

# Tenor<sup>®</sup> SNMP Implementation

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## What is SNMP?

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Simple Network Management Protocol (SNMP) is a standard protocol used to exchange network management information. It is part of the Transmission Control Protocol/Internet Protocol (TCP/IP) protocol suite. SNMP provides a tool for network administrators to manage network performance, find and solve network problems, and plan for network growth.

SNMP management requires two primary elements: a network manager and an SNMP agent.

- A network manager is the software running on a workstation through which the network administrator monitors and controls the different hardware and software systems that comprise a network.
- The agent is software running on network equipment that implements the SNMP protocol. SNMP defines exactly how a network manager communicates with an SNMP agent. For example, SNMP defines the format of requests that a network manager sends to an agent and the format of replies the agent returns.

Through an SNMP management system, the network manager can communicate and manage several different network devices at the same time. The network manager polls the SNMP agents (such as routers, hubs or network servers) for certain requested information. The agent then gathers information about the machine it is running on and carries out requests from the network manager to read and change the information.

The Quintum MIB (Management Information Base) contains objects that define the status and operation of a Tenor, and is posted on the Quintum website. To use SNMP with a Tenor, you must have Tenor code version P102-10-00 or later.

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## SNMP Configuration

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There are two configuration methods possible for the Tenor: Command Line Interface and the *Tenor Configuration Manager* software.

### Using the Command Line Interface (CLI)

#### Setting Trap Addresses

The following procedure describes the commands that configure the IP address(es) of the network management site(s) where the Tenor should send SNMP traps.

1. Connect to the Tenor by your preferred Telnet application.
2. At the MasterChassis prompt, type the following command:

```
config-MasterChassis-1# snmptrapip1 <ip>
```

The number 1 that follows the command `snmptrapip` is an index number; you may identify up to 3 index numbers to designate the network manager to be used.

For example, type **set snmptrapip1 208.226.140.12**. This will assign an index of 1 to indicate the first network manager being assigned to that Tenor unit, and assign the IP address 208.226.140.12 as the network manager. To assign the second `snmptrap ip`, type **set snmptrapip2 <ip>**, and for the third, type **set snmptrapip3 <ip>**.

3. Type **submit**. The trap IP address(es) are submitted to the applicable Tenor unit.

#### Setting SNMP Public Community String

To ensure security, the SNMP agent in the 2G Tenor validates each request received from an SNMP manager before responding to the request. It does this by verifying that the manager belongs to an SNMP community with access privileges to the agent. All SNMP message exchanges consist of a community name and a data field, which contains instructions for the device.

The following procedure describes the command for setting the SNMP Public Community String.

1. Connect to the Tenor by your preferred Telnet application.
2. At the MasterChassis prompt, type the following command:

```
config-MasterChassis-1# set snmppubliccommunity CMS1812
```

3. Type **submit**. The string that will grant public access to this Tenor is set to CMS1812.

#### Setting SNMP Descriptive Information

You can enter system identification information to be used by the SNMP manager to distinguish your Tenor. You may add the following descriptive information: System Location, System Contact, System Description, and System Name. This information will be used in trap messages to identify the Tenor.

The following procedure describes the commands for setting system ID information.

1. Connect to the Tenor by your preferred Telnet application.
2. At the MasterChassis prompt, type the following commands. Remember to enclose in quotes any phrases that include spaces.

```
config-MasterChassis-1# set snmpsystemlocation "New York Office"  
config-MasterChassis-1# set snmpsystemcontact "John Robinson"  
config-MasterChassis-1# set snmpsystemdescription "Tenor CMS 24th floor"  
config-MasterChassis-1# set snmpsystemname CMS1020
```

You have now set a Location, Contact, Description, and Name for your system.

3. Type **submit**. The system ID information is set.

## Using *Configuration Manager*

### Setting Trap Addresses

The following procedure describes the method in *Configuration Manager* to configure the IP address(es) of the network management site(s) where the Tenor should send SNMP traps.

1. Select *Systemwide Configuration > SNMP Server > General tab > SNMP Trap IP Address*.
2. Enter up to three IP addresses where the Tenor should send traps.
3. Submit your changes.

### Setting SNMP Public Community String

To ensure security, the SNMP agent in the 2G Tenor validates each request received from an SNMP manager before responding to the request. It does this by verifying that the manager belongs to an SNMP community with access privileges to the agent. All SNMP message exchanges consist of a community name and a data field, which contains instructions for the device.

The following procedure describes the method in *Configuration Manager* to configure the SNMP Public Community String.

1. Select *Systemwide Configuration > SNMP Server > General tab > SNMP Public Community*.
2. Enter the SNMP Public Community String.
3. Submit your changes.

### Setting SNMP Descriptive Information

You can enter system identification information to be used by the SNMP manager to distinguish your Tenor. You may add the following descriptive information: System Location, System Contact, System Description, and System Name. This information can be queried.

The following procedure describes the method in *Configuration Manager* to configure system ID information.

1. Select *Systemwide Configuration > SNMP Server > System Info tab*
2. On the System Info tab of the SNMP Server window, you may add the following descriptive information: System Location, System Contact, System Description, and System Name. This information will be used in trap messages to identify the Tenor.
3. Submit your changes.

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## Quintum Alarms/Traps

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The Quintum Tenor line of products generates an SNMP trap for every alarm. The alarm traps consist of four major types based on the value of the severity field. These four types are categorized as Critical, Major, Minor, and Report.

### Trap File Format

Each trap file consists of the following fields:

Timestamp, Object ID, IP Address, Sequence Number, Event Type, Severity, Most Severe Event, Event Description, Slot Number, Device Number, Line Number, Channel Number, and Type of Device.

This sequence of fields is captured in the field ID, which is part of the Object ID.

### Timestamp (ID 1)

This is a numeric field that indicates how long the system has been up. These IDs are captured in the following list.

### Object ID (ID 2)

This is a numeric field that contains the trap's Object ID.

### IP Address (ID 3)

This is a numeric field containing the IP Address of the unit where the alarm or report event occurred.

### Sequence Number (ID 4)

This is a numeric field containing the sequence number assigned to each event or report. The number is an integer with a value between 0 and 500.

### Event Type (ID 5)

This is an alphanumeric field containing one of three different type designations. These are "ALR" for a new alarm, "CLR" for an alarm condition clearing, and "RPT" (Reports), which are informational messages, not alarm conditions. They are generally not of concern, and do not have a corresponding CLR event.

### Severity (ID 6)

This is a numeric field containing a value indicating the severity of the event. The number is an integer with a value between 0 and 5. The severity values are defined as "Critical Alarm" = 1, "Major Alarm" = 2, "Minor Alarm" = 3, and "Information" = 4. The severity values of 0 and 5 are currently undefined and unused.

### Most Severe Event (ID 7)

This is a numeric field containing a value indicating the most severe event currently being reported by the alarm manager in the unit reporting. The number is an integer between 0 and 5. The values are the same as those defined for the Severity field.

**Event Description (ID 8)**

This is an alphanumeric field containing a description of alarm or report. The field contains descriptions such as "Border Element connection lost", or "Loss of Framing (Red Alarm)".

