Dell OpenManage<sup>™</sup> Server Administrator Version 5.0

# **SNMP** Reference Guide

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# **Notes and Notices**

**NOTE:** A NOTE indicates important information that helps you make better use of your computer.

**NOTICE:** A NOTICE indicates either potential damage to hardware or loss of data and tells you how to avoid the problem.

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# Introduction

This introduction is divided into two sections. The first section, "Introduction to the SNMP Reference Guide," explains the SNMP Reference Guide design. All essential Simple Network Management Protocol (SNMP) terms are defined in this section. Some of the vocabulary may seem complex and unfamiliar to system administrators who are using SNMP for the first time. SNMP experts can skim this section, and beginners can read the section more carefully.

The second section, "Introduction to the Server Administrator SNMP Subagent," is a more technical introduction to the management information base (MIB) that underlies Server Administrator services.

# Audience

This guide is intended for system administrators, network administrators, and anyone who wants to write SNMP MIB applications to monitor systems.

# What's New in this Release

This section lists changes to the Server Administrator MIBs in this release of Server Administrator.

# What's New in the Instrumentation MIB

- Added Battery Table and Battery Traps.
- Updated Processor Device Table with new attributes.
- Updated Memory Device Table with new attributes.
- Added Network Device Table.

# What's New in the Field Replaceable Unit MIB

Included Field Replaceable Unit (FRU) MIB object to provide support for FRUs from this release.

# What's New in the Storage Management Group MIB

Updated Physical Devices Group tables with new attributes.

# Introduction to the SNMP Reference Guide

This reference guide provides a formatted version of the Server Administrator Instrumentation MIB (filename 10892.mib), the Server Administrator Remote Access MIB (filename dcs3rmt.mib), the Server Administrator Field Replaceable Unit MIB (filename dcs3fru.mib), the Server Administrator Storage Management MIB (filename dcstorag.mib), and the Server Administrator Change Management MIB (filename dcstorag.mib) that are released with the current version of Dell OpenManage™ Server Administrator.

Sections in this guide follow MIB groups and provide explanations and definitions for the terms used to define MIB objects. Content in this reference guide is organized as documented in the following subsections.

# **General Content**

Table 1-1 describes the sections that provide general information about the MIBs documented in this guide.

Section	Topics	MIB Group Number
1	Introduction to SNMP basics and to the MIBs that support Server Administrator services	NA
25	Traps — describes in-band traps defined in the Server Administrator Instrumentation MIB and out-of-band traps sent by the Remote Access Controller (RAC) and Baseboard Management Controller (BMC).	5000
Appendix A	Standard Data Type Definitions — defines standard data types used in this reference guide.	NA
Appendix B	SNMP Sample Output — provides a sample SNMP output.	NA
Glossary	Defines acronyms, abbreviations, and technical terms used in this reference guide.	NA

#### Table 1-1. General Content Sections in This Guide

### Server Administrator Instrumentation MIB

The Server Administrator Instrumentation MIB (filename 10892.mib) provides instrumentation data that allows you to monitor the health of a system with SNMP management applications. It provides:

- Information about the status of temperatures, power supplies, voltages, currents, fans, and memory at key points in the system
- Rapid access to detailed fault and performance information gathered by industry standard systems management agents
- Version information for Basic Input/Output System (BIOS), firmware, and operating system
- A detailed account of every cost of ownership (COO) detail about your system

In addition, traps are sent to report a change in status of the health of critical components.

The Server Administrator Instrumentation MIB structures its MIB objects into groups of scalar objects or MIB tables that provide related information. Table 1-2 describes each Server Administrator Instrumentation MIB group and lists the MIB group number assigned to the MIB group. The Server Administrator Instrumentation MIB groups are identified by the SNMP OID

1.3.6.1.4.1.674.10892.1. *(MIB group number)*, where *(MIB group number)* is the MIB group number assigned to the MIB group. See the relevant section for more information about the MIB objects defined in a MIB group.

