUG: %s`

Explanation This message displays debug commands for the ISSU process. The system is attempting to recover from an unknown error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support,** and **show logging** commands and your pertinent troubleshooting logs.

ISSU_PROXY Messages

This section contains ISSU proxy messages.

ISSU_PROXY-3

Error Message `%ISSU_PROXY-3-ISSU_PROXY_TIMEOUT: ICC Timed Out after waiting for %dsecs.`

Explanation The ISSU proxy on the route processor initiated an asynchronous intercard communication (ICC) call to the switch processor to perform an ISSU command. This call did not return within the wait period.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IXP_MAP Messages

This section contains ESF network processor client mapper (IXP_MAP) messages.

IXP_MAP-3

Error Message `%IXP_MAP-3-ATOM: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation   A software programming error for the ATOM ESF network processor client mapper was detected.

Recommended Action   This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-DROP_BLOCK: [chars] error detected - [hex] [hex] [dec] [dec]`

Explanation   An error was detected during the processing of ESF network processor drop block allocations.

Recommended Action   This is a software programming error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-EXMEM: [chars] [chars] error detected - [chars] ([dec])`

Explanation   An error was detected managing the external memory of a network processor.

Recommended Action   This is a software programming error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IXP_MAP-3-HQF: [chars] error detected: [chars] [chars] [hex] [hex]

Explanation A software programming error for the HQF ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IXP_MAP-3-INITFAIL: Initialization Failed - [chars]: [chars] [chars]

Explanation Memory needed to service one or more network processors could not be initialized.

Recommended Action Try to reload the Cisco IOS image on the affected card or platform. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IXP_MAP-3-INTF: [chars] error detected: [chars] [chars] [hex] [hex]

Explanation A software programming error for the interface ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-LOCK_BLOCK: [chars] error detected - [hex] [dec] [dec] [dec]`

Explanation An error was detected during the processing of ESF network processor lock bit allocations.

Recommended Action This is a software programming error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-LOCK_LIST: [chars] error detected - [hex] [dec] [dec] [dec]`

Explanation An error was detected during the processing of ESF network processor lock bit allocations.

Recommended Action This is a software programming error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-MAXEXCEED: ESF NP Mapper Max Services Exceeded - [chars]: [chars] [dec]`

Recommended Action Change the configuration to reduce the number of services configured. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-MPLSOGRE: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation A software programming error for the MPLSOGRE ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-NOMEM: Memory Allocation Failure - [chars] : [chars]([hex])`

Explanation Memory required to service one or more network processors could not be allocated.

Recommended Action This error may indicate that more memory must be installed on the affected card or platform to service all the features and related entities enabled by the configuration. Attempt to reload the Cisco IOS image on the affected card or platform. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-NOMEM_S: Memory Allocation Failure - [chars]: [chars] [chars]`

Explanation Memory required to service one or more network processors could not be allocated.

Recommended Action This error may indicate that more memory must be installed on the affected card or platform to service all the features and related entities enabled by the configuration. Attempt to reload the Cisco IOS image on the affected card or platform. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages,

these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-NOTFOUND: ESF NP Client Mapper - [chars]: [chars] [hex]`

Explanation The ESF network processor client mapper could not locate a required software element.

Recommended Action Try to reload the Cisco IOS image on the affected card or platform. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-NPUNKNOWN: Unsupported NP - [chars]: [chars] [chars]`

Explanation An unsupported network processor has been detected.

Recommended Action Verify that the correct Cisco IOS image is loaded on the affected card or platform for the configured features. If the error persists,

Recommended Action Verify that the correct Cisco IOS image is loaded on the affected card or platform for the configured features. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-QOS: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation A software programming error for the QOS ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in

the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-QOS_CONFIG: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation A configuration error for the QoS ESF network processor client mapper was detected. This configuration error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition.

Recommended Action Change the configuration to correct the QoS ACL configuration problem. If the condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-STATS_BLOCK: [chars] error detected - [hex] [hex] [dec] [dec] [dec]`

Explanation An error was detected during the processing of ESF network processor statistics block allocations.

Recommended Action This is a software programming error. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-4-STUCK: Client ID([hex], [hex]) not ready on [chars]`

Explanation During reset of the ESF network processor, one or more network processor clients had not completed stop processing.

Recommended Action The system should still operate normally, however, statistics or state collected before the ESF network processor was reset may have been lost. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-TTFIB: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation A software programming error for the VPLS ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%IXP_MAP-3-VPLS: [chars] error detected: [chars] [chars] [hex] [hex]`

Explanation A software programming error for the VPLS ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IXP_MAP-3-WRED: [chars] error detected: [chars] [chars] [hex] [hex]

Explanation A software programming error for the WRED ESF network processor client mapper was detected.

Recommended Action This software programming error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. If the error persists, reset the affected device. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

IXP_MAP-4

Error Message %IXP_MAP-4-IPC_FAIL: ESF IPC Command failed - [chars] NP=[chars] (cmd=[dec] me=[dec] rc=[dec])

Explanation An IPC command sent to the ESF network processor has failed.

Recommended Action This error indicates a possible problem with the network processor hardware or microcode. Reload the affected hardware to clear the condition. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %IXP_MAP-4-QUEUE_LIMIT_EXCEED: Warning: Line card default queue-limit exceeds the maximum transmit packet buffers ([dec]). To ensure high priority traffic is not dropped, apply a QOS policy on each interface and adjust the queue-limit so that the total of the queue-limits on this line card is less than the maximum transmit packet buffers.

Explanation An error for the HQF ESF network processor client mapper was detected. The total of the default queue imits exceeds the maximum transmit packet buffers for this line card. Under high-traffic conditions, the line card may run out of packet buffers and drop high-priority traffic.

Recommended Action This configuration error is not considered fatal to the operation of the ESF network processors. The software is designed to detect and report the error condition. Apply the QoS policy configuration in the output direction of each interface. Adjust the queue limit so that the total of the queue limits on this line card is less than the maximum transmit packet buffers. If this message

recurs, copy the message exactly as it appears on the console or in the system log. Enter the **show policy-map interface** command to gather data that may help identify the cause of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

KEYMAN Messages

This section contains key string encryption (KEYMAN) messages.

KEYMAN-4

Error Message `%KEYMAN-4-KEYSTR_BAD_CRYPTO: Bad encrypted keystring for key id [dec].`

Explanation The system could not successfully decrypt an encrypted key string. The key string may have been corrupted during system configuration.

Recommended Action Reenter the key string command, and reconfigure the key string.

Error Message `%KEYMAN-4-KEYSTR_CRYPTO_TYPE: Type [dec] encryption unknown. Interpreting keystring as literal`

Explanation The system does not recognize the format type. A key string format type value of 0 (unencrypted key string) or 7 (hidden key string), followed by a space, can precede the actual key string to indicate its format. An unknown type value will be accepted, but the system will consider the key string as being unencrypted.

Recommended Action Use the correct format for the value type or remove the space following the value type.

KEYSTORE_SP Messages

This section contains keystore (KEYSTORE) messages.

KEYSTORE_SP-3

Error Message `%KEYSTORE_SP-3-HW_BAD_EEPROM_ERR: Bad EEPROM cell reported in hardware keystore.`

Explanation   A cell in the keystore EEPROM has failed. Write operations are not producing correct results.

Recommended Action   Report this error to your Cisco technical support representative and arrange to have the hardware keystore on the supervisor card replaced.

LANMGR Messages

Error Message `%LANMGR-4-BADRNGNUM: Ring number mismatch on [chars], shutting down the interface`

Explanation   The router detected a conflict in assigned ring numbers for the specified Token Ring. The Ring Parameter Server (RPS) function was shut down to prevent potentially incorrect information from being sourced onto the ring.

Recommended Action   Check all bridges connected to this Token Ring and ensure that they are using the same assigned ring number.

L2 Messages

This section contains Layer 2 (L2) messages.

L2-3

Error Message `L2-3-DUP_REG: L2 Forwarding Engine: [chars] Attempt to program duplicate MAC address`

Explanation   There was an attempt to program a duplicate MAC address in the match registers. [chars] indicates the source of the attempt.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_AGING Messages

This section contains Layer 2 aging (L2_AGING) messages.

L2_AGING-2

Error Message `%L2_AGING-2-DEC_EN_FAIL: Failed to initialize Distributed EtherChannel`

Explanation One or more resources that are required for the distributed EtherChannel operation are
in use.

Recommended Action Remove the monitor session reserved for service modules by entering the **no
monitor session service module** command, and then try to reinitialize the operation.

Error Message `%L2_AGING-2-MALLOC_FAIL: [chars]: Failed to allocate memory for
bitlist`

Explanation There was no memory available to create the bit list.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_AGING-2-SIG_INST_FAIL: [chars]: Failed to install signal handler`

Explanation A signal handler could not be installed for a process that involves Layer 2 aging.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_APPL Messages

This section contains Layer 2 application (L2_APPL) messages.

L2_APPL-0

Error Message `%L2_APPL-0-TASK_SPAWN_FAIL: Failed to spawn task "[chars]"`

Explanation   The specified initializing task failed.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_APPL-4

Error Message `%L2_APPL-4-MAC_MOVE: Host [enet] is flapping between port [chars] and port [chars]`

Explanation   A host is going up and down between ports.

Recommended Action   Examine the network for possible loops.

Error Message `%L2_APPL-4-MAC_USAGE: MAC usage is currently [dec]%`

Explanation   MAC usage is exceeded for the Layer 2 monitoring feature.

Recommended Action   No action is required.

Error Message `%L2_APPL-4-UNKMESG: Unknown received message [dec]`

Explanation An internal error occurred. There might be a mismatch between image versions.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_ASIC Messages

This section contains Layer 2 forwarding engine messages.

L2_ASIC-0

Error Message `%L2_ASIC-0-FATAL_INTR: L2 Forwarding Engine: fatal interrupt: int status [hex],`
` int mask [hex]`

Explanation Critical interrupts indicate that EARL may no longer be functioning.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_ASIC-1

Error Message `%L2_ASIC-1-SCP_Q_CREATE_FAIL: Failed to create L2 Forwarding Engine SCP queue`

Explanation SCP queue creation has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-1-TASK_CREATE_FAIL: Failed to create L2 Forwarding Engine
fatal interrupt patch task`

Explanation A task creation failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-1-THRO_RES_ALLOC_FAIL: Failed to allocate throttle resource`

Explanation Throttle resource allocation has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information that you have gathered. Attach
the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_ASIC-2

Error Message `%L2_ASIC-2-L2L3_SEQ_ERR: L2 Seq #[hex], L3 Seq #[hex], L2L3 Mismatch
seq #[hex]`

Explanation A Layer 2 forwarding engine Layer 2-to-Layer 3 sequence error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-2-PARITY_ERR: L2 Forwarding Engine: parity intr #[dec]: address [hex], Data: [hex], [hex], [hex], [hex]`

Explanation A parity error was detected while accessing the forwarding table.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-2-RESET_LC: Resetting the linecard [dec]. Error code [dec]`

Explanation Failed to receive an SCP response or received a response with a status of not-ok.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-2-SEQ_ERR: [chars] seq. error: Seq #[hex], Intr. status #[hex], Cntrl1 #[hex], Cntrl2 #[hex]`

Explanation A Layer 2 forwarding engine sequence error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_ASIC-4

Error Message `%L2_ASIC-4-INV_MSG: Received [chars] message from slot [dec]`

Explanation A message was received from an invalid line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_ASIC-4-INV_REG: L2 Forwarding Engine: Attempt to [chars] invalid register`

Explanation An internal error has occurred. An attempt was made to read or write to an invalid Layer 2 forwarding engine register.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2TP Messages

This section contains Layer 2 Tunneling Protocol (L2TP) messages.

L2TP-3

Error Message `%L2TP-3-CRITICAL: %s`

Explanation An critical event was processed by the Layer 2 Tunneling Protocol (L2TP) subsystem.

Recommended Action No action is required.

Error Message `%L2TP-3-ILLEGAL: %s: %s`

Explanation An illegal event was processed by the Layer 2 Tunneling Protocol (L2TP) subsystem.

Recommended Action No action is required.

L2TP-5

Error Message `%L2TP-5-IGNOREICMPMTU: Ignoring received ICMP Type 3 Code 4, due to pmtu min or max setting`

Explanation An ICMP Type 3 Code 4 packet has been received, indicating that fragmentation is needed, but the 'don't fragment' (DF) bit is set. This packet has specified a next-hop MTU that is smaller or greater than the current minimum or maximum path MTU discovery MTU value. The ICMP packet was ignored and the MTU has not been changed.

Recommended Action To allow the ICMP packet to be accepted and used to decrease or increase the MTU, enter the **vpdn pmtu min** command to decrease the minimum MTU allowed and enter the **vpdn pmtu max** command to increase the maximum MTU that is allowed. The minimum value specified is the minimum MTU that is allowed, and the maximum value specified is the maximum MTU that is allowed.

L2TUN Messages

This section contains Layer 2 Tunneling Protocol (L2TUN) messages.

L2TUN-3

Error Message `%L2TUN-3-ILLEGAL: %s`

Explanation An illegal event was processed by the Layer 2 Tunneling (L2TUN) subsystem.

Recommended Action No action is required.

L2_MMC Messages

This section contains Layer 2 MAC move counter (L2_MMC) messages.

L2_MMC-3

Error Message `%L2_MMC-3-TASK_SPAWN_FAIL: L2 MMC process cannot be created`

Explanation The Layer 2 MAC move counters (MMC) process cannot be created.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L2_MMC-4

Error Message `%L2_MMC-4-MMC_FIRST: MAC Move(s) are detected`

Explanation The feature is enabled and the first MAC move(s) have been detected.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L2_MMC-4-MMC_MAX: Maximum limit for MAC move counters exceeded for`
`vlan %d`

Explanation The maximum limit has been exceeded for MAC move counters (MMC) on the specified
VLAN.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3_ASIC Messages

This section contains Layer 3 CEF engine messages.

L3_ASIC-1

Error Message `%L3_ASIC-1-ERR_NF_PARITY: Netflow table parity error can't be fixed by`
`software.`

Explanation NetFlow table parity errors are too many to be fixed by software.

Recommended Action Reload the system. If the messages continue for the same module after a reload,
contact your Cisco technical support representative and provide the output of the **show module**
command to obtain a replacement for that module.

L3_ASIC-4

Error Message `%L3_ASIC-4-ERR_INTRPT: Interrupt [chars] occurring in L3 CEF Engine.`

Explanation An error interrupt is occurring for the Layer 3 CEF engine.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Enter the **show earl status** command on the consoles of the switch supervisor and any DFC-enabled
line cards to gather data that may help identify the cause of the error. Research and attempt to resolve

the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3_COMMON Messages

This section contains Layer 3 common ISSU messages.

L3_COMMON-3

Error Message `%L3_COMMON-3-ERROR: %s`

Explanation An error has occurred in the Layer 3 in-service software upgrade (ISSU) process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3_MGR Messages

This section contains Layer 3 manager messages.

L3_MGR-3

Error Message `%L3_MGR-3-ERROR: %s: %s`

Explanation An error has occurred in the Layer 3 in-service software upgrade (ISSU) process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3_MGR_ISSU Messages

This section contains Layer 3 in-service software upgrade (ISSU) manager messages.

L3_MGR_ISSU-3

Error Message `%L3_MGR_ISSU-3-ERROR: %s: %s`

Explanation An error has occurred in the Layer 3 ISSU manager process.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3MM Messages

This section contains Layer 3 Mobility Manager (L3MM) messages.

L3MM-4

Error Message `%L3MM-4-AP_DB_ADD: Failed to add AP to DB { AP: [enet], [IP_address]}`

Explanation The L3MM failed to add the entry for the specified access point (AP) into the AP
database.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L3MM-4-AP_DB_DEL: Failed to delete AP from DB { AP: [enet], [IP_address]}`

Explanation The L3MM failed to delete the entry for the specified AP from the AP database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%L3MM-4-DUP_AP_IPADDR: AP [enet] is requesting ip [IP_address] which is being used by another AP`

Explanation The L3MM detected that an access point requested an IP address that is being used by another access point in the network.

Recommended Action Change the IP address of one of the two access points.

Error Message `%L3MM-4-DUP_IPADDR: MN [enet] is requesting ip [IP_address] which is being used by MN [enet]`

Explanation The L3MM detected that a mobile node requested an IP address that is being used by another mobile node in the network.

Recommended Action Change the IP address of one of the two mobile nodes.

Error Message `%L3MM-4-INIT_FAIL: Initialization failure; reason: [chars]`

Explanation The L3MM failed to initialize due to the specified reason.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %L3MM-4-MALLOC_FAIL: Memory allocation failure [chars]

Explanation The L3MM failed to allocate memory that was needed to perform an operation or to respond to an event.

Recommended Action Increase the memory on the router processor of the supervisor engine.

Error Message %L3MM-4-MN_IPDB_ADD: Failed to add MN to MN DB { MN: [enet], [IP_address]}

Explanation The L3MM failed to add the entry for the specified mobile node into the mobile node IP database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %L3MM-4-MN_IPDB_DEL: Failed to delete MN from IP DB { MN: [enet], [IP_address]}

Explanation The L3MM failed to delete the entry for the specified mobile node from the mobile node IP database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %L3MM-4-MN_MACDB_ADD: Failed to add MN to MAC DB { MN: [enet], AP: [IP_address] }

Explanation The L3MM failed to add the entry for the specified mobile node into the mobile node MAC database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %L3MM-4-MN_MACDB_DEL: Failed to delete MN from MAC DB { MN: [enet],
[IP_address], AP: [IP_address], WNID: [dec] }

Explanation The L3MM failed to delete the entry for the specified mobile node from the mobile node
MAC database.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

L3MM-5

Error Message %L3MM-5-WLAN: Wireless LAN Module in slot [dec] is [chars]

Explanation The L3MM detected a change in the state of the wireless LAN module in the specified
slot. If the module is now on line, the L3MM starts accepting access-point and mobile-node
registrations from the WDS on the module. If the module is now off line, the L3MM purges all
access points and mobile nodes received from the module.

Recommended Action No action is required.

Error Message %L3MM-5-WLAN_COMM_ABORT: Communication with Wireless LAN Module in
slot [dec] aborted ([chars])

Explanation The L3MM detected a communication failure with the wireless LAN module specified
in the error message above. The L3MM will respond by purging its access point and mobile node
databases as if the module went offline. However, the module will not be reset by the L3MM.

Recommended Action No action is required.

Error Message `%L3MM-5-WLAN_PWR_DN: Wireless LAN Module in slot [dec] will be powered down, another module is already active`

Explanation The L3MM detected a wireless LAN module trying to come online, while another module was already functional as the active wireless LAN module. The L3MM does not support more than one wireless LAN module on line in the chassis at a given time, which is why this module will be powered down.

Recommended Action No action is required.

L3TCAM Messages

This section contains Layer 3 TCAM Manager (L3TCAM) messages.

L3TCAM-3

Error Message `%L3TCAM-3-SIZE_CONFLICT: [chars] requires enabling extended routing`

Explanation The TCAM entry has not been configured to enable extended routing. In order to support this feature, it is required that the TCAM entry be configured to enable extended routing.

Recommended Action Modify the Switch Database Management template so that the switch is enabled to support the 144-bit Layer 3 TCAM. Enter the **sdm prefer extended-match**, **sdm prefer access extended-match**, or **sdm prefer routing extended-match** global configuration command, then reload the switch by entering the **reload** privileged EXEC command.

Error Message `%L3TCAM-3-TOO_MANY_VRF: Exceed the maximum number of VRF allowed`

Explanation The number of VPNs has exceeded the maximum number of VPNs that are allowed in the VPN routing and forwarding table on this hardware platform.

Recommended Action Reconfigure your switch to limit the number of VRFs. Do not define more than seven VRFs when you are entering the **ip vrf** *vrf-name* command, with *vrf-name* being the name of the VRF instance, in global configuration mode.

