

# APPENDIX

## **MIB** Reference

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#### **General MIBs**

The Cisco Mobile Wireless Transport Manager (MWTM) queries these general Management Information Bases (MIBs), listed in alphabetical order:

MIB	Description
CISCO-AAA-SERVER-MIB.my	Provides configuration and statistics reflecting the state of authentication, authorization, and accounting (AAA) server operation within the node and AAA communications with external servers.
CISCO-BITS-CLOCK-MIB.my	Provides information on Building Integrated Timing Supply (BITS) clocking sources and operation modes. The MWTM can generate notifications to indicate when clocking sources change roles or become unavailable.
CISCO-CONFIG-MAN-MIB.my	Provides configuration management, primarily by tracking changes and saving the running configuration. This MIB represents a model of configuration data that exists in various locations:
	• running—In use by the running system
	• terminal—Logical or attached hardware
	local—Saved locally in NVRAM or flash
	• remote—Saved to a server on the network
CISCO-ENTITY-FRU-CONTROL CAPABILITY.my	Provides additional capabilities for various platforms that are needed by the CISCO-ENTITY-FRU-CONTROL-MIB.
CISCO-ENTITY-FRU-CONTROL -MIB.my	Monitors and configures the operational status of Field Replaceable Units (FRUs) of the system listed in the Entity-MIB (RFC 2037) entPhysicalTable. FRUs include assemblies such as power supplies, fans, processor modules, interface modules, and so forth.

MIB	Description
CISCO-ENVMON-MIB.my	Provides environmental monitoring information on Cisco ITPs.
CISCO-EPM-NOTIFICATION- MIB.my	Defines the trap structure that carries the identity and status information of the managed object. The MWTM can send internal events as traps defined in this MIB to third-party network management system (NMS) applications for further processing.
CISCO-FLASH-MIB.my	Provides management of Cisco Flash Devices.
CISCO-HSRP-EXT-MIB.my	Provides an extension to the CISCO-HSRP-MIB which defines Cisco's proprietary Hot Standby Routing Protocol (HSRP). The extensions cover assigning of secondary HSRP IP addresses and modifying an HSRP group's priority by tracking the operational status of interfaces.
CISCO-HSRP-MIB.my	Provides a means to monitor and configure the Cisco IOS proprietary Hot Standby Router Protocol (HSRP). Cisco HSRP protocol is defined in RFC2281.
CISCO-PROCESS-MIB.my	Shows memory and CPU utilization on Cisco nodes. CPU utilization gives a general idea of how busy the processor is. The numbers are a ratio of the current idle time divided by the longest idle time.
CISCO-RF-MIB.my	Provides configuration control and status for the Redundancy Framework (RF) subsystem. RF provides a mechanism for logical redundancy of software functionality and is designed to support 1-to-1 redundancy on processor cards. Redundancy is concerned with the duplication of data elements and software functions to provide an alternative in case of failure.
CISCO-SMI.my	Defines the Structure of Management Information for the Cisco enterprise.
CISCO-SYSLOG-MIB.my	Provides a means of gathering syslog messages generated by the Cisco IOS. The MWTM can send internal events as traps defined in this MIB to third-party NMS applications for further processing.
CISCO-TC.my	Defines textual conventions used throughout Cisco enterprise MIBs.
ENTITY-MIB.my	Module that represents multiple logical entities supported by a single SNMP agent. This MIB is based on RFC 2737. For more information on entity MIBs, see RFC 2037 section 3.
IANAifType-MIB.my	Defines the IANAifType Textual Convention, and thus the enumerated values of the ifType object defined in MIB-II's ifTable.
IF-MIB.my	Describes generic objects for network interface sublayers. This MIB is an updated version of MIB-II's ifTable, and incorporates the extensions defined in RFC 1229.
IMA-MIB.my	Module that manages ATM Forum Inverse Multiplexing for ATM (IMA) interfaces.
INET-ADDRESS-MIB.my	Defines textual conventions for representing Internet addresses. An Internet address can be an IPv4 address, an IPv6 address, or a DNS domain name. This module also defines textual conventions for Internet port numbers, autonomous system numbers, and the length of an Internet address prefix.

MIB	Description
PerfHist-TC-MIB.my	Provides Textual Conventions to be used by systems supporting 15 minute-based performance history counts.
RFC1213-MIB.my	Provides basic management information on the ITP (RFC 1213).
RMON-MIB.my	Remote network monitoring devices, often called monitors or probes, are instruments that exist for the purpose of managing a network. This MIB defines objects for managing remote network monitoring devices.
OLD-CISCO-INTERFACES-MIB. my	Defines interfaces for the Cisco enterprise.
SNMP-FRAMEWORK-MIB.my	Defines the SNMP Management Architecture.
SNMP-TARGET-MIB.my	Defines the MIB objects that provide mechanisms to remotely configure the parameters used by an SNMP entity for the generation of SNMP messages.
SNMPv2-CONF.my	Defines SNMPv2 conformance.
SNMPv2-MIB.my	Defines SNMPv2 entities.
SNMPv2-SMI.my	Defines the Structure of Management Information for SNMPv2.
SNMPv2-TC.my	Defines textual conventions for SNMPv2.