Section	Topics	MIB Group Numbers
2	Instrumentation MIB Version Group — defines version numbers of the Instrumentation MIB	1
3	Systems Management Software Group — defines information about the systems management software and the supported systems management standards	100
4	System State Group — defines status, state, and redundancy for a system and its components	200
5	Chassis Information Group — defines chassis types, events, and indicators	300
6	Operating System Group — defines variables for name, version, service pack, and other information about a system's operating system	400
7	System Resource Group — defines variables for input/output ports, memory, interrupts, and direct memory access	500
8	Power Group — defines variables for power units, power supplies, and their current and voltage probes	600
9	Thermal Group — defines variables for temperature probes and cooling devices	700
10	User Security Group — defines variables for creating and modifying user accounts	800
11	Remote Flash BIOS Group — defines variables for updating the system's BIOS remotely	900
12	Port Group — defines variables for major port types such as keyboard, monitor, small computer system interface (SCSI), Universal Serial Bus (USB), and parallel and serial ports	1000
13	Device Group — defines variables for pointing, keyboard, processor, cache, memory, and personal computer interface devices	1100
14	Slot Group — defines variables for the system's slots	1200
15	Memory Group — defines variables for the system's physical memory	1300
16	BIOS Setup Control Group — defines variables for BIOS functions such as boot sequence, speakers, Wake on the local area network (LAN), diskettes, ports, and network interface controllers (NIC)	1400

Table 1-2. Server Administrator Instrumentation MIB Sections in This Guide

Section	Topics	MIB Group Numbers
17	Local Response Agent Group — defines variables for global settings and actions. These variables allow users to predetermine how the system responds to a particular type of event	1500
18	Cost of Ownership Group — defines variables for tracking data on the system's service contract, lease, repair records, trouble tickets, and so on	1600
20	Cluster Group — defines variables for systems that operate as a cluster	1800
21	Baseboard Management Controller Group — provides information about the Baseboard Management Controller (BMC) that may be present in your system. In addition to providing general information about the BMC, this group provides information about the serial and local area network (LAN) interfaces of the BMC	1900
25	Traps — defines the types of alerts that can be sent to report the status of critical components	5000

Table 1-2. Server Administrator Instrumentation MIB Sections in This Guide (continued)

### Server Administrator Remote Access MIB

The Server Administrator Remote Access MIB (filename dcs3rmt.mib) provides in-band information about remote access hardware that may be present in your system.

The Server Administrator Remote Access MIB structures its MIB objects into groups of scalar objects or MIB tables that provide related information. Table 1-3 describes each Server Administrator Remote Access MIB group and lists the MIB group number assigned to the MIB group. The Server Administrator Remote Access MIB groups are identified by the SNMP OID 1.3.6.1.4.1.674.10892.1.<*MIB group number* > where <*MIB group number* > is the MIB group number assigned to the MIB group. See the relevant section for more information about the MIB objects defined in a MIB group.

Table 1-3. Server Administrator Remote Access MIB Sections in This Guide

Section	Торіс	MIB Group Numbers
19	Remote Access Group — provides information about remote access hardware that may be present in your system and defines variables for administrative users, SNMP trap destinations, modem configuration for dial-up networking, dial-in configuration, and dial-out destinations	1700

### Server Administrator Baseboard Management Controller, ASF MIB

The Server Administrator BMC MIB (filename **DcAsfSrv.mib**) provides information about the traps sent by BMC. The Server Administrator BMC MIB structures its MIB objects that provide related information. The BMC MIB groups are identified by the SNMP OID 1.3.6.1.4.1.3183.1.1.<MIB group number> The BMC MIB is adheres to ASF 2.0 standard and hence the enterprise ID is wired for management (3183).

# Server Administrator Field Replaceable Unit MIB

The Server Administrator Field Replaceable Unit MIB (filename dcs3fru.mib) provides information about field replaceable unit (FRU) hardware that may be present in your system.

The Server Administrator Field Replaceable Unit MIB structures its MIB objects into groups of scalar objects or MIB tables that provide related information. Table 1-4 describes each Server Administrator Field Replaceable Unit MIB group and lists the MIB group number assigned to the MIB group. The Server Administrator Field Replaceable Unit MIB groups are identified by the SNMP OID 1.3.6.1.4.1.674.10892.1.<MIB group number> where <MIB group number> is the MIB group number assigned to the MIB group number assigned to the MIB group. See the relevant section for more information about the MIB objects defined in a MIB group.

Section	Торіс	MIB Group Numbers
22	Field Replaceable Unit Group — provides information about field replaceable units that may be present in your system	2000

### Server Administrator Storage Management MIB

The Server Administrator Storage Management MIB (filename **dcstorag.mib**) provides storage management data that allows you to monitor the health of storage resources with SNMP management applications.

Table 1-5 describes each Server Administrator Storage Management MIB group and lists the MIB group number assigned to the MIB group. The Server Administrator Storage Management MIB groups are identified by the SNMP OID 1.3.6.1.4.1.674.