LACP Messages

This section contains Link Aggregation Control Protocol (LACP) messages.

LACP-4

Error Message `%LACP-4-MULTIPLE_NEIGHBORS: Multiple neighbors detected on %s`

Explanation The Link Aggregation Control Protocol (LACP) detected multiple neighbors on the specified interface.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LAPB Messages

This section contains line card Link Access Procedure, Balanced (LAPB) messages.

Error Message `%LAPB-2-NOBUF: Interface [chars], no buffer available to [chars]`

Explanation There was insufficient memory for the LAPB protocol engine to send a message.

Recommended Action This message is acceptable if it occurs infrequently, because the LAPBprotocol is designed to handle loss of frames. Frequent occurrences can cause disruption of service. The system can be configured to ease memory demands or, if conditions warrant, the system can be upgraded to a larger memory configuration.

LC Messages

This section contains line card (LC) messages.

LC-2

Error Message `%LC-2-BADSUBSLOT: Out of range Line Card slot [dec] Sub Module slot [dec]`

Explanation The software specified an out-of-range submodule slot.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LC-3

Error Message `%LC-3-LC_CHUNK: Unable to [chars] for Linecard Slot [dec]`

Explanation A memory shortage may exist.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC-3-LC_QUEUE: Unable to [chars] for Linecard Slot [dec]`

Explanation A memory shortage may exist.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

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http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
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following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LC_10G Messages

This section contains Hamptons 10G trunk card-related messages.

LC_10G-3

Error Message %LC_10G-3-ACCESS_FAIL: [chars] Access Fail

Explanation A read or write operation to the line card redundancy controller (LRC) scratch pad
register has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-AFOVR_ERR: Autofailover Error [chars]

Explanation The optical switch has encountered an error during an autofailover operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-AFOVR_EVNT: Autofailover event occured [chars]`

Explanation An autofailover event has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-CDL_HEC_ERR_THR: CDL HEC Errors threshold [chars]`

Explanation The threshold of allowable converged data link (CDL) header error control (HEC) errors has been exceeded.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-CRC_ERR_THR: CRC Errors threshold [chars]`

Explanation The threshold of allowable cyclic redundancy check (CRC) errors has been exceeded.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-ETH_DCC_LPBK_FAIL: EthernetDcc loopback Fail`

Explanation A loopback operation through the Ethernet backplane has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-IDPROM_ACCESS_FAIL: Idprom Access Fail`

Explanation The IDPROM could not be read or checked.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-INTERNAL_CRITICAL: [chars]`

Explanation A critical internal error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-INTERNAL_ERROR: [chars]`

Explanation An internal error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-INT_LPBK_FAIL: Internal Card loopback Fail`

Explanation A loopback attempt that was internal to the card has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-LASER_AUTO_SHUTDOWN: Auto Laser Shutdown [chars]`

Explanation The laser has been automatically shut down.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-LASER_BIAS_ALARM: Optic Laser Bias Alarm [chars]

Explanation An error involving laser bias has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-LASER_TEMP_ALARM: Optic Laser Temperature Alarm [chars]

Explanation An error involving the temperature of the optics laser has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-LASER_TX_FAULT: Optic Laser Transmit Fault [chars]

Explanation An error involving optics laser transmission has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-LOSS_OF_LOCK: Transceiver Loss of Lock [chars]`

Explanation   The transceiver has lost the lock onto the incoming signal.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-LOSS_OF_SYNC: Transceiver Loss of Sync [chars]`

Explanation   The transceiver has lost its frame synchronization.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-LPBK_THRU_PSC_FAIL: loopback through PSC Fail`

Explanation   A internal card loopback attempt through the processor and switch card (PSC) has failed.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_AFOVR_ERR_ALM: Optical Switch Error [chars] [chars] [chars]`

Explanation An optical switch error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_AFOVR_EVNT_ALM: AutoFailover Event [chars] [chars] [chars]`

Explanation An autofailover event has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_AUTO_LASER_SHUTDOWN: Auto Laser Shutdown [chars] [chars] [chars]`

Explanation The laser has been shut down.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_LASER_BIAS_ALM: Laser Bias Alarm [chars] [chars] [chars]`

Explanation An error involving trunk laser bias has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_LASER_TEMP_ALM: Laser Temperature Alarm [chars] [chars] [chars]`

Explanation An error involving the temperature of the trunk laser has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_10G-3-MIB_LASER_TX_FLT_ALM: Laser Transmit Fault [chars] [chars] [chars]`

Explanation An error involving trunk laser transmission has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-MIB_LOSS_OF_LOCK_ALM: Loss of Lock [chars] [chars] [chars]

Explanation A loss-of-lock event has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-MIB_LOSS_OF_SYNC_ALM: Loss of Sync [chars] [chars] [chars]

Explanation A loss-of-synchronization event has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_10G-3-SYML_ERR_THR: Symbol Errors threshold [chars]

Explanation The threshold of allowable symbol errors has been exceeded.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LC_2P5G Messages

This section contains Hamptons 2.6G trunk card-related messages.

LC_2P5G-3

Error Message `%LC_2P5G-3-ACCESS_FAIL: Access Fail [chars]`

Explanation A read or write operation to the LRC scratch pad register has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-AFOVR_ERR: Autofailover Error [chars]`

Explanation The optical switch failed to perform an autofailover operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-5-AFOVR_EVNT: Autofailover event occured [chars]`

Explanation An autofailover event has occurred.

Recommended Action No action is required.

Error Message %LC_2P5G-3-CDL_HEC_ERR_THR: CDL HEC Errors threshold [chars]

Explanation The threshold of allowable converged data link (CDL) header error control (HEC) errors has been exceeded.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_2P5G-3-CRC_ERR_THR: CRC Errors threshold [chars]

Explanation The threshold of allowable CRC errors has been exceeded.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_2P5G-3-ETH_DCC_LPBK_FAIL: EthernetDcc loopback Fail [chars]

Explanation A loopback operation through the Ethernet backplane has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-IDPROM_ACCESS_FAIL: Idprom Access Fail [chars]`

Explanation The IDPROM could not be read or checked.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-2-INTERNAL_CRITICAL: [chars]`

Explanation An internal critical error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-INTERNAL_ERROR: [chars]`

Explanation An internal error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-INT_LPBK_FAIL: Internal Card loopback Fail [chars]`

Explanation A loopback operation that was internal to the card has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-5-LASER_AUTO_SHUTDOWN: Auto Laser Shutdown [chars]`

Explanation The laser has been automatically shut down.

Recommended Action No action is required.

Error Message `%LC_2P5G-3-LASER_DEGRADATION_ALARM: Optic Laser Degradation Alarm [chars]`

Explanation The transmission power of the optics laser module is degrading.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-LASER_NO_LIGHT_ALARM: Optic Laser Loss of Light Alarm [chars]`

Explanation The optics laser has experienced a loss of light.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-LASER_TX_FAULT: Optic Laser Transmit Fault [chars]`

Explanation An optics laser transmission fault has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-LASER_WAVE_LN_DEV_ALARM: Optic Laser Wavelength Deviation Alarm [chars]`

Explanation The wavelength of the optics laser module has deviated.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-LOSS_OF_LOCK: Transceiver Loss of Lock [chars]`

Explanation The receiver has lost the lock on the incoming signal.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_2P5G-3-LOSS_OF_SYNC: Transceiver Loss of Sync [chars]

Explanation The decoder has lost its frame synchronization.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_2P5G-3-LPBK_THRU_PSC_FAIL: loopback through PSC Fail [chars]

Explanation An internal card loopback operation through the processor and switch card (PSC) has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LC_2P5G-3-MIB_AFOVR_ERR_ALM: Optical Switch Error [chars] [chars] [chars]

Explanation An autofailover operation for the optical switch has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-5-MIB_AFOVR_EVNT_ALM: AutoFailover Event [chars] [chars]` `[chars]`

    Explanation An autofailover event has occurred.

    Recommended Action No action is required.

Error Message `%LC_2P5G-5-MIB_AUTO_LASER_SHUTDOWN: Auto Laser Shutdown [chars]` `[chars] [chars]`

    Explanation The laser has been automatically shut down.

    Recommended Action No action is required.

Error Message `%LC_2P5G-3-MIB_CVRD_ERR_THR: CVRD Error Threshold Exceeded [chars]` `[chars] [chars]`

    Explanation The threshold of allowable symbol errors has been exceeded.

    Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-MIB_LASER_DEG_ALM: Laser Degradation Alarm [chars] [chars]` `[chars]`

    Explanation The transmission power of the optics laser module is degrading.

    Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-MIB_LASER_TX_FLT_ALM: Laser Transmit Fault [chars] [chars]`
`[chars]`

Explanation An optics laser transmission fault has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-MIB_LASER_WV_DEV_ALM: Laser Wavelength Deviation Alarm`
`[chars] [chars] [chars]`

Explanation The wavelength of the optics laser module has deviated.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
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representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-MIB_LOSS_OF_LOCK_ALM: Loss of Lock [chars] [chars] [chars]`

Explanation The receiver has lost its lock on the incoming signal.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not
bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and
configuration of the remote end connected to the port associated. If the error message persists, copy
the message exactly as it appears on the console or in the system log. Research and attempt to
resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some
messages, these tools and utilities will supply clarifying information. Search for resolved software
issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl.
If you still require assistance, open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-MIB_LOSS_OF_SYNC_ALM: Loss of Sync [chars] [chars] [chars]`

Explanation The decoder has lost its frame synchronization.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs..

Error Message `%LC_2P5G-3-MIB_NO_LIGHT_ALM: Laser Loss of Light Alarm [chars] [chars] [chars]`

Explanation An error involving a loss of light for the optics laser has occurred.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LC_2P5G-3-SYML_ERR_THR: Symbol Errors threshold [chars]`

Explanation The threshold of allowable symbol errors has been exceeded.

Recommended Action Check that the cables connected to the Rx transciever are plugged in, are not bent or twisted, and are in good condition. Check the physical state (transmit laser power level) and configuration of the remote end connected to the port associated. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LCMDC Messages

This section contains Cisco Optical Networking Systems (ONS) 15540 Extended Services Platform (ESP) messages.

LCMDC-3

Error Message %LCMDC-3-FPGA_ACCESS_FAIL: Alarm: [chars], [chars], [chars], [chars], [chars]

Explanation An alarm has occurred. The message text provides additional details on the cause of the error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LCMDC-6

Error Message %LCMDC-6-TX_ALARM_SOAK: [chars]

Explanation An alarm has occurred. The message text provides additional details on the cause of the error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LCR Messages

This section contains Line Card Registry (LCR) messages.

LCR-6

Error Message `%LCR-6-FAILED_MCAST: Failed to send exported registry request %d to mcast group`

Explanation A communication failure occurred while attempting to send an exported registry request to a multicast group.

Recommended Action No action is required.

Error Message `%LCR-6-FAILEDRCV: Failed to process registry request [dec]`

Explanation A request received on a receiver could not be processed successfully.

Recommended Action No action is required.

Error Message `%LCR-6-FAILED_RCV_ON_ACTIVE: Failed to process registry request [dec] - on active supervisor SP`

Explanation A request received on the active supervisor engine could not be processed successfully.

Recommended Action No action is required.

LDP Messages

This section contains Label Distribution Protocol (LDP) messages.

LDP-3

Error Message `%LDP-3-ISSU_XFORM: ISSU [chars] transformation failed for msg type ([dec])[chars].`

Explanation The LDP could not upgrade or downgrade a checkpointing message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LDP-3-RECONNECT: [chars]`

Explanation An error occurred while parsing the incoming LDP initialization message. The FT reconnect timer value received was greater than the locally-configured forwarding state holding timer value.

Recommended Action Reconfigure the forwarding state holding timer value.

LDP-5

Error Message `%LDP-5-CLEAR_CHKPT: Clear LDP bindings checkpoint state ([chars]) by [chars]`

Explanation The checkpoint state for one or more LDP bindings has been reset.

Recommended Action No action is required.

Error Message `%LDP-5-CLEAR_NBRS: Clear LDP neighbors ([chars]) by [chars]`

Explanation One or more LDP neighbor sessions has been reset.

Recommended Action No action is required.

Error Message `%LDP-5-GR: [chars]`

Explanation An informational LDP notice was generated for a graceful restart event.

Recommended Action No action is required.

Error Message `%LDP-5-SP: [chars]`

Explanation An informational LDP notice was generated for a session protection event.

Recommended Action No action is required.

LFD Messages

This section contains MFI Label Switching Database (LFD) messages.

LFD-2

Error Message `%LFD-2-AVL: [chars] [hex]`

Explanation An error involving an Adelson-Velskii and Landis (AVL) tree operation has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-2-FPIHANDLER3: [chars] [hex] [hex] [hex]`

Explanation An error has been detected in the forwarding path identifier (FPI) handler.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LFD-3

Error Message `%LFD-3-BADEXEC: Unexpected Code Execution: [chars] [dec]`

Explanation An error involving unexpected execution of code has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-BADFRRTYPE: illegal frr type: [dec]`

Explanation An error involving an Fast ReRoute (FRR) request type has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-BADLABELADD: Cannot add label - [chars].`

Explanation Unable to create label due to reason given.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-BADSHORTLABELADD: Cannot add short label: path_idx [dec], moi_type [dec]`

Explanation Unable to create MFI feature space in FIB entry, so unable to store short path extension information there.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the gathered information.

Error Message `%LFD-3-BROKERINITFAIL: Failed to initialise lte RP broker facility`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-CHUNKMGR: chunk mgr: [chars] [hex]`

Explanation An error involving the memory manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-CHUNKMGRALLOC: failed chunk alloc: [chars]`

Explanation An error involving memory allocation has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-CHUNKMGRDEALLOC: failed chunk dealloc: [chars]`

Explanation An error involving the freeing of memory has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-EVTLOGBADSOURCE: Illegal log event source: [dec]`

Explanation An illegal event in the log buffer has been detected.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-FIB_SRC: Lable [[dec]/[dec]] [chars] [chars] [chars]`

Explanation The FIB entry could not be sourced for label in question.

Recommended Action Enter the **show mpls forwarding-table internal** and **show ip route [vrf** *name*] *prefix* **commands** and capture the error message traceback. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-FPIHANDLER: LFD SSS Handler: [chars]`

Explanation An error has been detected in the FPI handler.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-FPITYPEWRONG: Require fpi type [chars], get fpi type [chars]`

Explanation An error involving unmatched FPI types has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INTFDB: intf db: [chars] [hex]`

Explanation An interface DB error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INTFDB2: intf db: [chars] [hex] [hex]`

Explanation An interface DB error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVINSTALLER: Wrong installer [dec] for [chars] [dec]/[dec] update (was [dec])`

Explanation The rewrite ID is invalid for non-IP label table entry.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVIPLABELTYPE: Wrong label type [dec] for IP Label [dec], table [dec] prefix [chars], vrf [chars]`

Explanation The label type is invalid for the indicated label table entry.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVLABELTYPE: Wrong label type [dec] for non-ip LTE [dec]/[dec]`

Explanation The label type is invalid for the non-IP label table entry.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVLABELUPDTYPE: Wrong label type [dec] for label [dec] table [dec] [chars] [chars]`

Explanation An invalid label type was encountered during the specified operation.

Recommended Action Enter the **show mpls forwarding-table label** *label* **internal** command and capture the error message traceback. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVPATHLBL: [chars] [chars]`

Explanation An invalid outgoing label is attached to the prefix.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVPLIST: Wrong path list type [dec] for label [dec]/[dec] [chars]`

>   **Explanation** The path list type is set incorrectly for the label in question.

>   **Recommended Action** Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVRWID: Wrong rwid [dec] for non-ip LTE [dec]/[dec]`

>   **Explanation** The rewrite ID is invalid for non-IP label table entry.

>   **Recommended Action** Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-INVXDRLEN: Length [int] for [chars] field in LTE msg for [chars]`

>   **Explanation** An error occurred when encoding the MPLS label information for the FEC in question. This could result in line cards having stale labels for this FEC.

>   **Recommended Action** Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-KEY_DB_INSERTFAIL: [chars], entry [hex], existing [hex]`

Explanation The element could not be inserted into the LFD's key database.

Recommended Action Enter the **show mpls forwarding-table label** *label* **internal** command and capture the error message traceback. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-LCXDRCLIENT: LTE distribution client: [chars]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-LTABLEMEM: Cannot allocate new mpls table [dec] of size [dec] needed for entry [dec]`

Explanation There is not enough contiguous memory for the MPLS forwarding table.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message `%LFD-3-NONIPINFO: Non-ip info: [chars]`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-NOOCE: Attempt to get labels from OCE failed - [chars].`

Explanation The calling function has provided insufficient information to get labels.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-NORESOURCE: [chars] [dec]`

Explanation A resource failure occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-NULLADJACENCY: NULL Adjacency`

Explanation A NULL adjacency was encountered.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-NULLFIBIDB: NULL FIB IDB: [chars] [dec]`

Explanation   A NULL FIB IDB was encountered.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-ORPHANLTE: Label [dec]/[dec], plist [dec], LDM: [hex]`

Explanation   The LTE for the label was supposed to be deleted, but is still present.

Recommended Action   Collect the running configuration and the output of the **show mpls forwarding-table labels** *label-num* command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-REWMGR: Rewrite Manager: [chars] [hex]`

Explanation   An error involving the rewrite manager has occurred.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-REWMGR2: [chars] [hex] [hex]`

Explanation A rewrite lookup attempt has failed becuase of an inconsistency in the FPI.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-RPXDRCLIENT: Invalid XDR Client: %s`

Explanation An internal software error occurred. The XDR client is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-RUNNING_TIMER: [chars] [dec] [chars] [dec]`

Explanation The MPLS forwarding entry for the specified label was deleted prior to the expiry of its associated timer.

Recommended Action Enter the **show mpls forwarding-table label** *label* **internal** command. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-SM: [chars] [dec]`

Explanation An error involving the state machine has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-SMBADEVENT: Unexpected event [chars] for state [chars]`

Explanation The LFD received an unexpected event for its state. The state of the LFD, and the unexpected event, are specified in the message text.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-UNSUPPORTED_XDR: [chars]`

Explanation Decoding of an XDR message revealed data or a format that is unsupported in the current release.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-UPDATEHANDLER2: [chars] [hex] [hex]`

Explanation An error involving the update handler has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-UPDATEHANDLER3: [chars] [hex] [hex] [hex]`

Explanation An error involving the update handler has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-UPDATEHANDLERFPI: No handler installed: fpi=[dec] handler type=[chars]`

Explanation No handler has been installed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-3-XDRBADMAGIC: xdr message for [chars] spilled out of allocated static storage`

Explanation An internal software error occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LFD-4

Error Message `%LFD-4-NOFIBIDB: [chars] - ifnum [dec]`

Explanation The FIB IDB is missing on the line card.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-4-OWNCHANGED: Owner changed for [chars] [dec]/[dec] from [dec] to [dec]`

Explanation A label was previously installed by a different installer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LFD-4-UNSUPPORTEDRW: Unexpected rewrites seen where MPLS is not supported by platform for this slot`

Explanation MPLS is either not needed or not handled by the platform for this card and should not handle rewrites.

Recommended Action No action is required.

LFD-5

Error Message `%LFD-5-FRRISSULOG: FRR is not ISSU compatible, notified by %s`

Explanation The ISSU negotiation results for Fast Reroute (FRR) are not compatible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LFD-6

Error Message `%LFD-6-RESOURCE: [chars]`

Explanation MPLS is not supported by the platform.

Recommended Action No action is required.

LINEPROTO Messages

Error Message `%LINEPROTO-SP-5-UPDOWN: Line protocol on Interface %s, changed state to %s`

Explanation The data link level line protocol changed state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LINK Messages

This section contains data link messages.