**Slot Number (ID 9)**

This is a numeric field containing a value indicating the number of the slot in a Tenor CMS in which the device generating the alarm resides. The number of slots in a CMS (Compact PCI) chassis can vary from 2 to 14 depending on the type of CMS. The number is an integer between 1 and 14. The System Controller card always resides in slot 1. The T1/E1 Line Interface Cards reside in the remaining slots. Each Line Interface Card has eight T1/E1 lines, each of which has 24/30 TDM channels. Each Line Interface Card can support one or two DSP daughter cards, each of which supports 120 Voice over IP channels.

In the case of the Tenor AS, AX, and DX Series products, the concept of "slots" is retained although these units have fixed configurations. In these devices "Slot 1" (SL1) represents the system controller (CPU) mounted on the motherboard. The designation "Slot 2" (SL2) represents the complete set of analog ports on the AS and AX Series products, and digital ports on the DX Series products.

**Device Number (ID 10)**

This is a numeric field containing a value indicating the type of "Device" in a particular "Slot." The designation "Device 1" (DV1) represents the system controller (CPU), "Device 2" (DV2) represents a line interface card (FXS, FXO, T1/E1), and "Device 3" (DV3) represents a DSP device or daughter card.

**Line Number (ID 11)**

This is a numeric field containing a value indicating the line of a line interface, or interface card that is generating the alarm.

- In the case of an 8 port T1/E1 Line Interface Card in a slot of a Tenor CMS, the line number represents the T1/E1 port or span on that card. There are a maximum of eight lines on each card and the CMS can support up to four cards for a maximum of thirty two T1/E1 lines or spans.
- In the case of a Tenor DX Series, there can be up to eight T1/E1 line interfaces installed. These will be designated as lines 1 through 8.
- In the case of the Tenor AS Series, there can be up to four FXS ports and four FXO ports installed. The Tenor AX Series can support up to twenty-four FXS and twenty-four FXO ports. In both cases the line number represents either the group of FXS ports or the group of FXO ports. The group of FXS ports is designated as "Line 1", and the group of FXO ports is designated as "Line 2".

**Channel Number (ID 12)**

This is a numeric field containing a value indicating the number of the actual channel in a "Line" that is generating the alarm.

- In the case of the Tenor CMS 8 port Line Interface Card, each T1 line or span will have twenty-four channels designated 1 through 24. Each E1 line or span will have thirty channels designated 1 through 30.



- In the case of the Tenor AS Series, each line group (FXS or FXO) can have up to four channels designated 1 through 4.
- In the case of the Tenor AX Series, each line group (FXS or FXO) can have up to twenty four channels designated 1 through 24.

### Card Type (ID 13)

This is an alphanumeric field containing a description of the type of device generating the alarm.

### Quintum Alarm Definitions

This section provides descriptions of valid alarms for Tenor products (text that appears in the Alarm Description field in Tenor Monitor) for all possible alarms the system can generate. These alarms generate traps.

Severity (appears as part of severity field)	Alarm Description (text appears in desc field)	Definition
Critical	Loss of Framing (Red Alarm)	Signal is not being transmitted; there is no layer 1 synchronization.
Critical	Remote Alarm indication (Yellow Alarm)	The Tenor is receiving a yellow alarm signal from the network.
Critical	Loss of signal	A loss of signal (32 consecutive zeros) at least once during a 1 second period.
Critical	AIS Reception (Blue Alarm)	Alarm Indication Signal. An all ones condition used to alert the Tenor that its incoming signal (or frame) has been lost.
Critical	Layer 2 Down	Indicates that Layer 2 protocol is down.
Critical	Ethernet Disconnected	Ethernet cable has been disconnected from the System Controller or CPU Card, or Ethernet connectivity has been lost. No new VoIP calls will be made and existing PSTN calls will be switched to the PSTN.
Critical	Call Handler not registered with Gatekeeper	The Call Handler process cannot be registered with the Gatekeeper.
Critical	Critical Software Error	A software error has occurred that affects the operability of the complete system.
Critical	<i>Tenor DX</i> Chassis reset	The chassis has reset.
Critical	Primary Digital Interface Clock Loss	Clock source has been lost for T1 lines. The unit will automatically switch to the secondary digital interface clock source.
Critical	Secondary Digital Interface Clock Loss	All clock sources have been lost, both primary and secondary. Check the T1 lines for the possible cause.
Critical	Configuration Data Missing	Configuration via CLI is missing. Check the configuration data and add the necessary information.

<b>Severity (appears as part of severity field)</b>	<b>Alarm Description (text appears in desc field)</b>	<b>Definition</b>
Critical	IVR Configuration Missing	<p>Appears if an attempt to make an IVR call has been made when a valid IP address is not configured.</p> <p>Occurs if an IVR call has been passed through accidentally, without a real intention to use IVR for subsequent calls, while both of the servers were disabled. In order to clear the alarm, a user will have to change one of the IP addresses to some value, and then disable it again.</p>
Critical	RADIUS Configuration Missing	<p>Appears when a RADIUS request is made and one or more required configuration parameters are missing.</p> <p>This alarm is cleared when the required RADIUS parameters are configured via CLI.</p>
Critical	RADIUS Server Not Responding	<p>Appears when none of the configured RADIUS servers respond.</p> <p>This alarm is cleared when any of the RADIUS servers respond or the RADIUS server is disabled via CLI.</p>
Major	Major Software Error	<p>A software error has occurred that affects system signaling, interfaces, or other major operation.</p>
Major	File Missing in the File Server	<p>This alarm will be reported to the system when a particular voice prompt file is not found in the IVR Prompt Server.</p> <p>This alarm applies only to the system with enabled IVR functionality.</p>
Major	Switch to other RADIUS server	<p>Appears when the current RADIUS server stops responding after three consecutive calls end in timeouts and another RADIUS server is configured, the Tenor will then switch to the next RADIUS server.</p>
Minor	Call Event(s) Lost	<p>A call has failed.</p>
Minor	Missing or Incorrect Profile	<p>The configuration profile has caused a problem.</p>
Minor	Minor Software Error	<p>A software error has occurred but will not affect the operation of the complete system.</p>
Minor	No response to seizure	<p>There has been a problem with the T1 line.</p>
Minor	Remote end did not back off in a glare situation	<p>An incoming and outgoing call went through at the same time, and the remote end call did not back off.</p>
Minor	Unit resource constrained	<p>A shared resource in the unit loads the system.</p>
Minor	Hardware component failed	<p>A hardware component has failed. Check all components, hardware connections, etc.</p>

<b>Severity (appears as part of severity field)</b>	<b>Alarm Description (text appears in desc field)</b>	<b>Definition</b>
Minor	Log RADIUS server error	<p>Displayed when the RADIUS server fails to send required data or the data sent by the RADIUS server has improper values. Incorrect information may contain the following:</p> <ul style="list-style-type: none"> <li>RADIUS Server: Credit amount (-1)</li> <li>RADIUS Server: Credit minus amount</li> <li>RADIUS Server: Not supported currency</li> <li>RADIUS Server: Credit time (-1)</li> <li>RADIUS Server: Credit time &lt; 6 sec</li> <li>RADIUS Server: Invalid error code</li> </ul>
Informational	Gatekeeper status	Reports the status of the Gatekeeper.
Informational	Miscellaneous information	Miscellaneous information about the unit is reported. The contents of this alarm will vary.
Informational	Info Software Error	Indicates information about miscellaneous software error. This does not affect system operation.
Informational	Glare occurred	An incoming and outgoing call went through at the same time, and the remote end call did not back off, but the situation was corrected.