 Table 1-5.
 Server Administrator Storage Management MIB Sections in This Guide

Section	Topics	MIB Group Numbers
23	Storage Management Group — consists of definitions for the following MIB groups:	10893
	Storage Management Group	
	Storage Management Information Group	
	• Global Data Group	
	Physical Devices Group	
	Logical Devices Group	
	Storage Management Event Group	
26	Storage Management Alert Reference — lets you monitor the health of storage resources such as controllers, connectors, array disks, and virtual disks	NA

# Server Administrator Change Management MIB

The Server Administrator Change Management MIB (filename **dellcm.mib**) provides management data that allows you to monitor the inventory of devices and applications with SNMP management applications.

Table 1-6 describes each Server Administrator Change Management MIB group and lists the MIB group number assigned to the MIB group. The Server Administrator Change Management MIB groups are identified by the SNMP OID 1.3.6.1.4.1.674. *<MIB group number>* where *<MIB group number>* is the MIB group number assigned to the MIB group. See the relevant section for more information about the MIB objects defined in a MIB group.

Table 1-6. Server Administrator Change Management MIB Sections in This Guide

Section	Topics	MIB Group Number
24	Change Management Group - describes the inventory data provided by the Change Management MIB that allows users to monitor devices and software that are present on a particular managed computer chassis	10899 t

# How This Guide Defines Technical Terms

The following table provides information about where to find definitions for technical terms in this reference guide.

Type of Definition	See
Basic SNMP vocabulary.	Introduction
MIB-group-specific variable values. MIB-group-specific MIB variables contain links to the tables that define these values in the last section of the section in which these variables are used.	Sections 3, 5, 7, 8, 9, and 11 through 18.
Systems management terms, acronyms, and commonly managed components referred to in this reference guide.	Glossary
Server Administrator-standard data types that specify variable values in this reference guide.	Appendix A, "Standard Data Type Definitions."

# **SNMP Basic Terminology**

It is important to have a good understanding of the key technical terms used in this guide. This guide provides definitions for all essential terms used in describing the Server Administrator MIBs. The Glossary contains definitions for all essential terms and acronyms.

#### **SNMP Master Agent**

Typically, the SNMP agent on a managed system consists of one SNMP master agent and zero or more SNMP extension agents. This SNMP agent extendable structure facilitates the addition of new MIB modules without having to rebuild the entire SNMP agent and is invisible to SNMP management applications.

The SNMP master agent is responsible for receiving SNMP request protocol messages from SNMP management applications and sending SNMP response protocol messages. As part of processing SNMP request protocol messages, the SNMP master agent typically communicates with one or more SNMP extension agents. This communication does not involve standard SNMP protocol messages. The SNMP master agent uses an extension protocol that shields the SNMP extension agent from the standard SNMP protocol messages. The extension protocol also provides a way for SNMP extension agents to send SNMP event notifications (called traps in SNMPv1). The SNMP master agent is also responsible for sending SNMP event notification protocol messages to SNMP management applications.

On supported operating systems, the SNMP master agent is provided with the operating system. For example, on supported Microsoft<sup>®</sup> Windows<sup>®</sup> operating systems, the Windows SNMP service is the SNMP master agent. For information on the versions of the SNMP protocol supported by the SNMP master agent, see the operating system documentation.

#### SNMP Extension Agent

The SNMP extension agent is responsible for registering the MIB objects that it supports with the SNMP master agent and then processing requests from the SNMP master agent for those MIB objects. The SNMP extension agent also initiates event notifications to the SNMP master agent. The SNMP extension agent does not receive or send standard SNMP protocol messages. The SNMP extension agent communicates with the SNMP master agent using an extension protocol defined by the SNMP master agent.

The Server Administrator SNMP subagent is an SNMP extension agent.

#### Managed Object

A managed object is any item in a computer system that can be singled out for discovery, monitoring, or user intervention and correction.



**NOTE:** Not all managed objects described in this guide are supported by all systems.

#### MIB

A MIB acts as a structured road map for managed objects. As an Application Programming Interface (API), a MIB allows systems management tools to retrieve data maintained by an agent. The server administrator MIB is divided into several major groups of managed objects.

#### Variable

A variable is a component of a managed object. A temperature probe, for example, has a variable to describe its capabilities, its health or status, and certain indexes that you can use to locate specific temperature probes. One index for the probe would be the probe's chassis number. Some systems may have multiple chassis—one chassis for the central processing unit and another chassis for storage. A chassis within a system can also have more than one temperature probe. Variables for a temperature probe include its capabilities, status, chassis index, and index.

#### **One-Based Index**

When an index is one-based, counting starts at 1. One-based indexing counts the first instance as 1, the second index as 2, and so on.

#### Zero-Based Index

When an index is zero-based, counting starts at 0. Zero-based indexing counts the first instance as 0, the second index as 1, and so on.