## **ITP Specific MIBs**

MWTM queries these ITP specific MIBs, listed in alphabetical order:

MIB	Description
CISCO-IETF-SCTP-EXT-MIB.my	Extension to CISCO-IETF-SCTP-MIB.my that provides additional information to manage SCTP (RFC 2960).
CISCO-IETF-SCTP-MIB.my	The MIB module for managing SCTP protocol (RFC 2960).
CISCO-ITP-ACL-MIB.my	Manages access lists that control messages sent over SS7 networks using ITP.
CISCO-ITP-ACT-MIB.my	Provides information specified in ITU Q752 Monitoring and Measurements for SS7 networks. This information is used to manage messages sent over SS7 networks using ITP. This MIB has been deprecated and replaced by the CISCO-ITP-GACT-MIB.
CISCO-ITP-GACT-MIB.my	Provides information specified in ITU Q752 Monitoring and Measurements for SS7 networks. This information is used to manage messages sent over SS7 networks using ITP. This MIB replaces the CISCO-ITP-ACT-MIB and supports multiple instances of a signaling point within the same configuration.
CISCO-ITP-GRT-MIB.my	Manages information required to route messages sent over SS7 networks using ITP. This MIB replaces the CISCO-ITP-RT-MIB and supports multiple instances of a signaling point within the same configuration.

МІВ	Description
CISCO-ITP-GSCCP-MIB.my	Provides information specified in ITU Q752 Monitoring and Measurements for SS7 networks. This information is used to manage Signaling Connection Control Part (SCCP) messages sent over SS7 networks using ITP. This MIB replaces the CISCO-ITP-SCCP-MIB and supports multiple instances of a signaling point within the same configuration.
CISCO-ITP-GSP-MIB.my	Manages signaling points and associated messages sent over SS7 networks using ITP. This MIB replaces the CISCO-ITP-SP-MIB and supports multiple instances of a signaling point within the same configuration.
CISCO-ITP-GSP2-MIB.my	Provides information specified in ITU Q752 Monitoring and Measurements for SS7 networks. This information is used to manage messages sent over SS7 networks using ITP. This MIB replaces the CISCO-ITP-SP2-MIB and supports multiple instances of a signaling point within the same configuration.
CISCO-ITP-MLR-MIB.my	Provides information about Multi-Layer Routing (MLR). This information is used to control and measure SS7 message signaling units (MSUs) in an SS7 network.
CISCO-ITP-MONITOR-MIB.my	Provides information about monitoring SS7 links. This information is used to manage the state of software used to collect all packets transported and received over an SS7 link.
CISCO-ITP-MSU-RATES-MIB. my	Provides information used to manage the number of MTP3 MSUs transmitted and received per processor. Many of the higher level protocols require several MSUs per transaction. Traffic capacity planning is based on MSUs, not transactions. This MIB provides information to determine current traffic.
CISCO-ITP-RT-MIB.my	Manages the route tables used to control messages sent over SS7 networks using ITP. This MIB has been deprecated and replaced by the CISCO-ITP-GRT-MIB.
CISCO-ITP-SCCP-MIB.my	Manages SCCP messages sent over SS7 networks using ITP, and provides information specified in ITU Q752 Monitoring and Measurements for SS7 networks. This MIB has been deprecated and replaced by the CISCO-ITP-GSCCP-MIB.
CISCO-ITP-SP-MIB.my	Manages signaling points and associated linksets and links in SS7 networks using ITP.
CISCO-ITP-SP2-MIB.my	Provides Quality of Service (QoS) information related to the configuration of an SS7 network. Also provides MTP3 event history information. This MIB has been deprecated and replaced by the CISCO-ITP-GSP2-MIB.
CISCO-ITP-TC-MIB.my	Defines textual conventions used to manage nodes related to the SS7 network. The ITU documents that describe this technology are the ITU Q series, including:
	• ITU Q.700: Introduction to CCITT SS7
	• ITU Q.701: Functional description of the message transfer part (MTP) of SS7.

MIB	Description
CISCO-ITP-XUA-MIB.my	Manages MTP3 User Adaptation (M3UA) and SCCP User Adaptation (SUA) for ITP.
OLD-CISCO-SYS-MIB.my	Provides a means of gathering basic information for an ITP node.

## **RAN-O Specific MIBs**

MWTM queries these RAN-O specific MIBs, listed in alphabetical order:

MIB	Description
CERENT-454-MIB.mib	Defines the alarms and events for the Cisco ONS 15454. The MWTM processes each ONS event by creating an MWTM event with a severity that maps to the severity of the ONS event.
CERENT-ENVMON-MIB.mib	Provides environmental status information.
CERENT-FC-MIB.mib	Defines the managed objects for performance monitoring of supported Fibre Channel interfaces.
CERENT-GLOBAL-REGISTRY. mib	Provides the global registrations for all other CERENT MIB modules.
CERENT-MSDWDM-MIB.mib	Defines the managed objects for physical layer related interface configurations and objects for the protocol specific error counters for dense wavelength division multiplexing (DWDM) optical switches.
CERENT-OPTICAL-MONITOR- MIB.mib	Defines objects to monitor optical characteristics and set corresponding thresholds on the optical interfaces in a network element.
CERENT-TC.mib	Provides the global Textual Conventions for all other CERENT MIB modules.
CISCO-IP-RAN-BACKHAUL- MIB.my	Provides information on the optimization of IP-RAN traffic between the cell site and the aggregation node site. It handles both GSM Abis and UMTS Iub traffic.

You can obtain the latest versions of these MIBs from one of these locations:

- The Zip file *mibs.zip*, located at the top of the MWTM DVD Image, contains these MIBs.
- You can download these MIBs from the Cisco website:

http://www.cisco.com/public/sw-center/netmgmt/cmtk/mibs.shtml