## Quintum Private MIB Objects

This section provides information on the objects supported in the Quintum private MIB. To understand the MIB, it is important to know how the slots/spans/channels are numbered in a Quintum device.

### Index Numbering on Quintum Products

These values are incorporated into the Object ID (OID) of each object. The OID is a period-delimited sequence of numbers with the format a.b.c...x.y.z. The OID is a unique identifier for an item of information that is part of a MIB. The numbering scheme for MIB objects is specific to the device in question, with the index number occupying the final position. The table below shows the index numbering for the CMS slots, and spans within a slot. A CMS may have up to 14 slots.

### CMS Slot/Span Index Numbering

Slots	Spans							
	1	2	3	4	5	6	7	8
1	1	2	3	4	5	6	7	8
2	9	10	11	12	13	14	15	16
3	17	18	19	20	21	22	23	24
4	25	26	27	28	29	30	31	32
5	33	34	35	36	37	38	39	40
6	41	42	43	44	45	46	47	48
7	49	50	51	52	53	54	55	56
8	57	58	59	60	61	62	63	64
9	65	66	67	68	69	70	71	72
10	73	74	75	76	77	78	79	80
11	81	82	83	84	85	86	87	88
12	89	90	91	92	93	94	95	96
13	97	98	99	100	101	102	103	104
14	105	106	107	108	109	110	111	112

### Tenor DX/BX Index Numbering

Spans are numbered 1-8.

### Tenor AX/AS Index Numbering

FXO (Phone): 1

FXS (Line): 2

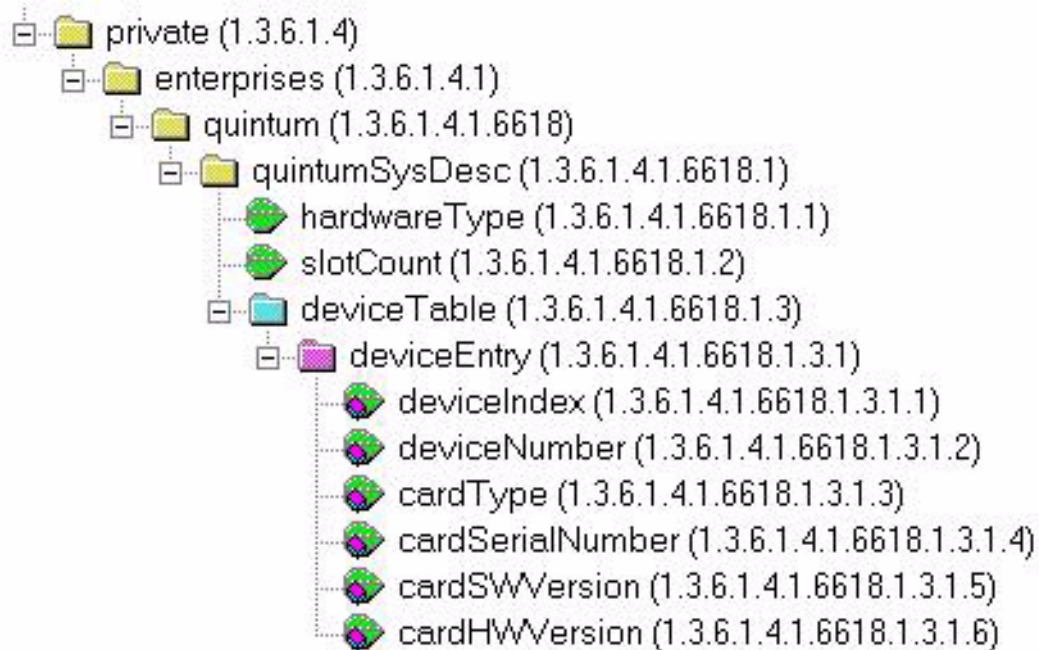
## SNMP Counter and Statistics Objects

This section correlates MIB objects with sample results obtained doing an SNMP Walk of the Tenor. An SNMP Walk communicates with a network entity using SNMP GET NEXT requests. The MIB objects are shown in the columns on the left in the following tables. The variables retrieved in the Walk are shown in the columns on the right.

### System Description

The System Description section is the first one in the Quantum MIB. Notice in the hierarchy shown below that the number assigned to the Quantum Enterprise is 6618. This number is part of every OID that can be retrieved from a Quantum device.

The System Description objects include hardware type, slot count, and the Device Table.



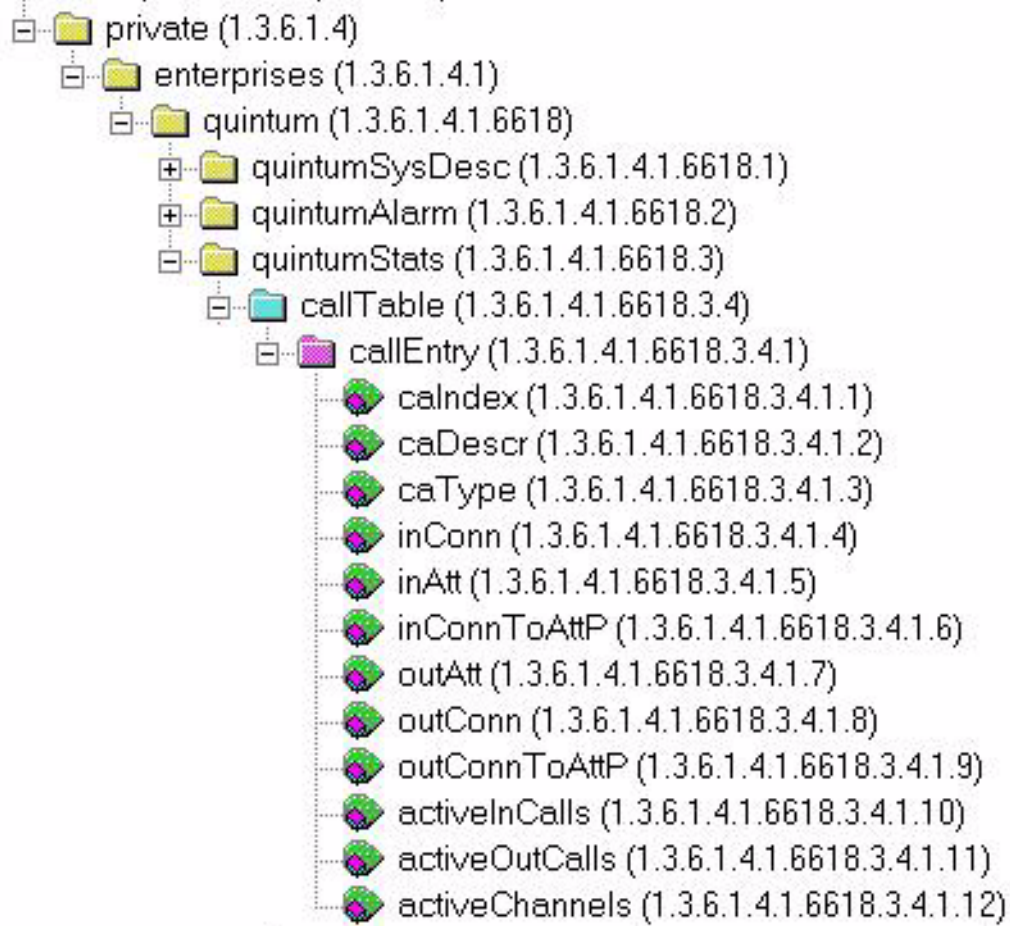
### Device Table Objects

The device table contains information such as card type, version, and serial number.