#### Fields

Managed object variables contain fields. In this reference guide, managed object variables have the following fields defined:

Name is the exact string by which the variable is known in the MIB. MIB variables are named according to the following conventions:

- Variable names start with a lowercase letter.
- Spaces are not allowed between words in the variable name.
- Acronyms are in uppercase letters, except when an acronym is the first word in the variable name.
- With the exception of the first letter of the variable name and acronyms, all other words in the variable name start with capital letters.

The following variable names illustrate these conventions:

temperatureProbeLowerCriticalThreshold

coolingUnitIndex

pCIDeviceSpeed

**Object Identifier (OID)** is the unique number assigned to an object defined in a MIB. An OID is written as a sequence of subidentifiers in decimal notation. Each OID in this reference guide has a prefix that identifies the managed objects as belonging to Dell<sup>™</sup>: 1.3.6.1.4.1.674. The additional numbers identify the MIB group and subgroup as well as the table entry number of any variables.

For example, the OID for the temperature probe managed object table is 700.20 and the variable for the location of the temperature probe (temperatureProbeLocationName) has an OID of 700.20.1.8. The full OIDs for these items are 1.3.6.1.4.1.674.10892.1.700.20 for the temperatureProbeTable and 1.3.6.1.4.1.674.10892.1.700.20.1.8 for the temperatureProbeLocation. For more information about the structure of OIDs, see "SNMP MIB OIDs."

Description is a brief explanation of what a particular managed object does.

**Syntax** defines the data type in which the values of the variable must be expressed. Most variables in this reference guide use standard data types such as string or boolean. All data types that are unique to server administrator variables are defined at the end of the section in which they occur. Standard data types are defined in "Standard Data Type Definitions."

Access specifies whether persons with administrative privileges can read but not modify the value of a variable (read only) or can both read and modify the value of a variable (read-write).

# **Frequently Used Terms in Variable Names**

The following terms are frequently used in the name of a MIB variable:

**Capability** refers to the actions an object can perform, or to actions that can be taken by the object. Hot-pluggable is an example of a capability. If a card is hot-pluggable, it can be replaced while a system is running. Capability settings refer to the capabilities of the object that the user can select from and activate if desired. Capability settings allow users of the server administrator to predetermine how an object will behave under specific conditions.

**Settings** are the conditions of a manageable object that determine what happens when a certain value is detected in a component. For example, a user can set the upper critical threshold of a temperature probe to 75 degrees Celsius. If the probe reaches that temperature, the setting causes an alert to be sent to the management console. Some settings, when reached, can trigger a system shutdown or other response to prevent damage to the system.

**State** refers to the condition of an object that has more than one condition. For example, an object may be in a "not ready" or in an "enabled" state.

**Status** refers to the health of an object or how the object is functioning. For example, the status of a temperature probe that is measuring acceptable temperatures would be reported as normal. When the probe begins reading temperatures that exceed limits set by the user, it reports a critical status.

# Tables

This reference guide contains two types of tables: tables that are used to organize and define variable values and tables that define MIB objects. Readers must understand the differences between these two types of tables.

# **SNMP** Tables

Most of the MIB objects defined in this reference guide are organized into SNMP tables. SNMP tables organize data into two-dimensional structural arrays. In SNMP, objects that have a relationship to other objects are called columnar objects. Columnar objects are the type of object used to form lists and tables.

When a MIB group is divided into one or more discrete tables, the word "table" has a technical meaning. An example is the section of this reference guide entitled Universal Unique Identifier (UUID). The UUID object has a type and a value that uniquely identify an object such as a chassis. The table defines all of the variables that comprise the managed object UUID.

The following table is an example of an SNMP table. The table contains variables that must occur in a definite sequence. In the example table the defined variables are UUID Chassis Index, UUID Index, UUID Type, and UUID Value.

#### **Example SNMP Table**

#### UUID Table

These objects comprise the Server Administrator definitions for the UUID.

Name	uUIDTable
Object ID	1.3.6.1.4.1.674.10892.1.300.20
Description	Defines the UUID table.
Syntax	SEQUENCE OF UUIDTableEntry
Access	Not accessible

#### UUID Table Entry

Name	uUIDTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1
Description	Defines the UUID table entry.
Syntax	UUIDTableEntry
Access	Not accessible
Index	uUIDIndex, uUIDchassisIndex

#### UUID Chassis Index

Name	uUIDchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### UUID Index

Name	uUIDIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.2
Description	Defines the index of the UUID in a specified chassis.
Syntax	DellObjectRange
Access	Read-only

#### UUID Type

Name	uUIDType
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.3
Description	Defines the type of the UUID for this chassis.
Syntax	DellUUIDType
Access	Read-only

#### UUID Value

Name	uUIDValue
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.4
Description	Defines the value of the UUID for this chassis.
Syntax	OCTET STRING (SIZE[16])
Access	Read-only

### **Reference Guide Content Tables**

**NOTE:** Variable values are defined for any variable that is Server Administrator-specific. Industry-standard variable definitions are documented in "Standard Data Type Definitions."