LINK-3

Error Message `%LINK-3-BOGUSENCAP: Interface [chars], bad encapsulation in idb-enctype = [hex]`

Explanation A serial interface has been configured with an unknown encapsulation.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

Error Message `%LINK-3-FCS_ERROR: [chars] [chars] [chars] [chars]`

Explanation The FCS error rate exceeds the configured threshold.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LINK-3-LINK_FAULT: [chars] [chars] [chars] [chars]`

Explanation The link state for the port is down.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LINK-3-TOOSMALL: Interface [chars], Output runt packet of [dec] bytes`

Explanation An output packet was detected that was smaller than the minimum allowable datagram
size. An error in another driver or an error in the system software probably triggered this error
message.

Recommended Action This is an informational message only. No action is required.

Error Message `%LINK-3-UPDOWN: Interface [chars], changed state to [chars]`

Explanation The interface hardware has gone either up or down.

Recommended Action If the state change was unexpected, confirm the configuration settings for the
interface.

LINK-6

Error Message `%LINK-6-BERTMSGS: [chars]`

Explanation This message contains information related to a bit error rate test (BERT).

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LINK-SP

Error Message `%LINK-SP-3-UPDOWN: Interface %s, changed state to %s`

Explanation The interface hardware went either up or down.

Recommended Action If the state change was unexpected, confirm the configuration settings for the
interface.

LLDP Messages

This section contains Link Layer Discovery Protocol (LLDP) messages.

LLDP-4

Error Message `%LLDP-4-LLDP_NEW_ENTRY: Neighbor record not committed - malloc failure`

Explanation An LLDP entry creation failed due to a memory allocation failure.

Recommended Action Run memory diagnostics.

LRE_CPE Messages

This section contains Long Reach Ethernet (LRE) Customer Premises Equipment (CPE) messages.

LRE_CPE-3

Error Message `%LRE_CPE-3-INVALIDMODE: CPE on interface [chars] is in invalid mode [chars].`

Explanation The CPE is in an inconsistent mode; for example, the model number may imply a MAC mode while the CPE is in a PHY mode.

Recommended Action Enter the **show controllers lre cpe mfg** command to verify that the CPE model number string is correct. Enter the **hw-module slot** *slot* **lre upgrade remote** command to ensure that the CPE has the latest supported firmware. If the CPE's model number and firmware are correct, enter the interface configuration **shutdown** command followed by the **no shutdown** command to force the switch to read the CPE information again. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_CPE-3-INVALIDPATCH: CPE on interface [chars] has invalid LRE firmware.`

Explanation The LRE firmware header does not have a valid signature, or the header information on the specified firmware is inconsistent with the contents of the firmware

Recommended Action Upgrade the firmware on the CPE to the latest supported one by using the **hw-module slot** *slot* **lre upgrade remote** command.

Error Message `%LRE_CPE-3-INVALIDPHY: CPE on interface [chars] has an unsupported Ethernet PHY.`

Explanation The Ethernet PHY device on the CPE attached to the specified interface is not supported. This error occurs when the switch cannot recognize the PHY identifier of the PHY device(s) on the CPE. The reason could be one of the following: The Cisco IOS version running on the switch is not compatible with this CPE, the CPE is not supported by Cisco, or the switch did not correctly read the PHY identifier from the CPE.

Recommended Action Verify that the CPE is supported by Cisco. Enter the command **show controllers lre cpe mfg** to verify that the CPE model number string is correctly set. If the Cisco IOS version and CPE model number look correct, enter the interface configuration **shutdown** command followed by the **no shutdown** command to force the switch to read the PHY identifer again. As a last resort, power cycle the CPE. If the error persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_CPE-3-NOVERCKSUM: Could not fetch CPE firmware version and checksum on interface [chars].`

Explanation The system could not obtain the CPE firmware version and checksum. If the CPE has the latest firmware, and the CPE model number is correct, the most likely cause for this error is that the LRE link between the switch and the CPE is of poor quality.

Recommended Action Enter the command **show controllers lre cpe mfg** to verify that the CPE model number string is correctly set for this CPE. Enter the **hw-module slot** *slot* **lre upgrade remote** command to ensure that the CPE has the latest supported firmware. Enter the interface configuration **shutdown** command followed by the **no shutdown** command to force the switch to read the CPE firmware version and checksum. As a last resort, power cycle the CPE. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_CPE-3-UNKNOWNMODEL: CPE has unrecognizable model number [chars] on interface [chars]`

Explanation The model number string in the CPE does not match a known CPE model number.

Recommended Action Enter the command **show controllers lre cpe mfg** to examine the model number of the CPE. Verify that the model number is supported by Cisco. Enter the interface configuration **shutdown** command followed by the **no shutdown** command to force the switch to read the CPE model number again. If the error message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_CPE-3-WRONGAPPVER: CPE on interface [chars] reported unsupported version of application firmware [chars]. Minimum application firmware version needed [chars]`

Explanation Each CPE requires a currently supported application firmware version for it to function correctly. This CPE has a application firmware version that predates the earliest supported version.

Recommended Action Application firmware is not currently used on the CPE. This error message is for future use.

Error Message `%LRE_CPE-3-WRONGBOOTVER: CPE on interface [chars] reported unsupported version of bootloader firmware [chars]. Minimum bootloader firmware version needed [chars]`

Explanation Each CPE requires a currently supported bootloader firmware version for it to function correctly. This CPE has a bootloader firmware version that predates the earliest supported version.

Recommended Action Enter the **hw-module slot** *slot* **lre upgrade remote** command to upgrade the bootloader firmware on the CPE to a recent version that supports the current requirements. If the CPE firmware upgrade does not solve the problem, enter the interface configuration **shutdown** command followed by the **no shutdown** command to force the switch to read the bootloader firmware version again. As a last resort power cycle the CPE. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_CPE-3-WRONGPATCH: CPE on interface [chars] has wrong patch version [hex]. Patch version [hex] or higher is needed for this CPE.`

Explanation Each CPE requires a currently supported patch version for it to function. This CPE has a patch version that predates the earliest supported version. This condition might occur because the switch was upgraded with the latest Cisco IOS software image, but the CPE firmware has not been upgraded.

Recommended Action Enter the **hw-module slot** *slot* **lre upgrade remote** command to upgrade the patch on the CPE to the latest supported version.

LRE_CPE-5

Error Message `%LRE_CPE-5-SSNCHANGED: CPE unit on interface [chars] changed.`

Explanation The CPE system serial number has changed. This condition usually means that the CPE unit on this interface was replaced.

Recommended Action No action is required.

LRE_LINK Messages

This section contains Long Reach Ethernet (LRE) link for the Catalyst 2950 LRE switch messages.

LRE_LINK-3

Error Message `%LRE_LINK-3-PROFILE_FAILURE: Interface [chars], profile [chars] failure`

Explanation The interface specified in the error message did not achieve link with the attached profile.

Recommended Action If the link failure was unexpected, confirm the profile settings for the interface.

Error Message `%LRE_LINK-3-UPDOWN: Interface [chars], changed state to [chars]`

Explanation The interface hardware has either become active (came up) or become inactive (gone down).

Recommended Action If the state change was unexpected, confirm the configuration settings for the interface.

LRE_LINK-4

Error Message `%LRE_LINK-4-HEALTH_MON: Interface [chars], had crossed certain monitored thresholds`

Explanation The link status monitor for the specified interface has detected conditions that have crossed the configured thresholds.

Recommended Action Enter the **show controllers lre link monitor** command to obtain more information on this error. If the change in operating conditions was unexpected, confirm the configuration settings for the interface.

LRE_LOG Messages

This section contains Long Reach Ethernet (LRE) log messages.

LRE_LOG-7

Error Message `%LRE_LOG-7-LRE_LOGGING: LRE Log:Interface [chars]: State: [chars], Event: [chars], Data: [chars].`

Explanation The system has changed its state. The error message text provides more information on the cause of the change.

Recommended Action No action is required.

LRE_UPGRADE Messages

This section contains LRE upgrade for the Catalyst 2950 LRE switch messages.

LRE_UPGRADE-2

Error Message `%LRE_UPGRADE-2-LOCAL_LOAD_FAILURE: The system failed to load the firmware for local PHY controller:[dec]`

Explanation An internal system error has occurred while loading the firmware for a local PHY controller.

Recommended Action Power cycle the switch. If this message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LRE_UPGRADE-3

Error Message `%LRE_UPGRADE-3-INIT_SYSTEM: Upgrade module failed to initialize`

Explanation The LRE upgrade module failed to initialize.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_UPGRADE-3-LOCAL_FAILURE: Upgrade of local controller [chars] failed`

Explanation The LRE upgrade is unable to download firmware to a local controller.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LRE_UPGRADE-4

Error Message `%LRE_UPGRADE-4-INIT_RESOURCE: [chars]`

Explanation The LRE upgrade module cannot locate a required resource.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LRE_UPGRADE-4-TERMINATE: Upgrade on [chars] terminated`

Explanation The customer equipment was disconnected or changed in the middle of an upgrade.

Recommended Action No action is required.

LSD Messages

This section contains MPLS Forwarding Infrastructure (MFI) Label Switching Database (LSD) messages.

LSD-2

Error Message `%LSD-2-APP_NOTSUPP: [chars] interface does not support app [chars]`

Explanation The interface does not support the application that is specified in the message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-2-AVL: [chars] [hex]`

Explanation An error involving an Adelson-Velskii and Landis (AVL) tree operation has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-2-FPIHANDLER: [chars] [hex]`

Explanation An error involving the FPI handler has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-2-INVALID_VAR: [chars]`

Explanation The function has received invalid parameters.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-2-INVALID_VAR2: [chars] [hex] [hex]`

Explanation The function has received invalid parameters.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LSD-2-RESOURCE: [chars]

Explanation A system resource error has occurred.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message %LSD-2-TESTAPP2: Test app error: [chars]: [hex] [hex]

Explanation A test application error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSD-3

Error Message %LSD-3-APPMGR: [chars] [hex]

Explanation An error involving the application manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LSD-3-BADEXEC: Unexpected Code Execution: [chars] [dec]

Explanation An error involving unexpected execution of code has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LSD-3-CHUNKMGR: chunk mgr: [chars] [hex]

Explanation A memory manager error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LSD-3-CLIENT_CONN: [chars]

Explanation A client connection error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %LSD-3-CLIENT_CONN2: [chars] [hex] [hex]

Explanation A client connection error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-EVTLOGBADSOURCE: Illegal log event source: [dec]`

Explanation An illegal event was found in the log buffer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-INTF_DB: [chars]`

Explanation An interface database error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-INTF_DB2: [chars] [hex] [hex]`

Explanation An interface database error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-INVALID_PROC_EVT: Unexpected process event [dec] for pid [dec]`

Explanation The LSD component received an unexpected process event notification for the process with the specified ID.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-LABEL: [chars][dec]`

Explanation A label operation error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-LABEL2: [chars] [hex] [hex]`

Explanation A label operation error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-MULTISERVICEREQ: Multiple outstanding service requests: [dec] [dec]`

Explanation A service request was submitted, but one service request is already outstanding.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-OS_NOTIFY: Process id [dec] [chars], error code [dec]`

Explanation The LSD was unable to notify the operating system about (un)registration of the specified process.

Recommended Action Enter the **show version, show running-config, show mpls infrastructure lsd apps** commands. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-REWMGR: Rewrite Manager: [chars] [hex]`

Explanation An error involving the rewrite manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-REWMGR2: [chars] [hex] [hex]`

Explanation An attempt to look up a rewrite has failed because of an inconsistency in a forwarding path identifier.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-UPDATELISTMGR2: [chars] [dec] [dec]`

Explanation A general error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-3-UPDATELISTMGREXEC: Illegal exec: [chars] [hex]`

Explanation An error involving illegal execution of code has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSD-4

Error Message `%LSD-4-BADAPI: [chars] from [chars]`

Explanation The LSD has received a message with invalid parameters.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-4-LABELFREETO: requested free timeout ([int] ms) by [chars] limited to: [int] ms`

Explanation The timeout period for the MPLS application label has exceeded the maximum configured time.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD-4-LABEL_RESOURCE: label range [dec]-[dec] exhausted`

Explanation The MPLS application is attempting to allocate more labels than the system configuration will allow.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSD_CLIENT Messages

This section contains MPLS Forwarding Infrastructure (MFI) Label Switching Database (LSD) client messages.

LSD_CLIENT-2

Error Message `%LSD_CLIENT-2-MSGHANDLERERR: Client=[dec] Msg type=[dec] Error=[chars]`

Explanation An error involving the message handler has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message `%LSD_CLIENT-2-XDREXEC: [chars] [dec]`

Explanation Illegal code has been executed in the XDR path.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message `%LSD_CLIENT-2-XDREXEC2: [chars] [hex] [hex]`

Explanation llegal code has been executed in the XDR path.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at

http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

LSD_CLIENT-3

Error Message %LSD_CLIENT-3-CLIENTAPI: Client API error: [chars] [dec]

Explanation An unexpected client API error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message %LSD_CLIENT-3-INVALID_VAR: [chars]

Explanation A function has received parameters that are invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message %LSD_CLIENT-3-ISSU_MSG_CONV: [chars] [dec] [dec]

Explanation Could not convert received message type to a known message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Enter the **show running-config** command to gather data that may help identify the nature of the error. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support**, and **show running-config** commands and your pertinent troubleshooting logs.

Error Message %LSD_CLIENT-3-PCHUNK2: [chars]: [chars] [hex] [hex]

Explanation An error involving memory parameters has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show version**, **show running-config** and **show process memory** commands and your pertinent troubleshooting logs.

Error Message %LSD_CLIENT-3-UTIL2: [chars]: [hex] [hex]

Explanation An error involving utilities has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show version** and **show running-config** commands and your pertinent troubleshooting logs.

LSD_HA Messages

This section contains MFI Label Switching Database (LFD) high availability (HA) messages.

LSD_HA-2

Error Message `%LSD_HA-2-CF: [chars][dec]`

Explanation A CF-related error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD_HA-2-RESOURCE: [chars]`

Explanation A system resource error has occurred.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant, upgrade to a larger memory configuration.

Error Message `%LSD_HA-2-RF: [chars][dec]`

Explanation An RF-related error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSD_HA-3

Error Message `%LSD_HA-3-GENERAL: [chars]`

Explanation A function has received invalid parameters.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD_HA-3-INVALID_VAR: [chars]`

Explanation A function has received invalid parameters.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD_HA-3-LABEL_RANGE_DB: [chars]`

Explanation An error has occurred in the label range database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSD_HA-3-UNSENT_MSG_DB: [chars]`

Explanation An error has occurred in the unsent message database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSPV Messages

This section contains MPLS Label-Switched Path Verification (LSPV) messages.

LSPV-3

Error Message `%LSPV-3-COMM: [chars]: [hex] [hex]`

Explanation An unexpected RP/LC XDR condition has been encountered in the communications module.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%LSPV-3-COMM_UNKNOWN_RC: Unexpected oce return code`

Explanation An unexpected OCE return code was encountered in the communications module.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

LSS Messages

This section contains LS switching (LSS) message definition messages.

LSS-4

Error Message `%LSS-4-LSIPC: [chars] [dec]`

Explanation LSIPC warning - LSIPC is timing out. uCode on that interface may not be responding.

Recommended Action Possibly E-PAM is not responding.

LTL Messages

This section contains local target logic (LTL) messages.

LTL-2

Error Message `%LTL-2-LTL_PARITY_CHECK: LTL parity check request for 0x%x.`

Explanation The local target logic (LTL) parity check found a parity error on the index.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MAB Messages

This section contains MAC authentication bypass (MAB) messages.

MAB-5

Error Message `%MAB-5-FAIL: Authentication failed for client (%s) on Interface %s`

Explanation Authentication was unsuccessful.

Recommended Action No action is required.

Error Message `%MAB-5-SUCCESS: Authentication successful for client (%s) on Interface %s`

Explanation Authentication was successful.

Recommended Action No action is required.

MAC_LIMIT Messages

This section contains MAC limit feature (MAC_LIMIT) messages.

MAC_LIMIT-4

Error Message `%MAC_LIMIT-4-DROP: Vlan [dec] with Configured limit = [dec] has currently [dec] Entries`

Explanation The number of entries for a VLAN has gone below or is equal to the allowed number.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MAC_LIMIT-4-ENFORCE: Enforcing limit on Vlan [dec] with Configured limit = [dec]`

Explanation The number of entries for a VLAN has exceeded the allowed number. The action that enforces the limit is configured.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MAC_LIMIT-4-EXCEED: Vlan [dec] with Configured limit = [dec] has currently [dec] Entries`

Explanation The number of entries for a VLAN has exceeded the allowed number.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MAC_LIMIT-4-PORT_DROP: [chars] with Configured limit [dec] has currently [dec] entries`

Explanation The number of entries for the specified port has gone below or is equal to the permitted number.

Recommended Action This message is for reporting purposes only. No action is required.

Error Message `%MAC_LIMIT-4-PORT_ENFORCE: Enforcing limit on [chars] with Configured limit [dec]`

Explanation The number of entries for the specified port has exceeded the permitted number. The action to enforce the limit is configured.

Recommended Action This message is for reporting purposes only. No action is required.

Error Message %MAC_LIMIT-4-PORT_EXCEED: [chars] with configured limit [dec] has currently [dec] entries

Explanation The number of entries for the specified port has exceeded the permitted number.

Recommended Action This message is for reporting purposes only. No action is required.

Error Message %MAC_LIMIT-4-VLAN_DROP: Vlan [dec] with configured limit [dec] has currently [dec] entries

Explanation The number of entries for the specified VLAN has gone below or is equal to the permitted number.

Recommended Action This message is for reporting purposes only. No action is required.

Error Message %MAC_LIMIT-4-VLAN_ENFORCE: Enforcing limit on Vlan [dec] with configured limit [dec]

Explanation The number of entries for the specified VLAN has exceeded the permitted number. The action to enforce the limit is configured.

Recommended Action This message is for reporting purposes only. No action is required.

Error Message %MAC_LIMIT-4-VLAN_EXCEED: Vlan [dec] with configured limit [dec] has currently [dec] entries

Explanation The number of entries for the specified VLAN has exceeded the permitted number.

Recommended Action This message is for reporting purposes only. No action is required.

MAC_MOVE

This section contains MAC move notification feature (MAC_MOVE) messages.

MAC_MOVE-4

Error Message %MAC_MOVE-4-NOTIF: Host [enet] in vlan [dec] is flapping between port [chars] and port [chars]

Explanation The system found the specified host moving between the specified ports.

Recommended Action Examine the network for possible loops.

MCAST Messages

This section contains Layer 2 Multicast log (MCAST) messages.

MCAST-2

Error Message `%MCAST-2-IGMP_ADDRAL:IGMP: Address Aliasing for [chars]`

Explanation The network management processor (NMP) detected a multicast data stream being directed to a special multicast address. Several special class D addresses are used exclusively for control purposes by the multicast protocols IGMP, DVMRP, MOSPF, and PIM. The sending of noncontrol packets to these addresses is considered address aliasing.

Recommended Action From the displayed MAC and IP address information, determine which device's IP address is being aliased. Change its IP address to an address outside of the special multicast address group, or do not use it for the multicast data feed.

Error Message `%MCAST-2-IGMP_ADDRALDETAILS:IGMP: Multicast address aliasing: From [chars] ([IP_address]) on [dec]/[dec] to [chars]`

Explanation The network management processor (NMP) detected a multicast data stream being directed to a special multicast address. Several special class D addresses are used exclusively for control purposes by the multicast protocols IGMP, DVMRP, MOSPF, and PIM. The sending of noncontrol packets to these addresses is considered address aliasing.

Recommended Action From the displayed group, port, and IP address information, determine which device's IP address is being aliased; [dec]/[dec] is the module number/port number. Change its IP address to an address outside of the special multicast address group, or do not use it for the multicast data feed.