MIB object for device table	Retrieved values
<pre> deviceTable OBJECT-TYPE     SYNTAX SEQUENCE OF DeviceEntry     MAX-ACCESS not-accessible     STATUS current     DESCRIPTION         "Table used to store slot device and         card type information"     ::= { quintumSysDesc 3 }  deviceEntry OBJECT-TYPE     SYNTAX DeviceEntry     MAX-ACCESS not-accessible     STATUS current     DESCRIPTION         "A device entry containing objects at         the slot for a particular interface."     INDEX { deviceIndex }     ::= { deviceTable 1 }  DeviceEntry ::=     SEQUENCE {         deviceIndex             INTEGER,         deviceNumber             INTEGER,         cardType             OCTET STRING,         cardSerialNumber             OCTET STRING,         cardSWVersion             OCTET STRING,         cardHWVersion             OCTET STRING     }                     </pre>	<pre> enterprises.6618.1.1.0 = STRING: "Tenor Carrier Multipath Switch" enterprises.6618.1.2.0 = INTEGER: 2 enterprises.6618.1.3.1.1.0 = INTEGER: 1 enterprises.6618.1.3.1.2.0 = INTEGER: 5 enterprises.6618.1.3.1.3.0 = STRING: "cardType:[Tenor CMS System Controller]" enterprises.6618.1.3.1.4.0 = STRING: "serial#:[B001-0030e4]" enterprises.6618.1.3.1.5.0 = STRING: "swVersion:[SystemController=P102-08- 00][BootCode=v2.12]" enterprises.6618.1.3.1.6.0 = STRING: "hwVersion:[Series-2]" enterprises.6618.2.2.0 = INTEGER: 4 enterprises.6618.2.3.0 = INTEGER: 1 enterprises.6618.2.4.0 = INTEGER: 100                     </pre>

## Call Table Objects

The Call Table contains statistics about all incoming and outgoing calls for this Tenor device.



MIB object for call table	Call Table
<pre> callTable OBJECT-TYPE     SYNTAX SEQUENCE OF CallEntry     MAX-ACCESS not-accessible     STATUS current     DESCRIPTION         ""     ::= { quintumStats 4 }  callEntry OBJECT-TYPE     SYNTAX CallEntry     MAX-ACCESS not-accessible     STATUS current     DESCRIPTION         ""     INDEX { caIndex }     ::= { callTable 1 }  CallEntry ::=     SEQUENCE {         caIndex          INTEGER,         caDescr          OCTET STRING,         caType           OCTET STRING,         inConn           Counter,         inAtt            Counter,         inConnToAttP    Gauge,         outConn          Counter,         outAtt           Counter,         outConnToAttP   Gauge,         activeInCalls   Gauge,         activeOutCalls  Gauge,         activeChannels  Gauge     }         </pre>	<pre> callTable (1.3.6.1.4.1.6618.3.4) + callEntry (1.3.6.1.4.1.6618.3.4.1) + caIndex (1.3.6.1.4.1.6618.3.4.1.1) + caDescr (1.3.6.1.4.1.6618.3.4.1.2) + caType (1.3.6.1.4.1.6618.3.4.1.3) + inConn (1.3.6.1.4.1.6618.3.4.1.4) + inAtt (1.3.6.1.4.1.6618.3.4.1.5) + inConnToAttP (1.3.6.1.4.1.6618.3.4.1.6) + outConn (1.3.6.1.4.1.6618.3.4.1.7) + outAtt (1.3.6.1.4.1.6618.3.4.1.8) + outConnToAttP (1.3.6.1.4.1.6618.3.4.1.9) + activeInCalls (1.3.6.1.4.1.6618.3.4.1.10) + activeOutCalls (1.3.6.1.4.1.6618.3.4.1.11) + activeChannels (1.3.6.1.4.1.6618.3.4.1.12)         </pre>

MIB object for row index numbers	Retrieved values for 8 spans and a total
<pre> caIndex OBJECT-TYPE     SYNTAX INTEGER     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Row index number"     ::= { callEntry 1 }         </pre>	<pre> enterprises.6618.3.4.1.1.1 = Counter32: 1 enterprises.6618.3.4.1.1.2 = Counter32: 2 enterprises.6618.3.4.1.1.3 = Counter32: 3 enterprises.6618.3.4.1.1.4 = Counter32: 4 enterprises.6618.3.4.1.1.5 = Counter32: 5 enterprises.6618.3.4.1.1.6 = Counter32: 6 enterprises.6618.3.4.1.1.7 = Counter32: 7 enterprises.6618.3.4.1.1.8 = Counter32: 8 enterprises.6618.3.4.1.1.999 = Counter32: 999         </pre>



MIB object for slot#, device#, and digital interface#	Retrieved values for 8 spans and a total
<pre>caDescr OBJECT-TYPE   SYNTAX OCTET STRING (SIZE (1..16))   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Slot#, Device#, and Digital-Interface#"   ::= { callEntry 2 }</pre>	<pre>enterprises.6618.3.4.1.2.1 = STRING: "SL2/DI1" enterprises.6618.3.4.1.2.2 = STRING: "SL2/DI2" enterprises.6618.3.4.1.2.3 = STRING: "SL2/DI3" enterprises.6618.3.4.1.2.4 = STRING: "SL2/DI4" enterprises.6618.3.4.1.2.5 = STRING: "SL2/DI5" enterprises.6618.3.4.1.2.6 = STRING: "SL2/DI6" enterprises.6618.3.4.1.2.7 = STRING: "SL2/DI7" enterprises.6618.3.4.1.2.8 = STRING: "SL2/DI8" enterprises.6618.3.4.1.2.999 = STRING: "Totals:"</pre>

MIB object to identify the line type	Retrieved values for 8 spans and a total
<pre>caType OBJECT-TYPE   SYNTAX OCTET STRING (SIZE (1..8))   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Identifies the line type"   ::= { callEntry 3 }</pre>	<pre>enterprises.6618.3.4.1.3.1 = STRING: "PRI" enterprises.6618.3.4.1.3.2 = STRING: "PRI" enterprises.6618.3.4.1.3.3 = STRING: "???" enterprises.6618.3.4.1.3.4 = STRING: "???" enterprises.6618.3.4.1.3.5 = STRING: "???" enterprises.6618.3.4.1.3.6 = STRING: "???" enterprises.6618.3.4.1.3.7 = STRING: "???" enterprises.6618.3.4.1.3.8 = STRING: "???" enterprises.6618.3.4.1.3.999 = STRING: "CAS0/ PRI2"</pre>