Some of the tables in this guide have no technical significance in SNMP. These tables are designed to show information in a readable form. The following table, for example, defines the Server Administrator-specific variable, DellFanControlCapabilities. The table provides the name of the variable, its data type, the values that are valid for the variable, and the meaning of each value.

#### Table 1-8. Example Variable Type Definition Table

Variable Name: DellFanControlCapabilities		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
unknown(1)	The fan's capabilities are unknown.	
lowSpeedCapable(2)	The fan can be set to low speed.	
highSpeedCapable(4)	The fan can be set to high speed.	
lowOrHighSpeedCapable(6)	The fan can be set to low or high speed.	

This type of table is used throughout the reference guide to list and define variable values. Tables that explain Server Administrator-specific variable values are located in the final section of sections that define Server Administrator-specific variables. In the preceding example, the variable name is DellFanControlCapabilities. This variable must be expressed as an integer and has four possible values: unknown, lowSpeedCapable, highSpeedCapable, and lowOrHighSpeed Capable.

### **Section Organization**

.. . . . . .

Sections in this reference guide are based on the Server Administrator MIBs, so the complexity of each section depends on the complexity of each MIB group. The first section provides a high-level introduction to the MIB group. If the group is defined by one or more tables, the second section lists these tables. The third section documents the variables that comprise the group, and if applicable, the variables that comprise the tables. The fourth section contains definitions for any Server Administrator-specific variables that are used in the section. The following example shows the typical content of these four sections.

1 BIOS Setup Control Group

This section explains the purpose of the MIB group and summarizes the major features of the component groups.

2 BIOS Group Tables

If there is more than one SNMP table for a group, this section lists all of the tables. For this BIOS group example, there are eight tables listed. In each section, double-clicking any table on the list takes you to that table.

- BIOS Setup Control Table
- SCSI Control Table
- Parallel Port Control Table
- Serial Port Control Table
- USB Control Table

- IDE Control Table
- Diskette Control Table
- Network Interface Control Table
- **3** Variables that make up each table in the group

This section documents the variables for the eight tables that comprise the BIOS group.

4 BIOS Variable Values

This section explains any Server Administrator-specific variables and data types that are used in this section. In the BIOS group example, there are 17 unique, Server Administrator-specific variable meanings. Information on each Server Administrator-specific variable is presented in a formatted table.

# Other Documents You May Need

In addition to this Server Administrator SNMP Reference Guide, you can find the following guides on your documentation CD:

- The Server Administrator Messages Reference Guide lists the messages that you can receive on your systems management console or on your operating system's event viewer. This guide explains the text, severity, and cause of each message that the server administrator issues.
- Server Administrator CIM Reference Guide documents the Common Information Model (CIM) provider, an extension of the standard management object format (MOF) file. The Server-Administrator provider documents supported classes of management objects.

# Introduction to the Server Administrator SNMP Subagent

This guide provides formatted information drawn primarily from the MIB files written for the Server Administrator services that support the SNMP protocol.

For each of the variables defined in the MIBs, the following fields are specified:

- Variable name
- OID or unique identifying number
- Description
- Data type of the variable (for example: integer, string, octet string)
- Whether the variable is accessible, not accessible, read-only, or read-write
- Index or indexes, if applicable

For each MIB group that has unique variable definitions, tables are included in the last section of the section to explain the meaning of the terms.

Standards for writing MIBs are defined by the Internet Engineering Task Force (IETF). Structure of Management Information (SMI) is a standard that specifies the rules for defining the structure and type of managed objects and events in a MIB. SMIv1 is specified in Request For Comments (RFC) 1155. The Server Administrator MIB conforms to the SMIv1 standard.

SNMP is a systems management standard originally designed for network management. SNMP manages much more than networks. Information Technology (IT) professionals use SNMP for monitoring and managing computer systems and the various components and peripherals supported by their systems.

SNMP standards are defined by the Internet Engineering Task Force (IETF). SNMP version 1 was published in August 1988 and is the most commonly supported version of SNMP. SNMP version 2 was first published in May 1993, but has not gained widespread market acceptance. SNMP version 3 was recently completed and has addressed security issues that exist in version 1.