Error Message `%MCAST-2-IGMP_FALLBACK:IGMP: Running in FALL BACK mode`

Explanation The network management processor (NMP) has detected excessive multicast traffic being directed to a special multicast address that should be used exclusively for control purposes. As a result, the NMP has entered fallback mode, in which it stops snooping packets with the specified destination MAC address. After 5 minutes the NMP will attempt to listen to these groups again. If it fails 3 times, the switch will move to fallback mode permanently. In fallback mode, only IGMP-based packets will be directed to the NMP, and router ports will be learned only from IGMP general query messages.

Recommended Action From the group and IP address information displayed by related system messages, determine which device's IP address is being aliased. Change its IP address to an address outside of the special multicast address group, or do not use it for the multicast data feed.

Error Message `%MCAST-2-IGMP_SNOOP_DISABLE:`

Explanation IGMP snooping is disabled, but the system is receiving multicast traffic. This situation will force multicast packets to be directed to the route processor, possibly flooding it. IGMP snooping may have been disabled automatically due to excessive multicast traffic.

Recommended Action By capturing packets on the management VLAN (using a sniffer or SPAN), determine the source of the excessive multicast traffic and remove it.

MCAST-3

Error Message `%MCAST-3-GROUP_IP_INVALID: MCAST: Invalid group_ip in SSO sync msg for LTL type=[dec], index [hex]`

Explanation A system error has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCAST-3-IGMP_PKT_DROPPED:IGMP: IGMP Queue full (high packet rate/CPU busy), dropped [dec] packet(s) in last 5 minutes`

Explanation The IGMP queue dropped one or more packets during the past five minutes either because the queue was full due to a high packet rate or because the CPU was too busy.

Recommended Action If the packet drops are few and infrequent, the drops may be caused by a transient condition, and no action is required. If many packets are being dropped, a multicast server might be flooding the switch, or some other process might be using excessive CPU resources.

Error Message `%MCAST-3-PIMV2_PTCAM_LTL_ALL: PIMv2 PT_CAM LTL change to %s failed on all %s`

Explanation While the system was executing an MPLS, router-guard, or PIM rate-limiter configuration command, communication with all line cards failed. As a result, the PIMv2 protocol redirection feature might not work properly.

Recommended Action Enter the MPLS, router-guard, or PIM rate-limiter command (**[no] mpls ip** or **[no] router-guard ip multicast switchports** or **[no] mls rate-limit multicast ipv4 pim**) again to cause the PIMv2 redirection local target logic (LTL) to be reprogrammed.

Error Message `%MCAST-3-PIMV2_PTCAM_LTL_LC: PIMv2 PT_CAM LTL change to %s failed on linecard %d`

Explanation While the system was executing an MPLS, router-guard or PIM rate-limiter configuration command, communication with one of the line cards failed. As a result, the PIMv2 protocol redirection feature might not work properly.

Recommended Action Enter the MPLS, router-guard, or PIM rate-limiter command (**[no] mpls ip** or **[no] router-guard ip multicast switchports** or **[no] mls rate-limit multicast ipv4 pim**) again to cause the PIMv2 redirection local target logic (LTL) to be reprogrammed.

Error Message `%MCAST-3-PROT_RED_ALL: %s of %s redirection failed on all %s`

Explanation While IGMP or PIMv2 snooping was being globally enabled or disabled, communication with all line cards failed. As a result, the protocol redirection feature might not work properly.

Recommended Action Disable and then enable IGMP or PIMv2 snooping globally, or vice versa, depending on whether the enable or disable form of the **[no] ip [igmp | pim] snooping** command was executed.

Error Message `%MCAST-3-PROT_RED_LC: %s of %s redirection failed on linecard %d`

Explanation While IGMP or PIMv2 snooping was being globally enabled or disabled, communication with one of the line cards failed. As a result, the protocol redirection feature might not work properly.

Recommended Action Disable and then enable IGMP or PIMv2 snooping globally, or vice versa, %MCASTRED-3-BAD_SYNC_TYPE depending on whether the enable or disable form of the **[no] ip [igmp | pim] snooping** command was executed.

Error Message `%MCAST-3-QUERY_INT_MISMATCH: Snooping Querier received a non-matching query interval ([dec] msec), from querier address ([IP_address]) on VLAN([dec]).Configured query-interval ([dec] msec)`

Explanation Mismatch of snooping query interval found between routers which can lead to querier flapping issues

Recommended Action Configure the same snooping query interval across all the active and redundat queriers in the VLAN.

MCAST-4

Error Message `%MCAST-4-LTL_FULL_VDB_CREATE_FAILED: Multicast Multi-Layer Switching: Failed to create VLAN ([dec]), hardware resource unavailable`

Explanation The number of multicast MAC entries has exceeded the hardware limit. As a result, the VLAN will be software switched. This error also occurs when a larger number of VLANs are configured on a virtual switch.

Recommended Action Check the number of multicast MAC entries using the **show mac-address-table multicast count** command. Consider rearranging the network topology to reduce the multicast MAC count. Once multicast MAC entries fall below the hardware limit, unconfigure the VLAN using the **no vlan** command and reconfigure it.

Error Message `%MCAST-4-RX_LVRANGE:IGMP: Rcvd Leave in the range [chars]`

Explanation The switch received an IGMP leave message from a host for the group address in the specified range. This range is normally used for control packets and should not be used for general multicast data traffic.

Recommended Action No action is required if the frequency of the message is not affecting the operation of the switch. This message may indicate a malfunction of the multicast host device that sent it. To determine the identity of the multicast device, check for related system messages reporting details of the IGMP leave. Using the port information displayed by the related system messages, capture port traffic to determine the source of the IGMP leave message.

MCAST-5

Error Message `%MCAST-5-RX_IGMPLV:IGMP: Rcvd IGMP Leave [chars] on [dec]/[dec]`

Explanation The switch has received an IGMP leave message for the group number on module number/port number; [chars] is the group number, and [dec]/[dec] is the module number/port number.

Recommended Action No action is required.

Error Message `%MCAST-5-RX_IGMPREPORT:IGMP: Rcvd IGMP Report [chars] on [dec]/[dec]`

Explanation The switch has received an IGMP report message for the group number on module number/port number; [chars] is the group number, and [dec]/[dec] is the module number/port number.

Recommended Action No action is required.

MCAST-6

Error Message `%MCAST-6-CGMP_JOININFO: CGMP: GDA %e USA %e`

Explanation The system has received from the router a Cisco Group Management Protocol (CGMP) join message for the group destination address (GDA) for the host whose unicast source address (USA) is shown.

Recommended Action No action is required.

Error Message `%MCAST-6-DELGDA: Deleting a GDA %e in vlan %d`

Explanation A multicast entry in the specified VLAN is being deleted because an IGMP leave from the last host for this group destination address (GDA) was received.

Recommended Action No action is required.

Error Message `%MCAST-6-ETRACK_LIMIT_EXCEEDED: [chars] snooping was trying to allocate more explicit-tracking entries than what allowed ([dec]`

Explanation The allocation of explicit-tracking entries is limited to avoid the monopolizing of system resources by IGMP and MLD snooping.

Recommended Action Reduce the number of (s,g) channels or the number of receivers. When the explicit-tracking database has gone beyond its limit, new membership for any channels will not be tracked. This condition might cause high-leave latency when those members leave a channel. Another alternative is to increase the limit from configuration mode by entering the **ip igmp snooping limit track** *max-entries* command. It is important to note that increasing the value of *max-entries* could cause the system to fail because of high use of system resources.

Error Message `%MCAST-6-ETRACK_STATS_LIMIT_EXCEEDED: Number of entries in %s snooping explicit-tracking statistics has exceeded the %s (%d)`

Explanation The number of explicit-tracking statistics entries is bounded to avoid monopolizing of system resources by IGMP/MLD snooping. The explicit-tracking statistics database maximum size is set to the same as that of explicit-tracking limit. The statistics are split into two banks: permanent and volatile. The statistics entries will be stored permanently (volatile) until the permanent entries threshold is reached, after which the statistics will be stored temporarily up to the database maximum size. When the size of the database exceeds the permanent threshold, a group will be removed on receiving an IGMP/MLD leave. Groups can be removed whether they were installed above or below the permanent threshold. If the number of statistics entries grows beyond the maximum size of the database, then no statistics will be stored for any newly formed groups.

Recommended Action If the number of groups being used in the network exceeds the recommended value of the explicit-tracking database, you can increase the size of the database using the **ip {igmp | mld} snooping limit track {0-128000}** command. If the number of groups being used by hosts exceeds the recommended value of the explicit-tracking database, but the number of groups currently active is less than the database size and you require complete statistics, you can set the explicit-tracking limit to the maximum using the **ip {igmp | mld} snooping limit track {0-128000}** command. If you are interested only in statistics of the groups currently active in the system, you

can clear the IGMP/MLD snooping statistics to free up space in the database. The following command can be used to clear snooping statistics: **clear ip {igmp | mld} snooping statistics [interface [**type slot/port **| vlan** x**]].**

Error Message %MCAST-6-GC_LIMIT_EXCEEDED: IGMP snooping was trying to allocate more Layer 2 entries than what allowed ([dec])

Explanation IGMP snooping attempted to allocate more Layer 2 entries than the permitted amount specified in the message.

Recommended Action No action is required.

Error Message %MCAST-6-GLOBAL_CGMP_REDIRECT_NOT_INSTALLED: Global IGMP Snooping CGMP MAC Redirection not Installed, System cannot operate in IGMP_CGMP mode automatically

Explanation The global IGMP Snooping feature was unable to install the CGMP-MAC redirection. As a result, the system cannot automatically function in IGMP_CGMP mode when the CGMP-capable devices are in the network.

Recommended Action Enter the per-VLAN **ip igmp snooping cgmp present** command in all the VLANs that have one or more receivers through a CGMP-capable Layer 2 switch connected to this system.

Error Message %MCAST-6-IGMP_CGMP_MODE: IGMP snooping now is running in IGMP_CGMP mode on vlan [dec]

Explanation The specified VLAN is running in IGMP/CGMP mode.

Recommended Action No action is required.

Error Message %MCAST-6-IGMP_ONLY_MODE: IGMP snooping now is running in IGMP_ONLY mode on vlan [dec]

Explanation The specified VLAN is running in IGMP mode.

Recommended Action No action is required.

Error Message %MCAST-6-IGMP_PKT_DROPPED: IGMP: IGMP Queue full (high packet rate/CPU busy), dropped [dec] packet(s) in last 5 minutes

Explanation The IGMP packet queue is not able to accommodate additional packets. Any additional packets will be dropped without processing.

Recommended Action Reduce the IGMP packet rate to prevent packets from being dropped.

Error Message %MCAST-6-IGMP_RATE_LIMIT_DISABLE: IGMP: enabling Snooping on
Vlan([dec]), IGMP messages will not be rate limited

Explanation After throttling the IGMP messages on the VLAN for a certain period, snooping is
reenabled after the user manually fixes the rate on the offending VLAN and reduces the CPU load.

Recommended Action No action is required.

Error Message %MCAST-6-IGMP_RATE_LIMIT_ENABLE: IGMP: Incoming IGMP message rate
exceeded max threshold([dec] pps), disabling Snooping on Vlan([dec]) with
Rate([dec] pps)

Explanation The incoming rate of IGMP messages exceeded the maximum configured threshold.
Snooping will be disabled on all high-rate VLANs to lower the aggregate rate below the threshold
on all remaining VLANs.

Recommended Action Ease the CPU load by reducing the rate of IGMP messages on all high-rate
VLANs.

Error Message %MCAST-6-IGMPV3_BADPKT: IGMPV3: No of bad packets received (%s) = %d

Explanation The switch received the specified number of bad IGMP packets.

Recommended Action No action is required.

Error Message %MCAST-6-IGMPV3_EXCLUDE_RECORD: Received %d IGMP-V3 EXCLUDE Group
Records with zero sources. Last received from

Explanation This message indicates the number of IGMPv3 EXCLUDE 0 reports that were received
for groups in the source specific multicast (SSM) range.

Recommended Action No action is required.

Error Message %MCAST-3-IGMPV3_V1V2PKT: No of IGMP (%s) messages received in SSM Range
= %d

Explanation The specified number of IGMP messages was received for groups in the source specific
multicast (SSM) range.

Recommended Action No action is required.

Error Message %MCAST-6-IGMP_BADPKT: IGMP: No of Packets received with %s in last 5
minutes = %d

Explanation The switch received the specified number of IGMP packets with bad checksums during
the previous five minutes.

Recommended Action No action is required.

Error Message `%MCAST-3-IGMP_VLAN_SNOOP_ALL: %s of protocol redirection for vlan %d failed on all %s`

Explanation While enabling or disabling IGMP snooping on the VLAN, communication with all line cards failed. As a result, the protocol redirection feature might not work properly for the VLAN.

Recommended Action Disable and then enable IGMP snooping on the VLAN, or vice versa, depending on whether the enable or disable form of the **[no] ip igmp snooping** command was executed.

Error Message `%MCAST-3-IGMP_VLAN_SNOOP_LC: %s of protocol redirection for vlan %d failed on linecard %d`

Explanation While enabling or disabling IGMP snooping on the VLAN, communication with one of the line cards failed. As a result, the protocol redirection feature might not work properly for the VLAN.

Recommended Action Disable and then enable IGMP snooping on the VLAN, or vice versa, depending on whether the enable or disable form of the **[no] ip igmp snooping** command was executed.

Error Message `%MCAST-6-L2_HASH_BUCKET_COLLISION: Failure installing (G,C)->index: ([enet],[dec])->[hex] Protocol :[dec] Error:[dec]`

Explanation A Layer 2 entry could not be installed in the hardware because there is not enough space in the hash bucket. Multicast packets will be flooded on the incoming VLAN because the Layer 2 entry installation failed.

Recommended Action No action is required.

Error Message `%MCAST-6-LTL_HIGH_WATER_MARK: Number of free LTL indices in the system has reached above the low threshold ([dec])`

Explanation The number of indices available in the system has increased above the low threshold. Snooping on the VLANs will resume.

Recommended Action No action is required.

Error Message `%MCAST-6-LTL_LOW_WATER_MARK: Number of free LTL indices in the system has reached below the low threshold ([dec])`

Explanation The number of indices available in the system has fallen below the low threshold. As a result, the multicast traffic on the VLANs will be flooded and snooping will be discontinued.

Recommended Action Check whether the system has many source-only entries.

Error Message `%MCAST-6-LTL_WATER_MARK: Number of free LTL indices in the system has reached above the low threshold (%d)`

> **Explanation** The number of local target logic (LTL) indices available in the system has exceeded the lower threshold, and snooping on the VLANs will resume.

> **Recommended Action** No action is required, but you can enter the **remote command switch show mmls mltl** command to check multicast LTL resource usage.

Error Message `%MCAST-6-MCAST_PROT_STATUS: %s Feature is %sabled`

> **Explanation** This message displays whether the Layer 2 multicast feature is enabled or disabled.

> **Recommended Action** No action is required.

Error Message `%MCAST-6-MCAST_RTRADD_PIM: Adding Router Port %d/%d in vlan %d - PIM message`

> **Explanation** The CGMP/IGMP has learned a new router port through a PIM message.

> **Recommended Action** No action is required.

Error Message `%MCAST-6-MCAST_RTRADD_PROT: Adding Router Port %d/%d in vlan %d`

> **Explanation** The CGMP/IGMP/MLD has learned a new router port.

> **Recommended Action** No action is required.

Error Message `%MCAST-6-MCAST_RTRADD_USERCFG: Adding Router Port %d/%d in vlan %d - User Configured`

> **Explanation** A user-configured multicast router port was added using the CLI.

> **Recommended Action** No action is required.

Error Message `%MCAST-6-MCAST_TOPOCHG: Recvd Topology Change Notification in vlan %d`

> **Explanation** The network management processor (NMP) received a topology change notification in a VLAN.

> **Recommended Action** No action is required.

Error Message `%MCAST-6-MLD_ADDRESS_ALIASING_FALLBACK: Address Aliasing detected for [enet] on vlan [dec] from possible src-ip[ipv6_addr] dst-ip[ipv6_addr] src-mac [enet]`

Explanation Multicast packets with destinations that alias a special Layer 2 entry can indicate a possible denial-of-service attack and overwhelm the CPU.

Recommended Action Remove from the Layer 2 table the entry for which address aliasing was detected.

Error Message `%MCAST-6-MLD_ADDRESS_ALIASING_NORMALMODE: Address Aliasing timer expired reinstalling entry for group [enet] on vlan [dec]`

Explanation After a certain time (dependent on the group for which address aliasing was detected) the corresponding Layer 2 entry is reinstalled.

Recommended Action Reinstall in the Layer 2 table the entry for which address aliasing was detected

Error Message `%MCAST-6-MLD_RATE_LIMIT_DISABLE: MLD: enabling Snooping on Vlan([dec]), MLD messages will not be rate limited`

Explanation After throttling the IGMP messages on the VLAN for a certain period, snooping is reenabled after the user manually fixes the rate on the offending VLAN and reduces the CPU load.

Recommended Action No action is required.

Error Message `%MCAST-6-MLD_RATE_LIMIT_ENABLE: MLD: Incoming MLD message rate ([dec] pps) exceeded max threshold([dec] pps), disabling Snooping on Vlan([dec]) for [dec] secs`

Explanation The incoming rate of MLD messages has exceeded the maximum configured threshold. Snooping will be disabled on all high rate VLANs to reduce the aggregate rate on all remaining VLAN to below the threshold.

Recommended Action Ease the CPU load by reducing the rate of MLD messages on all high-rate VLANs.

Error Message `%MCAST-6-RGMP_JOIN: Rcvd RGMP Join Mesg %d/%d vlan %d for Group %i`

Explanation The router has joined a multicast group.

Recommended Action No action is required.

Error Message `%MCAST-6-RGMP_JOINRANGE: Rcvd RGMP Join Message in the range 01-00-5e-00-00-xx`

Explanation The router sent a message for an invalid (reserved) address. The address 01-00-5e-00-00-xx cannot be used by the Router Port Group Management Protocol (RGMP).

Recommended Action No action is required.

Error Message %MCAST-6-RGMP_LEAVE: Rcvd RGMP Leave Mesg %d/%d vlan %d for Group %i

Explanation The router has left a multicast group.

Recommended Action No action is required.

Error Message %MCAST-6-RGMP_LVRANGE: Rcvd RGMP Leave Mesg in the range 01-00-5e-00-00-xx

Explanation The router sent a message for an invalid (reserved) address. The address 01-00-5e-00-00-xx cannot be used by RGMP.

Recommended Action No action is required.

Error Message %MCAST-6-RTRDEL_TIMEOUT: Deleting Router Port %d/%d in vlan %d - Timeout

Explanation The router port timer has timed out and the router port entry has been removed.

Recommended Action Determine whether a router is connected to the indicated port, and verify that IGMP is enabled.

Error Message %MCAST-6-RTRRGMP_BYE: Router Port %d/%d in vlan %d has become nonRGMP-capable

Explanation An RGMP router port has changed to a non-RGMP router port.

Recommended Action No action is required.

Error Message %MCAST-6-RTRRGMP_HELLO: Router Port %d/%d in vlan %d has become RGMP-capable

Explanation A router port has changed to a RGMP-capable port.

Recommended Action No action is required.

Error Message %MCAST-6-RTRRGMP_TIMEOUT: Router Port %d/%d in vlan %d has become RGMP-capable

Explanation The RGMP router has timed out and the port is no longer RGMP-capable.

Recommended Action No action is required.

Error Message %MCAST-6-RX_CGMPJN: Rcvd CGMP Join Mesg in vlan %d

Explanation A CGMP join message was received by a VLAN.

Recommended Action No action is required.

Error Message `%MCAST-6-RX_CGMPLV: Rcvd CGMP Leave Mesg %d/%d vlan %d`

Explanation A CGMP leave message was received on a VLAN port.