MIB object for total inbound call connections	Retrieved values for 8 spans and a total
<pre>inConn OBJECT-TYPE   SYNTAX Counter   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Total inbound call connects"   ::= { callEntry 4 }</pre>	<pre>enterprises.6618.3.4.1.4.1 = Counter32: 83 enterprises.6618.3.4.1.4.2 = Counter32: 113 enterprises.6618.3.4.1.4.3 = Counter32: 0 enterprises.6618.3.4.1.4.4 = Counter32: 0 enterprises.6618.3.4.1.4.5 = Counter32: 0 enterprises.6618.3.4.1.4.6 = Counter32: 0 enterprises.6618.3.4.1.4.7 = Counter32: 0 enterprises.6618.3.4.1.4.8 = Counter32: 0 enterprises.6618.3.4.1.4.999 = Counter32: 196</pre>

MIB object for total inbound call attempts	Retrieved values for 8 spans and a total
<pre>inAtt OBJECT-TYPE   SYNTAX Counter   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Total inbound call attempts"   ::= { callEntry 5 }</pre>	<pre>enterprises.6618.3.4.1.5.1 = Counter32: 88 enterprises.6618.3.4.1.5.2 = Counter32: 134 enterprises.6618.3.4.1.5.3 = Counter32: 0 enterprises.6618.3.4.1.5.4 = Counter32: 0 enterprises.6618.3.4.1.5.5 = Counter32: 0 enterprises.6618.3.4.1.5.6 = Counter32: 0 enterprises.6618.3.4.1.5.7 = Counter32: 0 enterprises.6618.3.4.1.5.8 = Counter32: 0 enterprises.6618.3.4.1.5.999 = Counter32: 222</pre>

MIB object for percentage of total inbound call attempts connected	Retrieved values for 8 spans and a total
<pre> inConnToAttP OBJECT-TYPE     SYNTAX Gauge (0..100)     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Inbound Attempts/Connect percentage"     ::= { callEntry 6 }                     </pre>	<pre> enterprises.6618.3.4.1.6.1 = Gauge32: 94 enterprises.6618.3.4.1.6.2 = Gauge32: 84 enterprises.6618.3.4.1.6.3 = Gauge32: 0 enterprises.6618.3.4.1.6.4 = Gauge32: 0 enterprises.6618.3.4.1.6.5 = Gauge32: 0 enterprises.6618.3.4.1.6.6 = Gauge32: 0 enterprises.6618.3.4.1.6.7 = Gauge32: 0 enterprises.6618.3.4.1.6.8 = Gauge32: 0 enterprises.6618.3.4.1.6.999 = Gauge32: 88                     </pre>

MIB object for total outbound call attempts	Retrieved values for 8 spans and a total
<pre> outAtt OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Total outbound call attempts"     ::= { callEntry 7 }                     </pre>	<pre> enterprises.6618.3.4.1.7.1 = Counter32: 113 enterprises.6618.3.4.1.7.2 = Counter32: 128 enterprises.6618.3.4.1.7.3 = Counter32: 0 enterprises.6618.3.4.1.7.4 = Counter32: 0 enterprises.6618.3.4.1.7.5 = Counter32: 0 enterprises.6618.3.4.1.7.6 = Counter32: 0 enterprises.6618.3.4.1.7.7 = Counter32: 0 enterprises.6618.3.4.1.7.8 = Counter32: 0 enterprises.6618.3.4.1.7.999 = Counter32: 241                     </pre>

MIB object for total outbound call connections	Retrieved values for 8 spans and a total
<pre> outConn OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Total outbound call connects"     ::= { callEntry 8 }                     </pre>	<pre> enterprises.6618.3.4.1.8.1 = Counter32: 92 enterprises.6618.3.4.1.8.2 = Counter32: 116 enterprises.6618.3.4.1.8.3 = Counter32: 0 enterprises.6618.3.4.1.8.4 = Counter32: 0 enterprises.6618.3.4.1.8.5 = Counter32: 0 enterprises.6618.3.4.1.8.6 = Counter32: 0 enterprises.6618.3.4.1.8.7 = Counter32: 0 enterprises.6618.3.4.1.8.8 = Counter32: 0 enterprises.6618.3.4.1.8.999 = Counter32: 208                     </pre>

MIB object for percentage of outbound call attempts connected	Retrieved values for 8 spans and a total
<pre> outConnToAttP OBJECT-TYPE     SYNTAX Gauge (0..100)     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Outbound Attempts/Connect percentage"     ::= { callEntry 9 }                     </pre>	<pre> enterprises.6618.3.4.1.9.1 = Gauge32: 81 enterprises.6618.3.4.1.9.2 = Gauge32: 90 enterprises.6618.3.4.1.9.3 = Gauge32: 0 enterprises.6618.3.4.1.9.4 = Gauge32: 0 enterprises.6618.3.4.1.9.5 = Gauge32: 0 enterprises.6618.3.4.1.9.6 = Gauge32: 0 enterprises.6618.3.4.1.9.7 = Gauge32: 0 enterprises.6618.3.4.1.9.8 = Gauge32: 0 enterprises.6618.3.4.1.9.999 = Gauge32: 86                     </pre>