All SNMP systems consist of one or more managed systems that provide data through an SNMP agent to a management system. The management system provides a user interface to view data from the managed systems. The management system and managed systems communicate over a network (typically through User Datagram Protocol/Internet Protocol [UDP/IP]).

The management system and a managed system communicate by means of a common data schema. SNMP MIB files define the structure, type, and values of the SNMP data. While MIBs can be standardized or enterprise specific, most operating systems supply SNMP agents for the standard MIB-I and MIB-II schemas. MIB-I defines a base set of standard management information for systems implementing the Internet Protocol (IP) suite. MIB-II defines characteristics of the system, characteristics of network interfaces, and characteristics of components of the IP on the system. In addition to the standard MIBs, many hardware vendors have defined MIBs that provide management data specific to their systems and peripheral devices.

Monitored data can be retrieved through SNMP using the Get command. Typically, this command requires the host name or IP address of the target machine as well as the OID of the data to retrieve. Exact details are dependent on the operating system and the development tools being used to create the management application. The Get command has a variant known as GetNext.

# **SNMP MIB OIDs**

Each data class within an MIB is defined by an OID. OIDs are unique across all MIBs. An OID consists of a series of digits separated by periods. The OID functions in a similar fashion to a phone number. The phone number 011-512-471-0000 uniquely identifies a single phone. The phone number can be broken down into a number of components to uniquely identify a phone. The first component, 011, is the country code for the United States. The second component, 512, identifies the area code for central Texas. The third component, 471, is the phone exchange for a large state university in the city of Austin. The final component, 0000, is the main switchboard.

There are two main differences between the phone number example and an actual OID. The first difference is that there are many more components in an OID, up to 128. The combination of these components is called an OID prefix. The second difference is that OIDs support the concept of indexes or keys. The OID prefix specifies the data class but does not specify an instance of the data within the class. Indexes can be used to identify the instances of a data class. These indexes are referred to as the OID suffix.

The assignment of values for each OID prefix component can be illustrated by using a tree structure. The following is an example of an OID assignment:

ROOT

CCITT(0) ISO(1)

ORG(3)

DOD(6)

INTERNET(1)

```
MGMT(2)
```

MIB(1)

EXPERIMENTAL(3)

PRIVATE(4)

ENTERPRISES(1)

DELL(674)

SNMPv2(6)

In the preceding example, the OID prefix for the Dell enterprise would be 1.3.6.1.4.1.674.

The numbers in boldface type show the categories and numbers that apply to Server Administrator. All Server Administrator-defined OIDs consist of 1.3.6.1.4.1.674 followed by additional component values.

### **SNMP Security**

SNMP version 1 has a very limited security mechanism. SNMP agents support the use of a community string, which is configured at each SNMP agent and is passed as a part of all SNMP request messages. There is no verification that the requester is actually a member of the specified community.

Because most system and network management data is not confidential, this limited security is acceptable for Get types of requests. On the other hand, this security is not acceptable for Set types of operations where an SNMP request could power off a system, reconfigure a redundant array of independent disks (RAID) card, and so on. Some vendors have chosen not to support SNMP Set operations for this reason. Server Administrator is able to support SNMP Set operations because its SNMP agents implement a hash/digest mechanism to prevent unauthorized SNMP Set operations. One limitation of this practice is that only server administrator-developed SNMP management applications have the capability to support the hash/digest mechanism.

# **Initiating Management Actions**

Management actions can be performed using the SNMP Set command. These actions can consist of configuring a phone number for the system's owner, rebooting a system, or changing the asset tag of the system. See the previous section, "SNMP Security," for limitations on Set operations.

# **SNMP** Traps

SNMP is frequently used to monitor systems for fault conditions such as temperature violations, hard drive failures, and so on. Management applications can monitor for these conditions by polling the appropriate OIDs with the Get command and analyzing the returned data. This method has its drawbacks. If it is done frequently, significant amounts of network bandwidth can be consumed. If it is done infrequently, the response to the fault condition may not occur in a timely fashion. SNMP traps avoid these limitations of the polling method.

An SNMP trap is an asynchronous event indicating that something significant has occurred. This is analogous to a pager receiving an important message, except that he SNMP trap frequently contains all the information needed to diagnose a fault.

Two drawbacks to SNMP traps are that they are sent using UDP, which is not a guaranteed delivery mechanism, and that they are not acknowledged by the receiver.

An SNMP trap message contains the trap's enterprise OID, the agent IP address, a generic trap ID, the specific trap ID, a time stamp, and zero or more variable bindings (varbinds). The combination of an enterprise OID and a specific trap ID uniquely identifies each Server Administrator-defined trap. A varbind consists of an OID and its value and provides additional information about the trap.