Recommended Action No action is required.

Error Message `%MCAST-6-RX_IGMPLV: IGMP: Rcvd IGMP Leave %e on %d/%d`

Explanation The switch received an IGMP leave message for the group number on module number/port number.

Recommended Action No action is required.

Error Message `%MCAST-6-RX_IGMPREPORT: IGMP: Rcvd IGMP Report %e on %d/%d`

Explanation The switch received an IGMP report message for the group number on module number/port number.

Recommended Action No action is required.

Error Message `%MCAST-6-RX_JNRANGE: IGMP: Rcvd Report in the range of 01-00-5e-00-00-xx`

Explanation The switch received an IGMP report from a host for the group address in the range of 01-00-5e-00-00-xx. This range is reserved for control packets and should not be used for general multicast data traffic.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCAST-6-RX_LVRANGE: IGMP: Rcvd Leave in the range of 01-00-5e-00-00-xx`

Explanation The switch received an IGMP leave from a host for the group address in the range of 01-00-5e-00-00-xx. This range is reserved for control packets and should not be used for general multicast data traffic.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCAST-6-SOURCE_ONLY_LIMIT_EXCEEDED: [chars] snooping was trying to allocate more source only entries than allowed ([int])`

Explanation Attempts by the IGMP snooping module to allocate source-only entries has exceeded the limit. This limit prevents the IGMP snooping module from consuming all of the system resources. Any IP groups sent in excess of the limit will not be learned by IGMP snooping.

Recommended Action Either reduce the number of IP groups sent or increase the limit by entering the **ip igmp snooping source-only-learning limit** *max-entries* command. Increasing the value of *max-entries* could cause a system failure due to the overuse of system resources.

MCAST_MQC Messages

This section contains multicast modular quality of service command-line interface MQC messages.

MCAST_MQC-3

Error Message `%MCAST_MQC-3-CMAP_SDB_REGISTER: Error initialising class-map of type multicast-flows.`

Explanation The system could not register the component related to the class map of type \n multicast-flows to the string database.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MCASTRED Messages

This section contains multicast redundancy (MCASTRED) messages.

MCASTRED-3

Error Message `%MCASTRED-3-ACKQMSG: Failed attempt to enqueue sync message type %u in confirmation queue`

Explanation An attempt to link a new synchronization message into the synchronization message confirmation queue failed. This failure indicates corruption of the linkage within the queue. It is not possible to track message confirmation or to initiate a recovery action if confirmation is not received.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ACKUNQMSG: Failed to remove sync request type %u from pending ACK queue`

Explanation An attempt failed to unlink a completed synchronization request from the queue for requests awaiting confirmation of receipt from the standby route processor (RP). This failure indicates corruption of the linkage within the pending acknowledgement queue. False timeout error messages and memory leakage are likely. Loss of standby RP synchronization is possible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ALCSYNCTYP: Attempt to allocate sync request for invalid sync type %u`

Explanation A function attempting to perform a synchronization operation has specified an invalid synchronization data type. No synchronization operation can be performed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ALLOCMSG: Sync message buffer allocation failed for sync info type %u`

Explanation An attempt to allocate a buffer for synchronization message transmission failed. Loss of synchronization on the standby route processor (RP) is likely.

Recommended Action Attempt standby RP synchronization by reloading the standby RP. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ALLOC_CAP_TLV: Failed attempt to allocate memory for %s client capability TLV`

Explanation The callback function responsible for creating an ISSU capability type length value (TLV) list was unable to allocate memory to hold the TLV list. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-BAD_EVENT_TYPE: Defrd sync event type [dec] is invalid.`

Explanation An invalid value was specified in a call to handle events which deferred sync elements are waiting for. The value is greater than PIM_SYNC_WAIT_FOR_EVENT_MAX.

Recommended Action This is a transient error. However, this condition indicates other errors in the software that will require further examination by your Cisco technical support representative. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-BAD_SYNC_TYPE: PIM sync type %d is invalid or too large.`

Explanation In a call to modify an array indexed by the Protocol Independent Multicast (PIM) synchronization type, an out-of-bounds value was specified. The specified value exceeds either PIM_SYNC_TYPE_MAX or the length of the array.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-BLKNOBOOL: Failed to create %s watched boolean for bulk sync`

Explanation An attempt to create a watched boolean to monitor bulk synchronization of state information to the standby route processor (RP) has failed. It is not possible to verify successful completion of the bulk synchronization operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-BLKNOFUNC: No bulk sync function defined for sync type %u

Explanation No function is defined for bulk synchronization of database information of this type. Some required information might not be synchronized to the standby RP.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-BULKRQTIME: Timeout sending bulk sync requests to standby

Explanation The maximum wait time has expired for transmission of enqueued bulk synchronization messages to the standby RP. Some required synchronization messages might not have been sent successfully.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-BULK_COMPLETE_INCOMPATIBLE: Skipping sending of bulk sync completion message to peer: Incompatible message type.

Explanation The message code designated for peer RP confirmation of bulk synchronization completion was not recognized by the ISSU infrastructure as a compatible PIM HA message type. Although PIM bulk synchronization may have succeeded, bulk synchronization confirmation is not possible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-BULK_COMPLETE_XFORM_FAIL: ISSU xmit transform failed for bulk send complete message.`

Explanation An ISSU transformation failed on the message used for peer RP confirmation of bulk synchronization completion. Although PIM bulk synchronization may have succeeded, bulk synchronization confirmation is not possible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-CAP_PROC_NULL_CTX: NULL client context for ISSU capability TLV processing.`

Explanation The callback function responsible for processing a capability type length value (TLV) was invoked by the ISSU infrastructure with a NULL client context. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-CAP_PROP_NULL_CTX: NULL client context for ISSU capability TLV setup.`

Explanation The callback function responsible for creating a capability type TLV was invoked by the ISSU infrastructure with a NULL client context. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-DDE_REPLAY_FAILSAFE: PIM NSF Data Driven Event failsafe timer expired. First waiting VRF is`

Explanation Multicast Forwarding Information Base (MFIB) replay of data driven events and subsequent Multicast Routing Information Base (MRIB) update processing has not completed within the maximum allowed time interval. Protocol Independent Multicast (PIM) is forcing termination of the Data Driven Event (DDE) replay monitoring period but some multicast routing information might not have been restored.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-DDE_REPLAY_NULL_MVRF: NULL MVRF specified for DDE replay.`

Explanation An invalid (NULL) value was specified in a call to initiate MFIB data driven event replay following a route processor failover. Some previously existing multicast state might not be preserved through the route processor failover.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-DECODEFUNC: No decode function exists for sync data type %u`

Explanation No function is defined for handling synchronization data of the specified type. No synchronization action is possible on the standby RP for the synchronization message that specified this data type.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-DECODENULL: No message buffer specified for standby sync of database type %u`

Explanation A function was invoked to perform a database synchronization operation on the standby RP, but the caller did not specify the address of the synchronization message containing the information required for performing the synchronization operation. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-DEFER_SYNC_FAILURE: Sync failure in standby defer sync operation.`

Explanation An element which was scheduled to be synched later has failed to sync either upon arrival of the event it was waiting for or it has waited in the deferred sync queue for more than 1 minute.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

Error Message `%MCASTRED-3-DELNULLREQ: No sync request specified in sync request deletion attempt.`

Explanation In a call to delete a synchronization request entry, the caller failed to specify the location of the synchronization request to be deleted. A memory leak is likely.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-DELSYNCTYP: Attempt to delete sync request for invalid sync type %u

Explanation A function attempting to delete a synchronization request has specified an invalid synchronization data type. The synchronization request cannot be deleted. A memory leak is likely.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-EMPTY_CAP_GROUP: Empty capability group for %s ISSU client capability TLV setup.

Explanation The callback function responsible for creating an ISSU capability type length value (TLV) found that the count of capability entries in its client context table was zero. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-EMPTY_CAP_PROPOSE_TABLE: Empty capability table for ISSU capability TLV setup.

Explanation The callback function responsible for creating a capability type TLV was invoked by the ISSU infrastructure with a capability table containing no capability types. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-EOXBADRC: Invalid completion code %u for sync message transmission type %u`

Explanation An undefined completion code was specified for end of synchronization message transmission handling. Memory leakage, false timeouts, and other subsequent errors may result.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-EOXNOREQ: End of sync message transmission: no sync request specified`

Explanation End of synchronization message transmission handling was invoked with no synchronization request specified. Cleanup for successful transmission cannot proceed. Retry for unsuccessful transmission cannot proceed. Memory leakage is likely and loss of synchronization on the standby RP is possible.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-FINDNULLENT: No target specified for sync entity search.

Explanation In a call to invoke a search for a database entity requiring synchronization to the standby RP, the caller failed to specify a descriptor for the entity to be synchronized. The synchronization operation entity cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-FMTFUNC: No sync message format function defined for sync type %u

Explanation No function is defined to create a synchronization message for this type of database information. Loss of synchronization on the standby RP is likely.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-FMTGENNOBF: No message buffer specified for generic sync message info

Explanation A function was invoked to store generic synchronization message information into an outgoing message buffer, but the caller did not specify the outgoing message buffer address. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-FMTMSG: Failed to format a sync message for sync type %u`

Explanation An attempt to format (create) a synchronization message has failed. The synchronization message cannot be sent. Loss of synchronization on the standby RP is likely.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-FMTNULLPRM: Missing parameters in sync message format request for data type %u`

Explanation A function was invoked to store synchronization message information into an outgoing message buffer, but the caller failed to specify either the location of the search key for the database entity to be synchronized or the address of the outgoing message buffer. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-HASHNQ: Failed attempt to enqueue sync request type %u in hash table`

Explanation An attempt to link a new synchronization request into the synchronization request hash table failed. This failure indicates corruption of the linkage within the hash table. The synchronization operation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-HLD_RLS_NO_MVRF: No MVRF for tableid 0x%x specified for multicast NSF holdoff release.`

Explanation A table ID for which no MVRF exists was specified as an input to a function registered for releasing of a multicast NSF holdoff lock. If the calling client has a real holdoff extension request pending for some MVRF, the lock will not be released until the holdoff failsafe timer expires. This condition could delay completion of multicast reconvergence following an RP failover.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-HOLDOFF_FAILSAFE: PIM NSF failsafe timer expired. Holding client mask = 0x%x`

Explanation One or more clients requested extension of the PIM NSF holdoff period, but did not release the holdoff within the maximum allowed time interval. PIM is forcing termination of the NSF holdoff period and resumption of normal flow of multicast routing information, but one or more clients may not be ready to resume normal operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-INITNOBOOL: Failed to create %s watched boolean during multicast redundancy initialization`

Explanation An attempt to create a watched boolean during multicast (PIM) redundancy process initialization has failed. The PIM redundancy process cannot be initialized.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-INITNOQUEUE: Failed to create %s watched queue during multicast redundancy initialization`

Explanation An attempt to create a watched queue during multicast (PIM) redundancy process initialization has failed. The PIM redundancy process cannot be initialized.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-INVALID_CAP_PROPOSE_TABLE: Invalid capability table for %s client ISSU capability TLV setup.`

Explanation The callback function responsible for creating a capability type length value (TLV) was invoked by the ISSU infrastructure with a capability table that did not match any of the registered entries for this client. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-INVSYNCTYP: Attempt to initiate sync request for invalid sync type`

Explanation The synchronization data type specified by the function attempting to initiate a synchronization operation is not a valid type. No synchronization operation can be performed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-INV_CKPT_MSG: Received invalid CF message. client = %u, entity = %u, type = %u

Explanation An invalid checkpoint facility (CF) message was received by the PIM HA checkpoint client. The message cannot be processed. This condition might cause a loss of database synchronization between the primary and standby RPs.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-INV_PORT_TYPE: Invalid communication port identifier %u specified for ISSU port up/down handling

Explanation An undefined communication port identifier was specified for PIM ISSU transport up or down handling. PIM ISSU communication port up or down handling cannot proceed. PIM ISSU functionality might be impaired or lost.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-ISSU_EMPTY_TLV: Empty TLV list received for ISSU %s client capability processing

Explanation The callback function responsible for processing an ISSU capability type length value (TLV) list received an empty TLV list. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ISSU_PROC_CAP_TYPE: Invalid capability type found in %s client capability entry.`

Explanation The callback function responsible for processing an ISSU capability type TLV list encountered a capability type for which no handling is available. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-ISSU_TLV_INSERT: Failed to insert entry in ISSU capability TLV list for %s client`

Explanation The callback function responsible for creating an ISSU capability type TLV list encountered a failure when attempting to insert an entry into a TLV list. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-LOCFUNC: No database entity search function defined for sync type %u`

Explanation A function was invoked to store synchronization message information into an outgoing message buffer, but no function exists for locating a database entry of the specified type. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-LOCNULLENT: No destination specified in search for sync entity of type %u`

Explanation A function was invoked to search for a database entity of the specified type, but the caller failed to specify a destination for storing the search result. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-LOCNULLHND: No search handle specified in search for sync entity of type %u`

Explanation A function was invoked to search for a database entity of the specified type, but the caller failed to specify a search handle (key) for finding the database entity to be synchronized. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-MRIB_UPD_NULL_MVRF: NULL MVRF pointer specified for MRIB update notification.

Explanation A NULL MVRF address was specified in a function call to notify the PIM HA process that all pending updates have been read for a specified MVRF. The process will attempt to continue with RP switchover handling despite this error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-MSGNOREQ: Could not find sync request for completed sync message type %u

Explanation The synchronization request corresponding to a completed synchronization message could not be determined. This condition may result in memory leakage, false timeouts, and other subsequent errors.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-MSGSEQNUM: Out of order sequence number in received sync message for sync data type %u, received epoch/seq %u/%u, expected %u/%u

Explanation The sequence number specified in a synchronization message received by the standby RP is not the expected sequence number for the next received synchronization message. Some synchronization messages may have been lost.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software

issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-MVRF_NAME: MVRF lookup for VRF %s failed.

Explanation An MVRF lookup failed for a VRF name known to be associated with an existing MVRF table, indicating an incorrect setup of search parameters. A PIM data synchronization operation has been aborted.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-MVRF_TABLEID: MVRF lookup for tableid %u failed.

Explanation An MVRF lookup failed for a table ID known to be associated with an existing MVRF table, indicating an incorrect setup of search parameters. A PIM data synchronization operation has been aborted.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-NEGOMSGINV: Invalid negotiation status for %s client message

Explanation The ISSU infrastructure evaluated a message for this client but failed to identify the message as a negotiation message or a user message. The message cannot be processed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-NOSYNCARG: NULL argument pointer specified for PIM data sync type %u.

Explanation A function was invoked to synchronize PIM information, but the caller did not provide a valid data pointer. The synchronization operation for this database entity type cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-PRM_LOOKUP: PIM RP mapping range lookup for VRF %s group %i mask %i failed.

Explanation A PIM RP mapping range lookup failed for a range that is known to exist, indicating an incorrect setup of search parameters. A PIM data synchronization operation has been aborted.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-RCVNODATA: No data pointer returned for received checkpoint message

Explanation On reception of a checkpoint message at the standby RP, an attempt to obtain the location of the data for the message returned a NULL pointer. No message contents are available for this message.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some

messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-RPDF_NO_IDB: No IDB for if_number %u in Bidir RP DF sync attempt for RP address %i.`

Explanation   In a function call to trigger synchronization of bidirectional RP designated forwarder (DF) information, the interface descriptor block (IDB) if_number specified does not map to any existing IDB. The synchronization operation cannot proceed. The DF information might no longer be correct following an RP failover.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-RPDF_NULL_IDB: NULL IDB pointer in Bidir RP DF sync attempt for RP address %i.`

Explanation   In a function call to trigger synchronization of bidirectional RP DF information, a NULL IDB address was specified. The DF information might no longer be correct following an RP failover.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-RTRYLIMIT: Retry limit reached for sync type %u

Explanation The maximum allowable number of transmission retries has failed for a database entity of this type. No further retries can be executed. The standby RP might no longer be synchronized with the active RP.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-RTRYNOREQ: Sync retry requested with no sync request specified

Explanation A retry was requested for transmission of a synchronization message, but no synchronization request information was specified. The retry cannot be executed. The standby RP might no longer be synchronized with the active RP.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCASTRED-3-SNDMSG: Failed to send a sync message for sync type %u

Explanation An attempt to send a synchronization message has failed. The message transmission will be automatically retried.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-SNDNODATA: No data pointer provided in checkpoint message to be sent.`

Explanation After allocation of a checkpoint message buffer in the primary RP, an attempt to obtain the location of the data for the message returned a NULL pointer. The checkpoint message cannot be sent. Loss of standby synchronization is likely.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-SPURIOUS_MGD_TIMER_EXP: Managed timer wakeup received by the PIM HA process with no expired timers.`

Explanation The PIM HA process received a wakeup for managed timer expiration, but no expired timer was reported. The timer expiration cannot be handled. The standby RP might no longer be synchronized with the active RP.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-SYNC_REQ_ORPHAN: Orphaned queue links found in sync request hash table search for sync type %u`

Explanation An attempt to find a matching entry for a new synchronization request in the synchronization request hash table failed because of corruption of the linkage within the hash table. The synchronization operation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-TABLE_INVALID_CAP_TYPE: Invalid capability type found in %s client capability entry.`

Explanation The callback function responsible for creating an ISSU capability type length value (TLV) list encountered a capability type for which no handling is available. Capability negotiation cannot proceed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-TUNSYNCMSG: Received invalid termination message for mvrf(%u) while waiting for mvrf(%u) mdt tunnel sync`

Explanation Confirmation has failed for standby RP reception of a multicast distribution tree (MDT) tunnel message. As a result, the standby RP might not be able to create the MDT tunnel.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-TUNSYNCRCV: %s failure in reception of MDT tunnel sync information for mvrf %s on the standby RP.`

Explanation Confirmation has failed for standby RP reception of a multicast distribution tree (MDT) tunnel message. As a result, the standby RP might not be able to create the MDT tunnel.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-TUNSYNCTIME: Timeout waiting for confirmation of mdt tunnel sync for mvrf(%u) (%s)`

Explanation Confirmation has failed for standby RP reception of a multicast distribution tree (MDT) tunnel message. As a result, the standby RP might not be able to create the MDT tunnel.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-TUNSYNCXMIT: Failed to transmit sync MDT tunnel information for mvrf %s to the standby RP.`

Explanation An interprocess communication (IPC) transmission attempt has failed to send an IPC message to the standby RP with multicast distribution tree (MDT) tunnel synchronization information. As a result, the standby RP will not be able to create the MDT tunnel.

Recommended Action Attempt to synchronize the standby RP by reloading it. If the error recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-UCAST_CONV_STBY: Spurious unicast convergence notification received on standby RP for mvrf %s.`

Explanation Unicast convergence notification was erroneously signalled on the standby RP for the specified multicast VRF. This convergence notification is being ignored.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCASTRED-3-WAITQ_ORPHAN: Orphaned queue links found in the %x MVRF`
`wait queue.`

Explanation An attempt to perform state transition handling for multicast VRFs (MVRFs) in this
queue failed. The failure occurred because the queue was corrupted or because one or more queue
link entries did not specify the address of the corresponding MVRF. Multicast route convergence
following an RP failover may be delayed or impaired.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MCAST_RP Messages

This section contains multicast route processor messages.

MCAST_RP-4

Error Message `%MCAST_RP-4-MPLS_PIM_RATE_LIMIT: [chars] when [chars] will reprogram`
`hardware setting for PIM. Please reapply PIM rate-limiter.`

Explanation The Router Guard or PIM Snooping features require the switch hardware to be
programmed in a manner different from MPLS. These two features are incompatible with MPLS.
When either Router Guard or PIM snooping is enabled while MPLS is enabled, the PIM rate limiter
will not work properly.