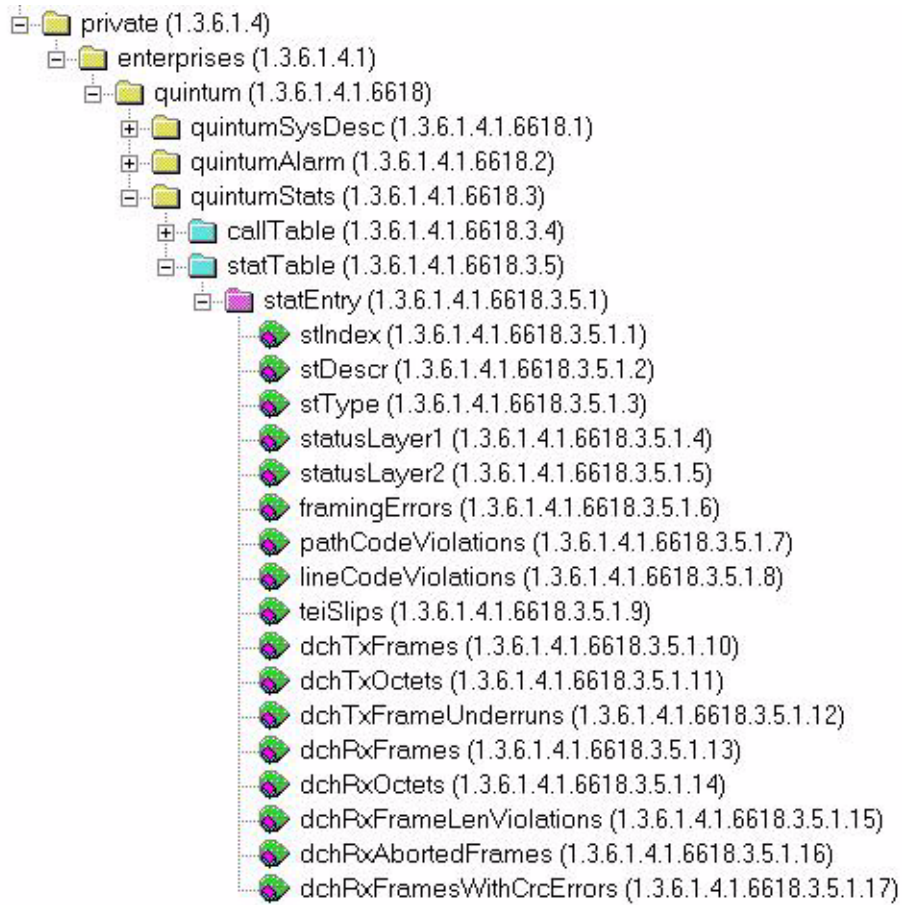
MIB object for number of active inbound calls	Retrieved values for 8 spans and a total
<pre> activeInCalls OBJECT-TYPE     SYNTAX Gauge     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of active inbound calls"     ::= { callEntry 10 }                     </pre>	<pre> enterprises.6618.3.4.1.10.1 = Gauge32:0 enterprises.6618.3.4.1.10.2 = Gauge32:1 enterprises.6618.3.4.1.10.3 = Gauge32:0 enterprises.6618.3.4.1.10.4 = Gauge32:0 enterprises.6618.3.4.1.10.5 = Gauge32:0 enterprises.6618.3.4.1.10.6 = Gauge32:0 enterprises.6618.3.4.1.10.7 = Gauge32:0 enterprises.6618.3.4.1.10.8 = Gauge32:0 enterprises.6618.3.4.1.10.999 = Gauge32: 1                     </pre>

MIB object for number of active outbound calls	Retrieved values for 8 spans and a total
<pre> activeOutCalls OBJECT-TYPE     SYNTAX Gauge     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of active outbound calls"     ::= { callEntry 11 }                     </pre>	<pre> enterprises.6618.3.4.1.11.1 = Gauge32: 1 enterprises.6618.3.4.1.11.2 = Gauge32: 0 enterprises.6618.3.4.1.11.3 = Gauge32: 0 enterprises.6618.3.4.1.11.4 = Gauge32: 0 enterprises.6618.3.4.1.11.5 = Gauge32: 0 enterprises.6618.3.4.1.11.6 = Gauge32: 0 enterprises.6618.3.4.1.11.7 = Gauge32: 0 enterprises.6618.3.4.1.11.8 = Gauge32: 0 enterprises.6618.3.4.1.11.999 = Gauge32: 1                     </pre>

MIB object for number of active channels	Retrieved values for 8 spans and a total
<pre> activeChannels OBJECT-TYPE     SYNTAX Gauge     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of active channels"     ::= { callEntry 12 }                     </pre>	<pre> enterprises.6618.3.4.1.12.1 = Gauge32: 1 enterprises.6618.3.4.1.12.2 = Gauge32: 1 enterprises.6618.3.4.1.12.3 = Gauge32: 0 enterprises.6618.3.4.1.12.4 = Gauge32: 0 enterprises.6618.3.4.1.12.5 = Gauge32: 0 enterprises.6618.3.4.1.12.6 = Gauge32: 0 enterprises.6618.3.4.1.12.7 = Gauge32: 0 enterprises.6618.3.4.1.12.8 = Gauge32: 0 enterprises.6618.3.4.1.12.999 = Gauge32: 2                     </pre>

### Status Table Objects - T1/E1 Only

The Status Table contains statistics on the performance of Tenor T1/E1 connections.



MIB object for status table	Status Table
<pre> statTable OBJECT-TYPE   SYNTAX SEQUENCE OF StatEntry   MAX-ACCESS not-accessible   STATUS current   DESCRIPTION   ""   ::= { quintumStats 5 }  statEntry OBJECT-TYPE   SYNTAX StatEntry   MAX-ACCESS not-accessible   STATUS current   DESCRIPTION   ""   INDEX { stIndex }   ::= { statTable 1 }  StatEntry ::= SEQUENCE {   stIndex          INTEGER,   stDescr         OCTET STRING,   stType          OCTET STRING,   statusLayer1    OCTET STRING,   statusLayer2    OCTET STRING,   framingErrors   Counter,   pathCodeViolations Counter,   lineCodeViolations Counter,   teiSlips        Counter,   dchTxFrames     Counter,   dchTxOctets     Counter,   dchTxFrameUnderruns Counter,   dchRxFrames     Counter,   dchRxOctets     Counter,   dchRxFrameLenViolations Counter,   dchRxAbortedFrames Counter,   dchRxFramesWithCrcErrors Counter } </pre>	<pre> statTable (1.3.6.1.4.1.6618.3.5) + statEntry (1.3.6.1.4.1.6618.3.5.1) + stIndex (1.3.6.1.4.1.6618.3.5.1.1) + stDescr (1.3.6.1.4.1.6618.3.5.1.2) + stType (1.3.6.1.4.1.6618.3.5.1.3) + statusLayer1 (1.3.6.1.4.1.6618.3.5.1.4) + statusLayer2 (1.3.6.1.4.1.6618.3.5.1.5) + frameErrors (1.3.6.1.4.1.6618.3.5.1.6) + pathCodeViolations (1.3.6.1.4.1.6618.3.5.1.7) + lineCodeViolations (1.3.6.1.4.1.6618.3.5.1.8) + teiSlips (1.3.6.1.4.1.6618.3.5.1.9) + dchTxFrames (1.3.6.1.4.1.6618.3.5.1.10) + dchTxOctets (1.3.6.1.4.1.6618.3.5.1.11) + dchTxFrameUnderruns (1.3.6.1.4.1.6618.3.5.1.12) + dchRxFrames (1.3.6.1.4.1.6618.3.5.1.13) + dchRxOctets (1.3.6.1.4.1.6618.3.5.1.14) + dchRxFrameLenViolations (1.3.6.1.4.1.6618.3.5.1.15) + dchRxAbortedFrames (1.3.6.1.4.1.6618.3.5.1.16) + dchRxFramesWithCrcErrors (1.3.6.1.4.1.6618.3.5.1.17) </pre>

MIB object for row index number	Retrieved values for 8 spans and a total
<pre> stIndex OBJECT-TYPE   SYNTAX INTEGER (0..128)   MAX-ACCESS read-only   STATUS current   DESCRIPTION   "Row index number"   ::= { statEntry 1 } </pre>	<pre> enterprises.6618.3.5.1.1.1 = Counter32: 1 enterprises.6618.3.5.1.1.2 = Counter32: 2 enterprises.6618.3.5.1.1.3 = Counter32: 3 enterprises.6618.3.5.1.1.4 = Counter32: 4 enterprises.6618.3.5.1.1.5 = Counter32: 5 enterprises.6618.3.5.1.1.6 = Counter32: 6 enterprises.6618.3.5.1.1.7 = Counter32: 7 enterprises.6618.3.5.1.1.8 = Counter32: 8 enterprises.6618.3.5.1.1.999 = Counter32: 999 </pre>