In order for a management system to receive SNMP traps from a managed system, the node must be configured to send traps to the management system. Trap destination configuration is dependent on the operating system. When this configuration is done, a management application on the management system can wait for traps and act on them when received.

For a list of traps supported by the server administrator SNMP subagent, see "Traps."

# **Instrumentation MIB Version Group**

The Instrumentation Management Information Base (MIB) Version Group defines the attributes that identify the version of the Instrumentation MIB supported by the systems management software.

The mIBMajorVersionNumber, mIBMinorVersionNumber, and mIBMaintenanceVersionNumber attributes are scalar objects, meaning that they are not related to other MIB objects and are thus not placed in a table.

Name Object ID	mIBMajorVersionNumber 1.3.6.1.4.1.674.10892.1.1.1.0
Description	Defines the major version number of the version of this MIB supported by the systems management software. For example, if the MIB version is 1.2.3, the major version number is 1.
	A major version number change indicates a major change in object functionality.
Syntax	DellUnsigned8BitRange
Access	Read-only

# **MIB Major Version Number**

# **MIB Minor Version Number**

Name	mIBMinorVersionNumber
Object ID	1.3.6.1.4.1.674.10892.1.1.2.0
Description	Defines the minor version number of the version of this MIB supported by the systems management software. For example, if the MIB version is 1.2.3, the minor version number is 2.
	A minor revision provides additional support for new objects as well as problem fixes.
Syntax	DellUnsigned8BitRange
Access	Read-only

# **MIB Maintenance Version Number**

Name	mIBMaintenanceVersionNumber
Object ID	1.3.6.1.4.1.674.10892.1.1.3.0
Description	Defines the maintenance version number for the version of this MIB supported by the systems management software. For example, if the MIB version is 1.2.3, the maintenance version number is 3.
Syntax	DellUnsigned8BitRange
Access	Read-only

# Systems Management Software Group

The Systems Management Software Group allows users to see information about the standards and software that are supported by the agent of a particular managed computer chassis. The Systems Management Software Group classifies each computer chassis according to the systems management standard that the agent supports.

Additional objects define the universal resource locator (URL) of the systems management software and the language in which systems management information displays. Defining these objects enables users to manage a system using an internet browser. You can access Server Administrator using the secure hypertext transfer protocol (https) and a pre-assigned port number of 1311, or you can specify a port number of your own choosing.



**NOTE:** Using the Software —Server Preferences menu of Server Administrator, you can bind to either one IP address or to all IP addresses.



**NOTE:** To manage a system remotely using Server Administrator, type one of the following in the address field of your browser:

```
https://<systemname>:<1311 or user specified port number>
```

or

```
https://<IP address>:<1311 or user specified port number>
```

To manage a system locally using Server Administrator, type the following in the address field of your browser:

```
https://localhost:<1311 or user-specified port number>
```

# Systems Management Software

The following objects describe the fields for server administrator systems management information. The systems management software variables are scalar objects, meaning that they are not related to other management information base (MIB) objects and are thus not placed in a table.

## Systems Management Software Name

Name	systemManagementSoftwareName
Object ID	1.3.6.1.4.1.674.10892.1.100.1
Description	Defines the systems management software product name.
Syntax	DellString
Access	Read-only

# Systems Management Software Version Number Name

Name	systemManagementSoftwareVersionNumberName
Object ID	1.3.6.1.4.1.674.10892.1.100.2
Description	Defines the version number of the systems management software.
Syntax	DellString
Access	Read-only

# Systems Management Software Build Number

Name	systemManagementSoftwareBuildNumber
Object ID	1.3.6.1.4.1.674.10892.1.100.3
Description	Defines the build number of the systems management software.
Syntax	DellUnsigned16BitRange
Access	Read-only

### Systems Management Software Description Name

Name	systemManagementSoftwareDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.100.4
Description	Defines the description of the systems management software.
Syntax	DellString
Access	Read-only

# Systems Management Software Supported Protocol

Name	systemManagementSoftwareSupportedProtocol	
Object ID	1.3.6.1.4.1.674.10892.1.100.5	
Description	Defines the systems management standards (SNMP or CIM) supported by the systems management software.	
Syntax	SMSSupportedTypes (See Table 3-1.)	
Access	Read-only	

# Systems Management Software Preferred Protocol

Name	systemManagementSoftwarePreferredProtocol	
Object ID	1.3.6.1.4.1.674.10892.1.100.6	
Description	Defines the preferred systems management standard for the systems management software.	
Syntax	SMSSupportedTypes (See Table 3-1.)	
Access	Read-only	