Recommended Action Unconfigure and reconfigure the PIM rate limiter using the **show mls
rate-limit multicast ipv4 pim** command. The same solution applies to the situation when both
Router Guard and PIM snooping are disabled and MPLS is being enabled.

Error Message %MCAST_RP-4-MPLS_PIM_SNOOPING: The MPLS and PIM Snooping features do not work together. Please disable either one.

Explanation The PIM Snooping feature requires the switch hardware to be programmed in such a way that PIM register messages with MPLS tags might be lost.

Recommended Action Disable either MPLS or PIM Snooping.

Error Message %MCAST_RP-4-MPLS_ROUTER_GUARD: The MPLS and Router Guard features do not work together. Please disable either one.

Explanation The Router Guard feature requires the switch hardware to be programmed in such a way that PIM register messages with MPLS tags might be lost.

Recommended Action Disable either MPLS or Router Guard.

Error Message %MCAST_RP-4-RGUARD_PIM_RATE_LIMIT: **Router Guard** feature if enabled or disabled while PIM rate-limiter is ON will not work properly. Please reapply the PIM rate-limiter.

Explanation The PIM rate limiter floods the rate-limited PIM control packets to all the ports in the VLAN. Because of this, the Router Guard feature will not work properly if enabled while the PIM rate limiter is enabled.

Recommended Action Unconfigure and reconfigure the PIM rate limiter using the **show mls rate-limit multicast ipv4 pim** command.

MCM Messages

This section contains minimum disruption restart (MDR) card manager messages.

MCM-3

Error Message %MCM-3-DEQUEUE_FAIL: Unable to get a free event (%s) from the free event queue (slot: %d, mode %d)

Explanation During runtime, the minimal disruption routing (MDR) card manager is unable to retrieve a free event to communicate between its different processes. MDR operation will probably result in the resetting of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCM-3-GET_MTU_FAIL: Unable to get the MTU for message %d to seat %s (%d) (valid:%d)`

Explanation During runtime, the MDR card manager is unable to get the MTU of a message to be sent between its different processes.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCM-3-NEGO_INCOMPATIBLE: MDR Card manager ISSU negotiation with standby is incompatible`

Explanation An error occurred during MDR card manager initialization. As a result, the MDR card manager is unable to synchronize its data between the active and standby supervisors. An MDR operation will probably result in the resetting of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MCT1E1 Messages

This section contains CT1/CE1 shared port adapter messages.

MCT1E1-2

Error Message `%MCT1E1-2-CMD_DROP: [chars], cmd: [dec], arg0: [dec], arg1: [dec] arg2: [dec], arg3: [dec], vc: [dec] reason: [chars]`

Explanation The SPA driver dropped a configuration command. One or more interfaces or controllers associated with the SPA might not be configured correctly.

Recommended Action Check the configuration of the interfaces and controllers and correct the configuration if necessary. If the condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-2-EV_DROP: [chars], cmd: [dec], arg0: [dec], arg1: [dec] arg2: [dec] reason [chars]`

Explanation The SPA driver dropped an event notification command. Counters or line protocols for one or more interfaces or controllers may be incorrect.

Recommended Action Restart any interfaces or controllers that are down. If the condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MCT1E1-3

Error Message `%MCT1E1-3-AUTODNR: %s failed for slot %d bay %d err %d`

Explanation The Auto-Do-Not-Resequence (AUTODNR)/USNDNR process has failed. The SPA and line card are out of synchronization. This condition indicates a software error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-BAD_SIZE_ERR: SPA [dec]/[dec]: [dec] [chars] events on HDLC Controller were encountered. The SPA is being Restarted.`

Explanation The SPA driver detected an error event on the HDLC controller.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-BATCH_CMD_INVALID_TAG: SPA [dec]/[dec]: Invalid tag value [dec] at index [dec].`

Explanation The SPA driver detected an invalid tag value in a batch command from the RP.

Recommended Action If the ports on the SPA are not operating as expected, power down and reseat the specified SPA card. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCT1E1-3-CMD_FAILED: SPA [dec]/[dec]: f/w send command failed err
[dec] reason [chars]

Explanation The SPA driver could not successfully send a command to the firmware.

Recommended Action If the ports on the SPA are not operating as expected, power down and reseat the specified SPA card. If this message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCT1E1-3-COR_MEM_ERR: SPA [dec]/[dec]: [dec] correctable [chars]
memory error(s) encountered.
The error has been corrected and normal processing should continue.
The memory address of most the recent error is: [hex]

Explanation The SPA driver detected a correctable memory error on the SPA card. The error has been corrected and normal processing should continue. The hexadecimal memory address of the most recent error is specified in the message text on the console or in the system log.

Recommended Action If the condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MCT1E1-3-FPGA_CNTR_ERR: [chars]: [dec] [chars] error(s) encountered.

Explanation The SPA driver detected an FPGA error condition on the SPA card. Interface packet error counter corruption may result.

Recommended Action The SPA should continue to function normally. If the error condition recurs, reset the SPA by doing a physical online insertion and removal (OIR). If the condition persists, copy the error message exactly as it appears. Research and attempt to resolve the issue using the SPA hardware troubleshooting documentation and the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-FRMR_CLKFAIL: SPA [dec]/[dec]: Framer input clock failure detected, CTCLK = [chars]CTIVE, LREFCLK = [chars]CTIVE, SREFCLK = [chars]CTIVE, ctclk count [int] lrefclk count [int] srefclk count [int]`

Explanation The SPA driver detected failure of one or more input clocks to the framer chip. The T1/E1 ports may not operate as expected.

Recommended Action If the ports on the SPA are not operating as expected, power down and reseat the specified SPA card. If this message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-HDLC_CTRL_ERR: SPA [dec]/[dec]: [dec] [chars] events on HDLC Controller were encountered.`

Explanation The SPA driver detected an error event on the HDLC controller.

Recommended Action If the condition persists, c opy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-INITFAIL: MCT1E1 (bay [dec]), Init Failed at [chars] - line [dec] arg [hex]`

Explanation The SPA failed to complete hardware initialization.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-PERIODIC_PROCESS: SPA [dec]/[dec]: periodic process error [chars].`

Explanation The SPA driver detected an error with the periodic processing routine.

Recommended Action If the ports on the SPA are not operating as expected, power down and reseat the specified SPA card. If this message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-QUEUE_HALT_FAIL: [chars]: Could not suspend message ([dec]) or command ([dec]) queue`

Explanation The message or command queue could not be stopped prior to the OIR removal of the SPA.

Recommended Action If the ports on the SPA are not operating as expected, power down and reseat the specified SPA card. If this message persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-SPI4_HW_ERR: SPA [dec]/[dec]: [chars] Hardware error was encountered.`

Explanation The SPA driver detected a hardware error condition on the SPA card's SPI4 bus. This condition might result in improper operation.

Recommended Action Power down and reseat the specified SPA card. If the condition persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-TIMEOUT: %s: %s failed: %d, state: %d, ml_id: %d progress: %d`

Explanation Linkrec is stuck at non-ready. This condition indicates a software error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-UNCOR_MEM_ERR: SPA [dec]/[dec]: [dec] uncorrectable [chars] memory error(s) encountered. The memory address of the most recent error is: [hex] The SPA is being restarted.`

Explanation The SPA driver detected an uncorrectable memory error condition on the SPA card. Packet corruption may result. The hexadecimal memory address of the most recent error is specified in the message text on the console or in the system log.

Recommended Action Power down and reseat the specified SPA card. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MCT1E1-3-UNCOR_PARITY_ERR: SPA [dec]/[dec]: [dec] [chars] parity error(s) encountered.`

Explanation The SPA driver detected an uncorrectable parity error condition on the SPA card. Packet corruption may result.

Recommended Action Power down and reseat the specified SPA card. If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MCX Messages

This section contains Voice port adapter messages.

MCX-3

Error Message `%MCX-3-FREEDMFATAL: Bay [dec]: freedm reset, command-status register [hex]`

Explanation CHOPIN experienced fatal freedm related problem.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MDEBUG Messages

This section contains memory debugging messages.

MDEBUG-2

Error Message `%MDEBUG-2-ACCESSBEYONDSIZE: [hex] access beyond allocated size; ptr = [hex]; size = [dec]; actual size = [dec]; allocator_pc = [hex]; Traceback - [chars]`

Explanation The software attempted to access memory beyond the allocated size.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message M%DEBUG-2-ACCESSFREED: [hex] access freed memory; ptr = [hex]; size = [dec]; actual size = [dec]; allocator_pc = [hex]; free_pc = [hex]; Traceback - [chars]

Explanation The software attempted to access freed memory.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MDR_SM Messages

This section contains minimum disruption restart (MDR) state machine (SM) messages.

MDR_SM-3

Error Message %MDR_SM-3-INIT_FAIL: Initialisation error '%s'

Explanation An error occurred during initialization of the minimum disruption restart (MDR) state machine (SM). As a result, the MDR SM is inoperable. An MDR operation will probably result in the resetting of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_CLIENT_ID_ERROR: Can not find the data associated to client ID (%d) for slot (%d)`

Explanation The MDR state machine cannot find the data registered for the client ID. The client ID is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_CONTINUE_INVALID: Client (%d) returned an invalid status code on slot %d`

Explanation The MDR state machine client returned a status code that is invalid when returned on the standby device.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_EVENT_TIMEOUT: MDR slot state machine %d did not receive the SLOT_UP event from the linecard`

Explanation The MDR slot state machine (SM) did not receive an expected event from the line card. As a result, the state machine is inoperable for this slot.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the

following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_ID_MISMATCH: Client ID mismatch for slot %d during progression %s on client: %d, expecting %d`

Explanation The MDR state machine client returned a client ID that does not match the current client ID. As a result, the MDR state machine will abort.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_INVALID_ARG: Process is unable to get his slot number`

Explanation The MDR state machine process is unable to get the slot number of a slot supporting MDR.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_INVALID_EVENT: Slot (%d) received an unexpected event (%s) in state (%s)`

Explanation The MDR state machine received an unexpected event for the current state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_NOTIFY_STANDBY_FAILED: Failed to notify Standby for MDR slot state machine (%d) Client %s (%d) in state %s`

Explanation The MDR state machine failed to notify the standby device. As a result, the MDR state machine will abort.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_NOTIFY_TIMEOUT: Notification timeout on MDR slot state machine %d for the local client %s (%d) in state %s`

Explanation The MDR state machine (SM) did not receive a response from the MDR SM client. As a result, the state machine is inoperable. An MDR operation will probably result in the resetting of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_NO_FREE_EVENT_IN_QUEUE: The event queue is full for MDR Slot SM %d, MDR Slot SM %d will abort`

Explanation The MDR state machine (SM) was unable to get a free event from the event queue. As a result, the state machine is inoperable. An MDR operation will probably result in the resetting of all the line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SLOT_STATUS_INVALID: Client %s (%d) on slot %d returned an unexpected status code (%d)`

Explanation The MDR state machine client returned an unexpected status code. An MDR operation will probably result in the reset of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SYS_CLIENT_ID_ERROR: Can not find the data associated to client ID (%d)`

Explanation The MDR state machine cannot find the data registered for the client ID. The client ID is invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the

following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-3-SYS_CONTINUE_INVALID: Client (%d) returned an invalid status code

Explanation The MDR state machine client returned a status code that is invalid when returned on the standby device.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-3-SYS_ID_MISMATCH: Client ID mismatch during progression %s on client: %d, expecting %d

Explanation The MDR state machine client returned a client ID that does not match the current client ID. As a result, the MDR state machine will abort.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-3-SYS_INVALID_EVENT: Received an unexpected event (%s) in state (%s)

Explanation The MDR state machine received an unexpected event for the current state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

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Error Message `%MDR_SM-3-SYS_NOTIFY_STANDBY_FAILED: Failed to notify Standby for MDR system state machine Client %s (%d) in state %s`

Explanation The MDR state machine failed to notify the standby device. As a result, the MDR state machine will abort.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-3-SYS_NOTIFY_TIMEOUT: Notification timeout on MDR system state machine for the local client %s (%d) in state %s`

Explanation The MDR state machine (SM) did not receive a response from the MDR SM client. As a result, the state machine is inoperable. An MDR operation will probably result in the resetting of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-3-SYS_NO_FREE_EVENT_IN_QUEUE: The event queue is full for MDR System SM, MDR SM will abort

Explanation The MDR state machine (SM) was unable to get a free event from the event queue. As a result, the MDR SM is inoperable. An MDR operation will probably result in the resetting of all the line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-3-SYS_STATUS_INVALID: Client %s (%d) returned an unexpected status code (%d)

Explanation The MDR state machine client returned an unexpected status code. An MDR operation will probably result in the reset of all line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

MDR_SM-4

Error Message %MDR_SM-4-QUIESCE_FAIL: Quiesce watchdog timer expired, continuing with MDR

Explanation At the start of a switchover, the minimum disruption restart state machine (MDR SM) on the old active RP enters the quiesce state. Because this state blocks the reload of the old active, the switchover is blocked during this state. To prevent a loss of service due to a bug in the MDR SM or one of its clients, a watchdog timer limits the duration of this state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-4-SLOT_CALLBACK_TOO_MUCH_TIME: MDR SM Slot %d client %s (%d) spent too much time (%d msecs) in state (%s)`

Explanation The MDR state machine has detected that one of its clients spent too much time in its callback function. This is a warning message; the MDR state machine will continue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM-4-SYS_CALLBACK_TOO_MUCH_TIME: MDR SM SYS client %s (%d) spent too much time (%d msecs) in state (%s)`

Explanation The MDR state machine detected that one of its clients spent too much time in its callback function. This is a warning message; the MDR state machine will continue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message %MDR_SM-4-UNBLOCK_RF: MDR SM aborted, continuing RF Progression (%d)

Explanation The MDR state machine (SM) aborted due to an error in the MDR state machine or one of its clients. The redundancy facility (RF) progression was blocked, but it will be unblocked to allow the standby device to boot.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

MDR_SM_LC Messages

This section contains minimum disruption restart (MDR) state machine (SM) line card (LC) messages.

MDR_SM_LC-3

Error Message %MDR_SM_LC-3-ABORT: MDR state machine is aborted due to '%s'

Explanation The minimum disruption restart (MDR) state machine (SM) aborted due to an unrecoverable error. Any MDR operation will probably result in the resetting of this line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-ID_MISMATCH: Client ID mismatch during progression on client: %d, expecting %d`

Explanation The MDR state machine client returned a client ID that does not match the current client ID. As a result, the MDR state machine will abort.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-INIT_FAIL: Initialisation error '%s'`

Explanation During the MDR state machine (SM) initialization, an error occurred that has caused the MDR SM to be inoperable. Any MDR operation will probably result in the resetting of this line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-INVALID_EVENT: MDR SM LC received an unexpected event (%s) in state (%s)`

Explanation The MDR state machine (SM) received an unexpected event for the current state.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-NOTIFY_TIMEOUT: Notification timeout for client %s(%d) in state %s`

Explanation During an MDR state machine (SM) state transition, the notification timer expired for the client. Any MDR operation will probably result in the resetting of this line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-NO_FREE_EVENT_IN_QUEUE: The event queue is full for MDR SM, MDR SM will abort`

Explanation The MDR state machine (SM) was unable to get a free event from the event queue. This error has rendered the MDR SM inoperable. An MDR operation will probably result in the resetting of all the line cards.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-SEMWAIT: MDR state machine waiting for semaphore(%s) acquired by pid(%d)`

Explanation The MDR state machine encountered a problem in acquiring a semaphore. Any MDR operation will probably result in the resetting of this line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the

following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_LC-3-STATUS_INVALID: Client %s (%d) returned an unexpected status code (%d)`

Explanation   The MDR state machine client returned an unexpected status code. An MDR operation will probably result in the reset of all line cards.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

MDR_SM_LC-4

Error Message `%MDR_SM_LC-4-CALLBACK_TOO_MUCH_TIME: MDR SM LC client %s (%d) spent too much time (%d msecs) in state (%s)`

Explanation   The minimum disruption restart (MDR) state machine (SM) has detected that one of its clients spent too much time in its callback function. This is a warning message; the MDR state machine will continue.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

MDR_SM_PROXY Messages

This section contains minimum disruption restart (MDR) state machine (SM) proxy messages.

MDR_SM_PROXY-3

Error Message   %MDR_SM_PROXY-3-NOTIFY_TIMEOUT: Notification timeout on MDR %s state machine for the remote client '%s'

Explanation   The minimum disruption restart (MDR) state machine (SM) proxy master did not receive any response to the notification on its slave, and is now unable to communicate with the slave. As a result, the MDR SM is inoperable. An MDR operation will likely result in the resetting of all line cards.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MDR_SM_PROXY-4

Error Message   %MDR_SM_PROXY-4-SLOT_CALLBACK_TOO_MUCH_TIME: MDR SM Slot %d client (%d) spent too much time (%d msecs) in state (%s)

Explanation   The MDR state machine has detected that one of its clients spent too much time in its callback function. This is a warning message; the MDR state machine will continue.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

Error Message `%MDR_SM_PROXY-4-SYS_CALLBACK_TOO_MUCH_TIME: MDR SM SYS client (%d)`
`spent too much time (%d msecs) in state (%s)`

Explanation The MDR state machine has detected that one of its clients spent too much time in its callback function. This is a warning message; the MDR state machine will continue.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support, show logging**, and **show monitor event-trace mdr_sm all** commands and your pertinent troubleshooting logs.

MDS Messages

This section contains multicast distributed switching messages.

MDS-2

Error Message `%MDS-2-LC_INVALID_HWIDB_INDEX: Invalid if_index for HWIDB [chars]`

Explanation The if_index parameter for the hardware IDB was invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MDS-2-LC_INVALID_HWIDBQ_SIZE: Invalid Q count value`

Explanation The Q count parameter was invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MDS-2-LC_INVALID_SWIDB_IFNUM: Invalid if_num for SWIDB [chars]

Explanation The if_index parameter for the software IDB was invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MDS-2-LC_INVALID_SWIDBQ_SIZE: Invalid Q count value

Explanation The Q count parameter was invalid.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MDS-2-LC_SWIDB_UPDATE_NULL_MVRF: LC received swidb update for if_number [hex] ([chars]) tableid [hex].mvrf pointer for this tableid is NULL.

Explanation The line card received a software IDB update from the route processor specifying a multicast VRF table ID for which no multicast VRF exists in the linecard.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MDS-4

Error Message `%MDS-4-ROUTELIMIT_ATTEMPT: Attempt to exceed multicast route-limit of [dec]`

Explanation The number of multicast routes equals the configured maximum allowed. New routes cannot be added unless the configuration is changed.

Recommended Action If multicast traffic is of any priority among the traffic carried by this router, then use the **ip multicast route-limit** command to increase the number of multicast routes. Otherwise, no action is required.

MDT Messages

This section contains Multicast Distribution Tree (MDT) messages.

MDT-4

Error Message `%MDT-4-LBSRC: MDT %s uses source address %i from a non-loopback interface`

Explanation The local peering interface used to set up an MDT tunnel is not a loopback interface. This may cause black holes if the interface is in the outgoing list of the MDT group.

Recommended Action Change the configuration of the **bgp update-source** command and use a loopback interface as the local peering interface.

Error Message `%MDT-4-NO_GROUP_LINK: MDT entry [chars]:([IP_address],[IP_address]) linked by source but not linked by group`

Explanation The entry for the affected MDT group was not properly linked into the MDT database. The inconsistency has been repaired. [chars] is the MDT entry and the [IP_address],[IP_address] are the linked IP addresses.

Recommended Action No action is required.