MIB object slot#, device#, and digital interface#	Retrieved values for 8 spans and a total
<pre>stDescr OBJECT-TYPE   SYNTAX OCTET STRING (SIZE (1..16))   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Slot#, Device#, and Digital-Interface#"   ::= { statEntry 2 }</pre>	<pre>enterprises.6618.3.5.1.2.1 = STRING: "SL2/DI1" enterprises.6618.3.5.1.2.2 = STRING: "SL2/DI2" enterprises.6618.3.5.1.2.3 = STRING: "SL2/DI3" enterprises.6618.3.5.1.2.4 = STRING: "SL2/DI4" enterprises.6618.3.5.1.2.5 = STRING: "SL2/DI5" enterprises.6618.3.5.1.2.6 = STRING: "SL2/DI6" enterprises.6618.3.5.1.2.7 = STRING: "SL2/DI7" enterprises.6618.3.5.1.2.8 = STRING: "SL2/DI8" enterprises.6618.3.5.1.2.999 = STRING: "Totals:"</pre>

MIB object to identify the line type	Retrieved values for 8 spans and a total
<pre>stType OBJECT-TYPE   SYNTAX OCTET STRING (SIZE (1..8))   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "Identifies the line type"   ::= { statEntry 3 }</pre>	<pre>enterprises.6618.3.5.1.3.1 = STRING: "PRI" enterprises.6618.3.5.1.3.2 = STRING: "PRI" enterprises.6618.3.5.1.3.3 = STRING: "???" enterprises.6618.3.5.1.3.4 = STRING: "???" enterprises.6618.3.5.1.3.5 = STRING: "???" enterprises.6618.3.5.1.3.6 = STRING: "???" enterprises.6618.3.5.1.3.7 = STRING: "???" enterprises.6618.3.5.1.3.8 = STRING: "???" enterprises.6618.3.5.1.3.999 = STRING: "CAS0/ PRI2"</pre>

MIB object for DS1 physical layer synchronization	Retrieved values for 8 spans and a total
<pre>statusLayer1 OBJECT-TYPE   SYNTAX OCTET STRING (SIZE (1..20))   MAX-ACCESS read-only   STATUS current   DESCRIPTION     "DS1 physical layer synchronization as     defined by the following states:     - Loss of Framing     - Red Alarm     - Yellow Alarm     - Active"   ::= { statEntry 4 }</pre>	<pre>enterprises.6618.3.5.1.4.1 = STRING: "Active" enterprises.6618.3.5.1.4.2 = STRING: "Active" enterprises.6618.3.5.1.4.3 = STRING: "Lost Framing" enterprises.6618.3.5.1.4.4 = STRING: "Active" enterprises.6618.3.5.1.4.5 = STRING: "Active" enterprises.6618.3.5.1.4.6 = STRING: "Lost Framing" enterprises.6618.3.5.1.4.7 = STRING: "Lost Framing" enterprises.6618.3.5.1.4.8 = STRING: "Lost Framing" enterprises.6618.3.5.1.4.999 = STRING: "4 Active"</pre>

MIB object for PRI layer 2 status	Retrieved values for 8 spans and a total
<pre>statusLayer2 OBJECT-TYPE     SYNTAX OCTET STRING (SIZE (1..20))     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "dsiStatusLayer2 is used for PRI mode and is         not applicable to CAS mode.         StatusLayer2 is the PRI layer 2 status as         defined by the following states:         - TEI Assigned         - Awaiting Establ         - Awaiting Release         - Timer Recovery         - Active"     ::= { statEntry 5 }</pre>	<pre>enterprises.6618.3.5.1.5.1 = STRING: "Active" enterprises.6618.3.5.1.5.2 = STRING: "Active" enterprises.6618.3.5.1.5.3 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.4 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.5 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.6 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.7 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.8 = STRING: "TEI Assigned" enterprises.6618.3.5.1.5.999 = STRING: "2 Active"</pre>

MIB object for T1/E1 framing errors	Retrieved values for 8 spans and a total
<pre>framingErrors OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Error counter for T1/E1 framing errors"     ::= { statEntry 6 }</pre>	<pre>enterprises.6618.3.5.1.6.1 = Counter32: 0 enterprises.6618.3.5.1.6.2 = Counter32: 0 enterprises.6618.3.5.1.6.3 = Counter32: 0 enterprises.6618.3.5.1.6.4 = Counter32: 4 enterprises.6618.3.5.1.6.5 = Counter32: 0 enterprises.6618.3.5.1.6.6 = Counter32: 0 enterprises.6618.3.5.1.6.7 = Counter32: 0 enterprises.6618.3.5.1.6.8 = Counter32: 0 enterprises.6618.3.5.1.6.999 = Counter32: 4</pre>

MIB object for number of multiframe CRC errors	Retrieved values for 8 spans and a total
<pre>pathCodeViolations OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of multiframe CRC errors"     ::= { statEntry 7 }</pre>	<pre>enterprises.6618.3.5.1.7.1 = Counter32: 0 enterprises.6618.3.5.1.7.2 = Counter32: 0 enterprises.6618.3.5.1.7.3 = Counter32: 0 enterprises.6618.3.5.1.7.4 = Counter32: 0 enterprises.6618.3.5.1.7.5 = Counter32: 0 enterprises.6618.3.5.1.7.6 = Counter32: 0 enterprises.6618.3.5.1.7.7 = Counter32: 0 enterprises.6618.3.5.1.7.8 = Counter32: 0 enterprises.6618.3.5.1.7.999 = Counter32: 0</pre>

MIB object for number of line code violations	Retrieved values for 8 spans and a total
<pre> lineCodeViolations OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of HDB3, AMI, or B8ZS line code         violations"     ::= { statEntry 8 }                     </pre>	<pre> enterprises.6618.3.5.1.8.1 = Counter32: 1 enterprises.6618.3.5.1.8.2 = Counter32: 1 enterprises.6618.3.5.1.8.3 = Counter32: 0 enterprises.6618.3.5.1.8.4 = Counter32: 4 enterprises.6618.3.5.1.8.5 = Counter32: 2 enterprises.6618.3.5.1.8.6 = Counter32: 0 enterprises.6618.3.5.1.8.7 = Counter32: 0 enterprises.6618.3.5.1.8.8 = Counter32: 0 enterprises.6618.3.5.1.8.999 = Counter32: 8                     </pre>

MIB object for T1/E1 slips	Retrieved values for 8 spans and a total
<pre> teiSlips OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "For T1 or E1         -----         This SNMP variable contains the number of         slips.         Instance 999 of this SNMP variable contains         the number of slips for all lines.                     </pre>	<pre> enterprises.6618.3.5.1.9.1 = Counter32: 1 enterprises.6618.3.5.1.9.2 = Counter32: 1 enterprises.6618.3.5.1.9.3 = Counter32: 0 enterprises.6618.3.5.1.9.4 = Counter32: 1 enterprises.6618.3.5.1.9.5 = Counter32: 1 enterprises.6618.3.5.1.9.6 = Counter32: 0 enterprises.6618.3.5.1.9.7 = Counter32: 0 enterprises.6618.3.5.1.9.8 = Counter32: 0 enterprises.6618.3.5.1.9.999 = Counter32: 4                     </pre>