Error Message `%MDT-4-RD_CONFLICT: MDT entry [chars]:([IP_address],[IP_address]) received an update for RD [chars]`

Explanation A previously existing MDT entry should have been withdrawn by BGP before sending this conflicting update. [chars] is the MDT entry, the [IP_address],[IP_address] are the linked IP addresses, and the second [chars] is the redirect name.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MDT-4-UPDATED_RD_CONFLICT: MDT entry %s:(%i,%i) received an update for RD %s`

Explanation The previously existing entry should have been withdrawn by BGP before sending this conflicting update.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MDT-4-VRFSRC: The source interface of the MDT tunnels, %s, is not in the global table`

Explanation The local peering interface must not be an interface in a VRF.

Recommended Action Change the configuration of the **bgp update-source** command and use a loopback interface in the global table.

MDT-5

Error Message `%MDT-5-DATA_MDT_REUSED: Data MDT %i is reused`

Explanation If all pre-defined data MDT groups are used, a data MDT group can be reused by a particular host that sources user traffic in an VPN.

Recommended Action No action is required.

MDX Messages

This section contains MDX messages.

MDX-1

Error Message `%MDX-1-DAEMSGSNDFAILED: FAILED to send IPC message of TYPE [chars] to slot [dec] on the DAE, FAIL REASON = [chars]`

Explanation An IPC message could not be sent. Retries to send the message were attempted and failed. This condition does not affect system operation.

Recommended Action No action is required.

Error Message `%MDX-1-DAENODPENTRY: MDX framework could not find an entry for the DP with dp_id = [dec] on slot = [dec], on DAE`

Explanation IPC messages that were sent to the line card have been lost as the line card buffers were being reassigned. As a result of this condition, the MDX DP failed to register. This condition does not affect system operation.

Recommended Action Disable the SNMP query of the MIBs depending on the value of dp_id as follows:

If the dp_id is 1, disable the CISCO-ENHANCED-MEMPOOL-MIB SNMP query.
If the dp_id is 2, disable the CISCO-PROCESS-MIB SNMP query.
If the dp_id is 3, disable the CISCO-OPTICAL-MONITORING-MIB SNMP query.
If the dp_id is 4, disable the CISCO-FABRIC-C12K-MIB SNMP query.

You can replace the SNMP query with the CLI to obtain the same results. Enter one or more of the following CLI commands to obtain the required information: **show processes memory, show processes cpu, show controller optics, show controller fia, show controller xbar** or **show controller sca**.

Error Message `%MDX-1-DAEPORTCREATEFAIL: Could not create IPC port for MDX framework on DAE, FAIL REASON = [chars]`

Explanation The IPC port for MDX framework on the Data Aggregator End (DAE) failed for the reason specified in the message text. This condition does not affect system operation, except that the MDX framework will not be able to obtain the requested data from the MIBs.

Recommended Action Enter one or more of the following CLI commands to obtain the required information: **show processes memory, show processes cpu, show controller optics, show controller fia, show controller xbar** or **show controller sca**.

Error Message %MDX-1-DAEPORTOPENFAIL: UNABLE to open port to primary RP FAIL REASON = [chars]

Explanation The MDX Data Aggregator End (DAE) IPC port could not be opened, even after three retry attempts. This condition does not affect system operation, except that the MDX framework will not be able to obtain the requested data from the MIBs.

Recommended Action Enter one or more of the following CLI commands to obtain the required information: **show processes memory, show processes cpu, show controller optics, show controller fia, show controller xbar** or **show controller sca**.

Error Message %MDX-1-DAEPORTOPENFAILRETRY: UNABLE to open port to primary RP try number = [dec], FAIL REASON = [chars], Will retry again

Explanation The MDX Data Aggregator End (DAE) IPC port could not be opened. The system will attempt to retry the operation a maximum of three times. This condition does not affect system operation.

Recommended Action No action is required.

Error Message %MDX-1-DPENTRYEXISTS: An entry already exists for the DP with dp_id [dec] on the DPE, could not create a new entry

Explanation The DP entry that is attempting to be added already exists on the DPE. The new entry could not be created.

Recommended Action No action is required.

Error Message %MDX-1-DPEPORTOPENFAIL: UNABLE to open port to MDX framework on slot = [dec] from DAE, FAIL REASON = [chars]

Explanation The MDX DPE (Data Provider End) IPC port could not be opened because of the reason specified in the message text. This condition does not affect system operation.

Recommended Action No action is required.

Error Message %MDX-1-DPREGFAILED: DP Registration with MDX framework failed on DPE

Explanation The DP could not be registered with the MDX framework on the Data Provider End (DPE). This condition does not affect system operation, except that the MDX framework will not be able to obtain the requested data from the MIBs.

Recommended Action Enter one or more of the following CLI commands to obtain the required information: **show processes memory, show processes cpu, show controller optics, show controller fia, show controller xbar** or **show controller sca**.

Error Message `%MDX-1-IPCMSGSNDFAILED: FAILED to send IPC message of TYPE [chars] to DAE, FAIL REASON = [chars]`

Explanation The MDX component could not send the IPC message because of the reason specified in the message text. This condition does not affect system operation.

Recommended Action No action is required.

Error Message `%MDX-1-IPCMSGUNAVAIL: Request for IPC buffer failed for size = [int]`

Explanation An IPC buffer request returned a null value. The IPC has exhausted its buffer space. This condition does not affect system operation.

Recommended Action Enter the **ipc cache size** command to increase the IPC buffer size.

Error Message `%MDX-1-MSG: [chars]`

Explanation An internal error regarding the MDX facility has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MDX-1-NODPENTRY: MDX framework could not find an entry for the DP with dp_id = [dec]`

Explanation The entry for the DP does not exist in the MDX framework. A possible reason for this error is that the DP has not registered with the framework. This condition does not affect system operation, except that the MDX framework will not be able to obtain the requested data from the MIBs.

Recommended Action Enter one or more of the following CLI commands to obtain the required information: **show processes memory, show processes cpu, show controller optics, show controller fia, show controller xbar** or **show controller sca**.

Error Message `%MDX-1-NOMGDTIMERCNTXT: The expired timer does not have a timer context`

Explanation MDX framework found a managed timer that does not have a context. This condition does not affect system operation.

Recommended Action No action is required.

Error Message %MDX-1-PORTCREATEFAIL: Could not create IPC port for MDX Framework,
FAIL REASON = [chars]

    Explanation An IPC port could not be opened for the MDX framework even after three retry attempts. This condition does not affect system operation.

    Recommended Action No action is required.

Error Message %MDX-1-PORTCREATEFAILRETRY: Could not create IPC port for MDX
framework try number = [dec], FAIL REASON = [chars], Will retry again

    Explanation An IPC port could not be created. The system will attempt to retry the operation a maximum of three times.

    Recommended Action This condition has no effect on system operation. No action is required.

Error Message %MDX-1-PORTREGFAIL: Could not Register IPC port for MDX framework FAIL
REASON = [chars]

    Explanation The IPC port could not be registered with the IPC master, even after three retry attempts. This condition does not affect system operation.

    Recommended Action No action is required.

Error Message %MDX-1-PORTREGFAILRETRY: Could not Register IPC port for MDX framework
try number = [dec], on slot = [dec], FAIL REASON = [chars], Will retry again

    Explanation The IPC port could not be registered with the IPC master. The system will attempt to retry the operation a maximum of three times.

    Recommended Action This condition has no effect on system operation. No action is required.

Error Message %MDX-1-SIZEMISMATCH: Recieved an IPC message with inconsistent size
compared to the MDX TU in its data region

    Explanation The size of the IPC message that was received by the MDX framework is not consistent when it is compared to the MDX TU. This condition does not affect system operation.

    Recommended Action No action is required.

Error Message %MDX-1-UNKNOWNMSGTYPE: The rcvd msg-type is not supported, msg-type
[chars]

    Explanation The message type that was received is not supported by the MDX framework. This condition does not affect system operation.

    Recommended Action No action is required.

MEM_ECC Messages

This section contains messages about single and multiple bit and CPU write parity errors that have been detected by ECC control.

MEM_ECC-2

Error Message `%MEM_ECC-2-MALLOC: Attempt to malloc [dec] bytes for the ECC error log failed. ECC errors will only be reported and not recorded.`

Explanation Memory could not be allocated for the ECC error log. If the system has only 32 MB of memory, an upgrade is recommended.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-2-MBE: Multiple bit error detected at [hex]`

Explanation A multi-bit error that could not be corrected was detected on a CPU that was read from DRAM.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-2-MBE_RMW: Multiple bit error detected at [hex] on a read-modify-write cycle`

Explanation A multi-bit error that could not be corrected was detected during a read-modify-write cycle on a CPU that was read from DRAM for a non-8-byte access.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-2-PARITY: Parity error on CPU write to address: [hex]`

Explanation A data parity error was detected by the ECC Ctrl facility during a CPU write operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-2-PARITY_INFO: Parity error was detected on the following
byte(s) of a double word: [chars] [chars] [chars]`

Explanation This message specifies the bytes of a 64-bit word that contained invalid parity, and
caused the ECC Ctrl facility to generate an interrupt operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
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following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MEM_ECC-3

Error Message `%MEM_ECC-3-BADADDR_MBE: Invalid MBE dram address: [hex] latched by ECC Ctrl`

Explanation The address that was found by the ECC control register while an MBE was being detected is not a valid DRAM address. This condition probably indicates a malfunctioning ECC control register that requires replacement.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-BADADDR_MBE_RMW: Invalid MBE dram address: [hex] latched by ECC Ctrl during a RMW cycle`

Explanation The address that was found by the ECC control register while an MBE was being detected during a read-modify-write cycle is not a valid DRAM address. This condition probably indicates a malfunctioning ECC control register that requires replacement.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-BADADDR_SBE: Invalid SBE dram address: [hex] latched by ECC Ctrl`

Explanation The address that was found by the ECC control register while an SBE was being detected is not a valid DRAM address. This condition probably indicates a malfunctioning ECC control register that requires replacement.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at

http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-BADADDR_SBE_RMW: Invalid SBE dram address: [hex] latched by ECC Ctrl during a RMW cycle`

Explanation The address that was found by the ECC control register while an SBE was being detected during a read-modify-write cycle is not a valid DRAM address. This condition probably indicates a malfunctioning ECC control register that requires replacement.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SBE: Single bit error detected and corrected at [hex]`

Explanation A single-bit correctable error was detected on a read from DRAM.

Recommended Action Enter the **show ecc command** to display the single-bit errors that have been logged. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SBE_HARD: Single bit *hard* error detected at [hex]`

Explanation A single-bit error that could not be corrected (a hard error) was detected on a CPU that was read from DRAM.

Recommended Action Enter the **show ecc** command to display the single-bit errors that have been logged and display the hard error address locations. Monitor the system by periodically entering the **show ecc** command and replace the DRAM if too many errors are encountered.

Error Message `%MEM_ECC-3-SBE_LIMIT: Single bit error detected and corrected at [hex]`

Explanation A single-bit correctable error was detected on a CPU that was read from DRAM.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SBE_RMW: Single bit error detected and corrected at [hex] on a read-modify-write cycle`

Explanation A single-bit correctable error was detected on during a read-modify-write cycle on a CPU read from DRAM for a non-8-byte access.

Recommended Action Enter the **show ecc command** to display the single-bit errors that have been logged. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SBE_RMW_HARD: Single bit *hard* error detected at [hex] on a read-modify-write cycle`

Explanation A single-bit uncorrectable hard error was detected during a read-modify-write cycle on a CPU read from DRAM for a non-8-byte access. The **show ecc** command can be used to dump single-bit errors currently logged.

Recommended Action Enter the **show ecc** command to display the single-bit errors that have been logged and display the hard error address locations. Monitor the system by periodically entering the **show ecc** command and replace the DRAM if too many errors are encountered.

Error Message `%MEM_ECC-3-SBE_RMW_LIMIT: Single bit error detected and corrected at [hex] on a read-modify-write cycle`

Explanation A single-bit correctable error was detected on during a read-modify-write cycle on a CPU read from DRAM for a non eight-byte access.

Recommended Action Enter the **show ecc command** to display the single-bit errors that have been logged. Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SYNDROME_MBE: 8-bit Syndrome for the detected Multi-bit error: [hex]`

Explanation A multi-bit error has been detected for the 8-bit syndrome. This value does not indicate the exact positions of the bits in error, but can be used to approximate their positions.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SYNDROME_SBE: 8-bit Syndrome for the detected Single-bit error: [hex]`

Explanation A single-bit error has been detected for the 8-bit syndrome. This value does not indicate the exact positions of the bits in error, but can be used to approximate their positions.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_ECC-3-SYNDROME_SBE_LIMIT: 8-bit Syndrome for the detected Single-bit error: [hex]`

Explanation A single-bit error has been detected for the 8-bit syndrome. This value does not indicate the exact positions of the bits in error, but can be used to approximate their positions.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MEM_MGR Messages

This section contains memory manager (MEM_MGR) messages.

MEM_MGR-3

Error Message `%MEM_MGR-3-MEM_MGR_EXCEED_MAX: memory pool exceeds maximum (%d bytes) allowed.`

Explanation An attempt was made to allocate a buffer from a memory pool that has reached its maximum limit.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MEM_MGR-3-MEM_MGR_INVALID: The Memory Management code encounters an invalid parameter.`

Explanation The memory manager has received an invalid parameter from its caller.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message   %MEM_MGR-3-MEM_MGR_NOMEM: Out of memory

Explanation   The memory manager is out of memory.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MEMPOOL Messages

This section contains Enhanced Memory pool MIB messages.

Error Message   %MEMPOOL-3-IPC: [chars] [chars]

Explanation   An IPC error has occurred on polling the Enhanced Mempool MIB.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

METOPT Messages

This section contains Cisco Optical Networking Systems (ONS) 15540 Extended Services Platform (ESP) messages.

METOPT-2

Error Message `%METOPT-2-NOPAKBUFFER: No packet buffer available for [chars] interface to send this packet to higher layer`

Explanation An attempt to allocate a packet buffer failed.

Recommended Action Perform one or more of the following actions to remedy the problem:

- Reload the system.
- Perform a CPU switchover if you have a redundant CPU system.

METOPT-6

Error Message `%METOPT-6-DI_ASSERTED: CDL Defect Indication: [chars] Asserted on interface [chars]`

Explanation Some CDL Defect Indication bits were asserted on this interface.

Recommended Action Closely monitor CDL Defect Indication Status if Defect Indication was asserted.

Error Message `%METOPT-6-DI_CLEARED: CDL Defect Indication: [chars] cleared on interface [chars]`

Explanation CDL Defect Indication Status changed.

Recommended Action No action is required.

METOPT_DRV Messages

This section contains Cisco Optical Networking Systems (ONS) 15540 Extended Services Platform (ESP) driver messages.

METOPT_DRV-3

Error Message `%METOPT_DRV-3-REPROGRAM_ERROR: [chars]`

Explanation The Metro Optical Reprogram driver encountered an error. The error message contains text useful to identify the cause of the problem.

Recommended Action Retry the reprogramming of the card. If the reprogramming fails again, remove the card and reinsert it. If the card does not come up, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MFI Messages

This section contains MPLS Forwarding Infrastructure (MFI) messages.

MFI-3

Error Message `%MFI-3-BADREADUPDATESIZE: Read update reply message from RP has bad size: [dec]`

Explanation A read update message does not match the parsed result of the read message.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MFI-3-EVTLOGCAPTURE: Event Logger Capture Error [dec] [dec]

Explanation   A failure occurred during an event logger capture operation.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MFI-3-EVTLOGCLIENT: Invalid client [dec]

Explanation   An invalid client has accessed the event logger.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MFI-3-EVTLOGCONTROL: [chars]: [dec]

Explanation   A general event logger controller error has occurred.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-EVTLOGREGISTER: Event Logger Registration Error [dec] [dec] [dec]`

Explanation A failure occurred during an event logger client registration operation.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-LCPULSE: LC pulse failed: [chars] [dec]`

Explanation A line card pulse request operation has failed.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-MFICOMM: [chars]`

Explanation An error involving the communications module has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-MFICOMM2: [chars]: [hex] [hex]`

Explanation An error involving the communications module has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-MFICOMM3: [chars]: [hex] [hex] [hex]`

Explanation An error involving the communications module has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-MPLS_MTU_SET: [chars] [dec] [chars] [chars] [chars] [dec][chars]`

Explanation Most drivers will be able to support baby giants and will gracefully drop packets that are too large. Certain drivers will have packet forwarding problems including data corruption.

Recommended Action Increase the interface MTU on all routers connected to this interface to the needed MTU size by entering the **mtu** *bytes* command.

Error Message `%MFI-3-NOCLIENTREQ: [chars] [chars]: [dec] [dec] [dec]`

Explanation The client reply component could not find an outstanding request.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-PNDMSGMGR: [chars] [chars] [dec] [dec] [dec]`

Explanation Only one outstanding request is allowed from a process.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-REDISTMGR: Redistribution Manager: [chars] [hex]`

Explanation An error involving the redistribution manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-REDISTMGR2: Redistribution Manager: [chars] [hex] [hex]`

Explanation An error involving the redistribution manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-REDISTMGR3: Redistribution Manager: [chars] [hex]`

Explanation An error involving the redistribution manager has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFI-3-REPLYMSGSIZE: Reply message is too large: [chars]: [dec]`

Explanation A read update message is too large to fit into the XDR buffer.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MFI-4

Error Message `%MFI-4-MFICOMM4: [chars]: [hex] [hex]`

Explanation An error involving the communications module has occurred.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MFIB Messages

This section contains Multicast Forwarding Information Base (MFIB) messages.

MFIB-3

Error Message `%MFIB-3-NETWORK_GET_FAIL: MFIB can not get network offset: datagram [hex]; network [hex]`

Explanation The MFIB failed to find a suitable packet network offset.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB-3-NETWORK_SET_FAIL: MFIB can not set network offset: datagram [hex]; length [dec]; offset [dec]`

Explanation The MFIB failed to set the offset within a packet.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB-3-NO_SBCTRLFUNC: A[chars] function is required for the MFIB sub-block, but none was provided`

Explanation The MFIB could not distribute interface information to a line card due to an internal error.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,

open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB-3-SWITCHOVER_FAIL: Error creating [chars]. MFIB will not work
with switchover`

Explanation Sufficient memory is not available to create structures needed to enable switchover for
IPv6 multicast.

Recommended Action Reduce other system activity to ease memory demands. If conditions warrant,
upgrade to a larger memory configuration.

MFIB_CONST_LC Messages

This section contains MFIB Constellation platform messages.

Error Message `%MFIB_CONST_LC-6-ADJ_V6MCAST_ALLOC_FAILURE: Failed to allocate
Adjacency for IPv6 multicast entry (S[ipv6_addr], G[ipv6_addr])`

Explanation The system was unable to allocate an adjacency for this particular flow. The affected
flow will be retried and will be software switched until it is successfully installed in the hardware.

Recommended Action The adjacency table utilization could be very high and need to be brought
down. Removing some hardware switched flows would help solve the problem

Error Message `%MFIB_CONST_LC-6-FIB_V6MCAST_INSTALL_FAILURE: Failed to install FIB
IPv6 multicast entry (S[ipv6_addr], G[ipv6_addr])`

Explanation The FIB entry limit has been exceeded so FIB entries cannot be allocated by the
MFIB_CONST_LC.

Recommended Action The FIB table utilization is too high and needs to be reduced. The total number
of multicast shortcuts is too large to fit in the FIB table. As a result, subsequent shortcuts will be
software switched. Reducing the FIB utilization by other protocols would help solve the problem.

Error Message `%MFIB_CONST_LC-6-MET_V6MCAST_ALLOC_FAILURE: Failed to allocate MET
entries for IPv6 multicast entry (S[ipv6_addr], G[ipv6_addr])`

Explanation The system is unable to allocate MET entries for this particular flow. The affected flow
will be retried and will be software switched until it is successfully installed in the hardware.

Recommended Action The MET utilization could be very high and must be reduced. Removing some
hardware switched flows would help solve the problem

Error Message `%MFIB_CONST_LC-6-NF_V6MCAST_INSTALL_FAILURE: Failed to install Netflow IPv6 multicast entry (S[ipv6_addr], G[ipv6_addr])`

Explanation A multicast entry could not be installed due to a NetFlow full condition or a Hash collision.

Recommended Action The NetFlow table utilization is too high and needs to be reduced. The total number of multicast shortcuts are too large to fit in the NetFlow table. As a result, these shortcuts will be software switched. Removing dynamically created NetFlow IPv6 entries or disabling dynamic NetFlow entry creation would help solve the problem.

Error Message `%MFIB_CONST_LC-6-SW_V6MCAST_INSTALL_FAILURE: Failed to install IPv6 multicast entry, due to [chars] (S[ipv6_addr], G[ipv6_addr], C:[dec])`

Explanation The system is unable to install an IPv6 multicast entry due to unrecoverable software failures.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MFIB_CONST_RP Messages

This section contains MFIB Constellation information messages.

Error Message `%MFIB_CONST_RP-6-REPLICATION_MODE_CHANGE: Replication Mode Change Detected. Current system replication mode is [chars]`

Explanation When automatic detection of the replication mode is enabled, the system will transition to ingress mode when an egress-incapable line card is inserted. The system will transition back to egress mode when the last egress-incapable line card is removed. The transition between ingress and egress modes will cause temporary loss of traffic.

Recommended Action To prevent traffic loss, enter the **ipv6 mfib hardware-switching replication-mode ingress** command.

MFIB_STATS Messages

This section contains MFIB statistics messages.

Error Message `%MFIB_STATS-2-MFIB_STATS_LC_FAILED_GET_COUNTERS: Linecard failed in getting counters due to null table. af = [int], v6 def tbl [hex], v4 def tbl [hex]`

Explanation The line card has failed to get entry counters due to a null table.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_LC_FAILED_GET_IPC_MSG: Linecard failed allocating ipc message buffer`

Explanation The line card failed to allocate a buffer for sending statistics.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_LC_FAILED_SEND_MSG: Linecard failed in sending msg to the Route Processor error = [chars]`

Explanation The line card has failed to send a statistics message to the route processor.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_LC_MSG_TOO_BIG: Linecard failed to return counters, message buffer too small.`

Explanation The line card has failed to return counters because the minimum message size exceeds the maximum IPC buffer size.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_RP_FAILED_GET_IPC_MSG: RP failed allocating ipc message buffer for linecard, slot = [dec]`

Explanation The route processor failed to allocate a buffer for getting line card statistics.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_RP_FAILED_REPLY_MSG: RP received reply with error status from linecard, slot = [dec]`

Explanation The route processor has received a reply with error in statistics message from a line card.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MFIB_STATS-2-MFIB_STATS_RP_SEQ_ERROR: The RP ignored out of sequence per-interface statistics returned by the linecard in slot [dec].`

Explanation A line card returned per-interface statistics in the wrong order and the RP has ignored them.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MISA Messages

This section contains Multiple Crypto Engine subsystem messages.

Error Message `%MISA-1-ERROR: [chars]`

Explanation An error occurred in the application using ISA.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information that you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MISA-6-INFO: [chars]`

Explanation This is an informational message from ISA.

Recommended Action This is an informational message only and occurs in normal operation. No action is required.

MISTRAL Messages

This section contains Mistral ASIC (MISTRAL) messages.

MISTRAL-3

Error Message `%MISTRAL-3-BAD_PAK: Possibly un-encapsulated packet passed to Mistral:`
`int [chars] type [int] stat [hex] flags [hex] size [dec] encsize [dec] offset [dec]`
`requeue_token [int] r1 [int] r2 [int] total detected [int]`

Explanation A badly encapsulated packet from the process level was passed to the Mistral ASIC.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MISTRAL-3-NOEOBCBUF: No EOBC buffer available. Dropping the packet.`

Explanation The Ethernet out-of-band channel pool of receive buffers for the Mistral ASIC has been exhausted. No additional input packets can be handled until some buffers are returned to the pool.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLD_PROT Messages

This section contains Multicast Listener Discovery (MLD) protocol messages.

Error Message `%MLD_PROT-6-IDB_ENABLE: Interface [chars] does not support multicast, not enabled`

Explanation   IGMP/MLD is not enabled on the specified interface that does not support multicast.

Recommended Action   This is an informational message only. No action is required.

MLI Messages

This section contains Memory Layout Information (MLI) messages.

MLI-3

Error Message `%MLI-3-NOT_ENOUGH_SPACE: There is not enough space in Memory Layout Information area to store the tuple`

Explanation   Insufficient memory is reserved in the Memory Layout Information (MLI) area to store the given MLI tuple data.

Recommended Action   Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging**, **show tech-support,** and **show mli** commands and your pertinent troubleshooting logs.

MLS_ACL_COMMON Messages

This section contains Multilayer Switching ACL (MLS_ACL_COMMON) messages.

MLS_ACL_COMMON-3

Error Message `%MLS_ACL_COMMON-3-MLS_ACL_CONSIST_FIX: ACL TCAM inconsistency seen at index [dec] and could not be fixed`

Explanation The ACL TCAM inconsistency checker found an inconsistency between software and hardware TCAM entries and could not fix it. [dec] is the index where the inconsistency was found.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLS_ACL_COMMON-4

Error Message `%MLS_ACL_COMMON-4-LOG_UPDATE_NO_RL: ACL TCAM update ([chars] direction) occured on interface [chars]; [chars] action taken [chars] msec`

Explanation An update of the ACL TCAM occurred on the specified interface. When the ACL TCAM is updated, the specified security action is taken for the specified time interval.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLS_ACL_COMMON-4-LOG_UPDATE_RL: ACL TCAM update ([chars] direction)`
`occured on interface [chars]; [chars] action taken [chars] msec`

Explanation An update of the ACL TCAM occurred on the specified interface. When the ACL TCAM is updated, the specified security action is taken for the specified time interval.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLS_ACL_COMMON-4-MLS_ACL_CONSIST: ACL TCAM inconsistency seen at`
`index [dec]`

Explanation The ACL TCAM inconsistency checker found an inconsistency between software and hardware TCAM entries and has fixed it. [dec] is the index where the inconsistency was found.

Recommended Action If this message recurs, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLSCEF Messages

This section contains Multilayer Switching Cisco Express Forwarding (MLSCEF) messages.

MLSCEF-2

Error Message `%MLSCEF-2-EXCESSIVE_FIB_CORR_SSRAM_ERRORS: Too many fib correctable`
`ecc error interrupts.`

Explanation The number of correctable error interrupts has exceeded the threshold of 1000 correctable ECC errors in 30 minutes. All errors were corrected.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging**, **show tech-support, show mls cef hardware**, **show mls cef log,** and **show ver** commands
and your pertinent troubleshooting logs.

Error Message %MLSCEF-2-EXCESSIVE_FIB_SSRAM_ERRORS: Too many fib ecc error
interrupts.

Explanation The number of error interruptions exceeded the threshold. As a result of this condition,
the system will fail.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MLSCEF-2-FIB_SSRAM_WRITE_INCONSISTENCY: FIB SSRAM Mismatch for Index:
[dec] Expected: [hex], Hardware: [hex]

Explanation A problem occurred when the system attempted to write the FIB SSRAM.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message %MLSCEF-2-FIB_TCAM_WRITE_INCONSISTENCY: FIB TCAM Mismatch for [chars]:
Index: [dec] Exprected:Entry: [hex]-[hex]-[hex] Hardware: Entry:
[hex]-[hex]-[hex]

Explanation A problem occurred when the system attempted to write the FIB TCAM.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying

information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLSCEF-2-RELOAD: maximum routes config mismatch. Reloading with
correct config`

Explanation The system detected a mismatch between the user configuration route allocation and the
current route allocation. A system reload is required to correct this condition.

Recommended Action If the message does not appear continuously and the **mls cef maximum-routes**
command has been entered, no action is required. If this message appears continuously on the same
module and the **mls cef maximum-routes** command has not been entered, copy the message exactly
as it appears on the console or in the system log. Research and attempt to resolve the issue using the
tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and
utilities will supply clarifying information. Search for resolved software issues using the Bug
Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require
assistance, open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLSCEF-2-SANITY_FAIL: Sanity Check of MLS FIB s/w structures failed`

Explanation The verification process encountered inconsistent MLS FIB data structures.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at
http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance,
open a case with the Technical Assistance Center via the Internet at
http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support
representative and provide the representative with the information you have gathered. Attach the
following information to your case in nonzipped, plain-text (.txt) format: the output of the **show
logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLSCEF-2-UNCORRECTABLE_SSRAM_ERROR: Bank [dec] Index: [dec],
Expected: [hex], Hardware: [hex]. Affected TCAM [hex]-[hex]-[hex]`

Explanation A faulty FIB SSRAM location was detected.

Recommended Action Copy the message exactly as it appears on the console or in the system log.
Research and attempt to resolve the issue using the tools and utilities provided at
http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying
information. Search for resolved software issues using the Bug Toolkit at

http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLSCEF-4

Error Message `%MLSCEF-4-FIB_EXCEPTION_THRESHOLD: Hardware CEF entry usage is at 95% capacity for [chars] protocol.`

Explanation The number of route entries that are installed is about to reach the hardware FIB capacity, or the maximum routes limit set for the specified protocol. If the limit is reached, some prefixes will be software switched.

Recommended Action Enter the **mls cef maximum-routes [protocol]** global configuration command to increase the maximum number of routes for the protocol. Refer to the configuration manuals for the differing capacity limitations of XL versus non-XL systems, as well as for impacts to other protocols when changing maximum routes of one protocol. Enter the **show mls cef summary** command to see the current usage summary.

Error Message `%MLSCEF-4-INCORRECT_CONFIG: A max-routes configuration mismatch or an invalid max-routes configuration has been detected. Reverting to default configuration.`

Explanation The system has detected a configuration mismatch or an invalid configuration for the **mls cef maximum-routes** command, and is reverting to the system default configuration.

Recommended Action Reconfigure your maximum routes using the **mls cef maximum-routes** command. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLSCEF-7

Error Message `%MLSCEF-7-FIB_MASK_MISMATCH: Attempt to delete an entry not matching block mask - class = [dec], [dec]/[dec], mask [dec]/[dec]`

Explanation The passed mask does not match the stored block mask.

Recommended Action This is a debug message only. No action is required.

MLS_CEF_ISSU Messages

This section contains Multilayer Switching Cisco Express Forwarding (MLSCEF) in-service software upgrade (ISSU) messages.

MLS_CEF_ISSU-2

Error Message `%MLS_CEF_ISSU-2-MLS_CEF_RETRY_FAIL: Unable to get maximum routes config from Active RP.`

Explanation The ISSU process was unable to get the maximum route configuration from the active RP. The system will configure to default values.

Recommended Action Reload the system. If the problem persists, copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLSM Messages

This section contains Multicast Distributed Shortcut Switching (MDSS)/multilayer switching for multicast (MLSM) messages.

MLSM-4

Error Message %MLSM-4-CC_ERROR: (Type of CC: [chars]): [chars] ([IP_address],[IP_address]), Auto-repair is [chars]

Explanation Either the RP-SP or MROUTE-MLSM consistency checker has detected an error.

Recommended Action If enabled, the autorepair feature will automatically correct the error.

Error Message %MLSM-4-MLSM_LTL_FULL_VDB_CREATE_FAILED: Multi-Layer Switching for Multicast: Disabling Multicast Hardware Switching for VLAN ([dec]), VLAN not found on Switch Processor

Explanation The switch processor is unable to create VLANs due to a Layer 2 hardware limitation. Because no VLAN information is available, the switch processor is unable to install shortcuts. Multicast hardware switching for this VLAN interface will be disabled to avoid installation of shortcuts. All flows using this VLAN as the outgoing interface will be affected.

Recommended Action Modify the network configuration to increase the hardware resources for creating VLANs on the switch processor.

MLSM-6

Error Message %MLSM-6-BIDIR_SC_INSTALL_FAILURE: Bi-dir multicast flows will not be installed in hardware in the presence of tunnel interfaces for RP [IP_address]

Explanation Bidirectional multicast flows will not be installed in hardware in the presence of tunnel interfaces. The bidirectional flows will be software-switched until the tunnel interfaces are unconfigured.

Recommended Action Unconfiguring the tunnel interfaces will allow the bidirectional flows to be hardware-switched.

Error Message %MLSM-6-MLSM_PMS: MMLS: MLSM is suspending the caller process [chars]

Explanation MLSM is suspending the caller process. This message appears when the MLSM routines are called from the PIM/Mwheel context and MLSM routines suspend a process. When MLSM suspends the caller process, data corruption might occur for the data that is handled by the caller process.

Recommended Action This message is informational. No action is required.

Error Message `%MLSM-6-MMLS_EGRESS_INFO: MMLS: Please make sure no multicast traffic is going through egress incapable line cards when system is operating in egress mode`

Explanation There should be no multicast traffic going through egress-incapable line cards while the system is operating in egress replication mode.

Recommended Action Determine if there are any egress-incapable line cards in the system. If there are egress-incapable line cards, verify that there is no multicast traffic going through them.

Error Message `%MLSM-6-MMLS_LEGACY_INSERTED: MMLS: Legacy Linecard Inserted, Egress Replication Mode will be disabled`

Explanation Egress replication is not supported with legacy modules. The system will transition to ingress mode and will cause a temporary loss of traffic.

Recommended Action If the system is required to operate in egress replication mode, remove the legacy module.

Error Message `%MLSM-6-MMLS_MDT_TUNNEL_UP: MMLS: MDT tunnel is up, Egress Replication Mode will be disabled`

Explanation Egress replication is not supported when MDT is configured and an MDT tunnel is up. The system will transition to ingress mode if required, and the transition will cause a temporary loss of traffic.

Recommended Action This message is informational. No action is required.

Error Message `%MLSM-6-MMLS_MODE_CHANGE: MMLS: Replication Mode Change Detected`

Explanation When automatic detection of the replication mode is enabled, the system will transition to ingress mode when an egress-incapable module is inserted. The system will transition back to egress mode when the last egress-incapable module is removed.

Recommended Action Transitioning between ingress and egress mode causes a temporary loss of traffic. To prevent this temporary loss of traffic, enter the **mls ip replication-mode ingress** command.

Error Message `%MLSM-6-MMLS_NO_EGRESS_LOCAL_IN_INGRESS: MMLS: Egress Local feature is NOT applicable in Ingress mode`

Explanation When the system transitions from egress replication mode to ingress mode, the egress local feature will not be applied, even if the egress local feature is enabled.

Recommended Action If the egress local feature is required, restore the system replication mode to egress.

MLS_RATE Messages

This section contains Multilayer Switching Rate Limit (MLS_RATE) messages.

MLS_RATE-4

Error Message `%MLS_RATE-4-CPP_DISABLED_IN_HW: Control Plane Policing NOT performed in hardware, due to the presence of egress QoS.`

Explanation CPP cannot be performed in the hardware when the system is running in PFC3A mode and egress QoS is configured on any other interface. Under these circumstances, CPP is performed only in the software until egress QoS is removed from the running configuration.

Recommended Action Remove any egress QoS from the running configuration, or upgrade to a PFC3B or PFC3-BXL. We strongly recommend the upgrade.

Error Message `%MLS_RATE-4-CPP_RE_ENABLED_IN_HW: Control Plane Policing will now be performed in hardware.`

Explanation CPP cannot be performed in the hardware when the system is running in PFC3A mode and egress QoS is configured on any other interface. Egress QoS has been removed from the running configuration.

Recommended Action Because egress QoS has been removed, no action is required. To prevent this condition from occurring again, we strongly recommend that you upgrade to a PFC3B or PFC3BXL.

Error Message `%MLS_RATE-4-DISABLING: The Layer2 Rate Limiters have been disabled.`

Explanation The Layer 2 rate limiters are turned off with the current hardware configuration because they are not supported with this combination of modules.

Recommended Action Refer to the feature usage guidelines for more details.

Error Message `%MLS_RATE-4-LIMITING_DOWN: MLS HARDWARE RATE-LIMITING functionality is not active`

Explanation Memory resources are insufficient to support the rate-limiting functionality.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

Error Message `%MLS_RATE-4-NO_DHCP_RESOURCE: DHCP Snooping requires 2 Rate Limiters`

Explanation There are not enough hardware rate limiters to enable DHCP snooping.

Recommended Action DHCP snooping requires two hardware rate limiters. All may be used. To display the features that use these hardware rate limiters, enter the **show mls rate-limit usage** command. Unconfigure enough rate limiters to configure DHCP snooping.

Error Message `%MLS_RATE-4-NO_RESOURCE: The hardware Rate Limiters are fully used`

Explanation There are no more hardware rate limiters available.

Recommended Action EARL supports a limited number of hardware rate limiters. All may be used. To display the features that use these hardware rate limiters, enter the **show mls rate-limit usage** command. To program a rate limiter for the new feature, unconfigure one of the configured rate limiters.

Error Message `%MLS_RATE-4-NOT_SUPPORTED: This functionality is not configurable.`

Explanation The rate limit functionality is not active with the current hardware configuration.

Recommended Action Refer to the feature usage guidelines for more details.

Error Message `%MLS_RATE-4-OVERWRITING_PORTSEC_DEFAULT: Port security rate limiter was set to non-default value.`

Explanation Overwriting the default port security rate value.

Recommended Action Copy the error message exactly as it appears on the console or in the system log. Research and attempt to resolve the error using the Output Interpreter https://www.cisco.com/cgi-bin/Support/OutputInterpreter/home.pl. Issue the **show tech-support** command to gather data that may help identify the nature of the error. Also perform a search of the Bug Toolkit http://www.cisco.com/cgi-bin/Support/Bugtool/home.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet http://tools.cisco.com/ServiceRequestTool/create/launch.do, or contact your Cisco technical support.

Error Message `%MLS_RATE-4-OVERWRITING_VALUE: Overwriting the rate value for: [chars] case`

Explanation Some rate limiters share the same hardware register. This message appears if programming a new rate limiter causes a previously configured one to be overwritten.

Recommended Action Copy the message exactly as it appears on the console or in the system log. Research and attempt to resolve the issue using the tools and utilities provided at http://www.cisco.com/tac. With some messages, these tools and utilities will supply clarifying information. Search for resolved software issues using the Bug Toolkit at http://www.cisco.com/cgi-bin/Support/Bugtool/launch_bugtool.pl. If you still require assistance, open a case with the Technical Assistance Center via the Internet at http://tools.cisco.com/ServiceRequestTool/create, or contact your Cisco technical support

representative and provide the representative with the information you have gathered. Attach the following information to your case in nonzipped, plain-text (.txt) format: the output of the **show logging** and **show tech-support** commands and your pertinent troubleshooting logs.

MLS_STAT Messages

This section contains Multilayer Switching Statistics (MLS_STAT) messages.

MLS_STAT-4

Error Message %MLS_STAT-4-IP_CSUM_ERR: IP checksum errors

Explanation Packets with IP checksum errors have been received.

Recommended Action No action is necessary. This message is for informational purposes only.

Error Message %MLS_STAT-4-IP_LEN_ERR: MAC/IP length inconsistencies

Explanation Packets with an IP length that does not match their physical length have been received.

Recommended Action No action is necessary. This message is for informational purposes only.

Error Message %MLS_STAT-4-IP_TOO_SHRT: Too short IP packets received

Explanation Packets with IP minimum length check errors have been received.

Recommended Action No action is necessary. This message is for informational purposes only.

Error Message %MLS_STAT-4-IPX_LEN_ERR: MAC/IPX length inconsistencies

Explanation Packets with an IPX length that does not match their physical length have been received.

Recommended Action No action is necessary. This message is for informational purposes only.

Error Message %MLS_STAT-4-IPX_TOO_SHRT: Too short IPX packets received

Explanation Packets with IPX minimum length check errors have been received.

Recommended Action No action is necessary. This message is for informational purposes only.