MIB object for PRI D-channel frames transmitted	Retrieved values for 8 spans and a total
<pre> dchTxFrames OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of frames transmitted on the D-         channel (for PRI only)"     ::= { statEntry 10 }                     </pre>	<pre> enterprises.6618.3.5.1.10.1 = Counter32: 10360 enterprises.6618.3.5.1.10.2 = Counter32: 10389 enterprises.6618.3.5.1.10.3 = Counter32: 0 enterprises.6618.3.5.1.10.4 = Counter32: 0 enterprises.6618.3.5.1.10.5 = Counter32: 0 enterprises.6618.3.5.1.10.6 = Counter32: 0 enterprises.6618.3.5.1.10.7 = Counter32: 0 enterprises.6618.3.5.1.10.8 = Counter32: 0 enterprises.6618.3.5.1.10.999 = Counter32: 20749                     </pre>



MIB object for PRI D-channel bytes transmitted	Retrieved values for 8 spans and a total
<pre>dchTxOctets OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of bytes transmitted on the D-         channel (for PRI only)"     ::= { statEntry 11 }</pre>	<pre>enterprises.6618.3.5.1.11.1 = Counter32: 50156 enterprises.6618.3.5.1.11.2 = Counter32: 55016 enterprises.6618.3.5.1.11.3 = Counter32: 0 enterprises.6618.3.5.1.11.4 = Counter32: 0 enterprises.6618.3.5.1.11.5 = Counter32: 0 enterprises.6618.3.5.1.11.6 = Counter32: 0 enterprises.6618.3.5.1.11.7 = Counter32: 0 enterprises.6618.3.5.1.11.8 = Counter32: 0 enterprises.6618.3.5.1.11.999 = Counter32: 105172</pre>

MIB object for PRI D-channel transmit underrun frame errors	Retrieved values for 8 spans and a total
<pre>dchTxFrameUnderruns OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of D-channel transmit underrun         frame errors (for PRI only)"     ::= { statEntry 12 }</pre>	<pre>enterprises.6618.3.5.1.12.1 = Counter32: 0 enterprises.6618.3.5.1.12.2 = Counter32: 0 enterprises.6618.3.5.1.12.3 = Counter32: 0 enterprises.6618.3.5.1.12.4 = Counter32: 0 enterprises.6618.3.5.1.12.5 = Counter32: 0 enterprises.6618.3.5.1.12.6 = Counter32: 0 enterprises.6618.3.5.1.12.7 = Counter32: 0 enterprises.6618.3.5.1.12.8 = Counter32: 0 enterprises.6618.3.5.1.12.999 = Counter32: 0</pre>

MIB object for PRI D-channel frames received	Retrieved values for 8 spans and a total
<pre>dchRxFrames OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of frames received on the D-channel         (for PRI only)"     ::= { statEntry 13 }</pre>	<pre>enterprises.6618.3.5.1.13.1 = Counter32: 10302 enterprises.6618.3.5.1.13.2 = Counter32: 9994 enterprises.6618.3.5.1.13.3 = Counter32: 0 enterprises.6618.3.5.1.13.4 = Counter32: 0 enterprises.6618.3.5.1.13.5 = Counter32: 0 enterprises.6618.3.5.1.13.6 = Counter32: 0 enterprises.6618.3.5.1.13.7 = Counter32: 0 enterprises.6618.3.5.1.13.8 = Counter32: 0 enterprises.6618.3.5.1.13.999 = Counter32: 20296</pre>

MIB object for PRI D-channel bytes received	Retrieved values for 8 spans and a total
<pre>dchRxOctets OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of bytes received on the D-channel         (for PRI only)"     ::= { statEntry 14 }</pre>	<pre>enterprises.6618.3.5.1.14.1 = Counter32: 50156 enterprises.6618.3.5.1.14.2 = Counter32: 55016 enterprises.6618.3.5.1.14.3 = Counter32: 0 enterprises.6618.3.5.1.14.4 = Counter32: 0 enterprises.6618.3.5.1.14.5 = Counter32: 0 enterprises.6618.3.5.1.14.6 = Counter32: 0 enterprises.6618.3.5.1.14.7 = Counter32: 0 enterprises.6618.3.5.1.14.8 = Counter32: 0 enterprises.6618.3.5.1.14.999 = Counter32: 105172</pre>

MIB object for PRI D-channel incorrect length frames received	Retrieved values for 8 spans and a total
<pre>dchRxFrameLenViolations OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of D-channel received frames with         incorrect length (for PRI only)"     ::= { statEntry 15 }</pre>	<pre>enterprises.6618.3.5.1.15.1 = Counter32: 0 enterprises.6618.3.5.1.15.2 = Counter32: 0 enterprises.6618.3.5.1.15.3 = Counter32: 0 enterprises.6618.3.5.1.15.4 = Counter32: 0 enterprises.6618.3.5.1.15.5 = Counter32: 0 enterprises.6618.3.5.1.15.6 = Counter32: 0 enterprises.6618.3.5.1.15.7 = Counter32: 0 enterprises.6618.3.5.1.15.8 = Counter32: 0 enterprises.6618.3.5.1.15.999 = Counter32: 0</pre>

MIB object for PRI D-channel aborted frames received	Retrieved values for 8 spans and a total
<pre>dchRxAbortedFrames OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of aborted frames on the D-channel         during receive (for PRI only)"     ::= { statEntry 16 }</pre>	<pre>enterprises.6618.3.5.1.16.1 = Counter32: 0 enterprises.6618.3.5.1.16.2 = Counter32: 0 enterprises.6618.3.5.1.16.3 = Counter32: 0 enterprises.6618.3.5.1.16.4 = Counter32: 0 enterprises.6618.3.5.1.16.5 = Counter32: 0 enterprises.6618.3.5.1.16.6 = Counter32: 0 enterprises.6618.3.5.1.16.7 = Counter32: 0 enterprises.6618.3.5.1.16.8 = Counter32: 0 enterprises.6618.3.5.1.16.999 = Counter32: 0</pre>

MIB object for PRI D-channel CRC errored frames	Retrieved values for 8 spans and a total
<pre>dchRxFramesWithCrcErrors OBJECT-TYPE     SYNTAX Counter     MAX-ACCESS read-only     STATUS current     DESCRIPTION         "Number of received D-channel frames with         CRC errors (for PRI only)"     ::= { statEntry 17 }</pre>	<pre>enterprises.6618.3.5.1.17.1 = Counter32: 0 enterprises.6618.3.5.1.17.2 = Counter32: 0 enterprises.6618.3.5.1.17.3 = Counter32: 0 enterprises.6618.3.5.1.17.4 = Counter32: 0 enterprises.6618.3.5.1.17.5 = Counter32: 0 enterprises.6618.3.5.1.17.6 = Counter32: 0 enterprises.6618.3.5.1.17.7 = Counter32: 0 enterprises.6618.3.5.1.17.8 = Counter32: 0 enterprises.6618.3.5.1.17.999 = Counter32: 0</pre>