# Systems Management Software Update Level Name

Name	systemManagementSoftwareUpdateLevelName	
Object ID	1.3.6.1.4.1.674.10892.1.100.7	
Description	Defines the update level of the system management software.	
Syntax	DellString	
Access	Read-only	

# Systems Management Software URL Name

Name	systemManagementSoftwareURLName	
Object ID	1.3.6.1.4.1.674.10892.1.100.8	
Description	Defines the universal resource locator (URL) of the systems management software.	
Syntax	DisplayString (SIZE (0255))	
Access	Read-only	

## Systems Management Software Language Name

Name	systemManagementSoftwareLanguageName	
Object ID	1.3.6.1.4.1.674.10892.1.100.9	
Description	Defines the language of the systems management software.	
Syntax	DisplayString (SIZE (0255))	
Access	Read-only	

# Systems Management Software Global Version Name

Name	${\tt system} {\tt Management} {\tt SoftwareGlobalVersion} {\tt Name}$	
Object ID	1.3.6.1.4.1.674.10892.1.100.10	
Description	Defines the global version of the systems management software.	
Syntax	DellString	
Access	Read-only	

# Systems Management Software Feature Flags

Name	systemManagementSoftwareFeatureFlags	
Object ID	1.3.6.1.4.1.674.10892.1.100.11	
Description	Defines the features of the systems management software.	
Syntax	SMSFeatureFlags (See Table 3-2)	
Access	Read-only	

# Systems Management Software SNMP Agent Feature Flags

Name	${\tt system} {\tt Management} {\tt Software} {\tt SNMPAgent} {\tt Feature} {\tt lags}$	
Object ID	1.3.6.1.4.1.674.10892.1.100.12	
Description	Defines the features of the SNMP agent software provided by the operating system.	
Syntax	SMSSNMPAgentFeatureFlags (See Table 3-3)	
Access	Read-only	

# Systems Management Software Manufacturer Name

Name	systemManagementSoftwareManufacturerName	
Object ID	1.3.6.1.4.1.674.10892.1.100.13	
Description	Defines the manufacturer of the systems management software.	
Syntax	DellString	
Access	Read-only	

# Systems Management Software Variable Values

This section includes definitions of server administrator-specific variable values used in this section.

Table 3-1.	Systems Management S	oftware Supported Standards
------------	----------------------	-----------------------------

Variable Name: SMSSupportedTypes		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
supportsSNMP(1)	This system supports SNMP.	
supportsDMI(2)	This system supports DMI.	
<pre>supportsSNMPandDMI(3)</pre>	This system supports SNMP and DMI.	
supportsCIMOM(4)	This system supports CIM.	
supportsSNMPandCIMOM(5)	This system supports SNMP and CIM.	

#### Table 3-2. Systems Management Software Feature Flags

Variable Name: SMSFeatureFlags

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The Systems Management Software features are not enabled.
<pre>webOneToOneManagementPreferred(1)</pre>	The web 1:1 management preferred feature is enabled.

#### Table 3-3. Systems Management Software SNMP Agent Feature Flags

Variable Name: SMSSNMPAgentFeatureFlags

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The Systems Management Software SNMP agent features are not enabled.
<pre>supportsSparseTables(1)</pre>	The SNMP agent supports sparse tables.

# System State Group

The Management Information Base (MIB) variables presented in this section enable you to track various attributes that describe the state of the critical components supported by your system. Components monitored under the System State Group include power supplies, AC power cords, AC power switches, and cooling devices, as well as temperature, fan, amperage, and voltage probes.

# System State Group Table

The System State Group defines objects in the System State MIB table.

# System State Table

The following object sets up the System State Table:

Name	systemStateTable
Object ID	1.3.6.1.4.1.674.10892.1.200.10
Description	Defines the System State Table.
Syntax	SEQUENCE OF SystemStateTableEntry
Access	Not accessible

#### System State Table Entry

Name	systemStateTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1
Description	Defines the System State Table entry.
Syntax	SystemStateTableEntry
Access	Not accessible
Index	systemStatechassisIndex

#### System State Chassis Index

Name	systemStatechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

# System State Global System Status

Name	systemStateGlobalSystemStatus
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.2
Description	Defines the global system status of all chassis being monitored by this instrumentation instance.
Syntax	DellStatus
Access	Read-only

# System State Chassis State

Name	systemStateChassisState
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.3
Description	Defines the system state of this chassis.
Syntax	DellStateSettings
Access	Read-only

# System State Chassis Status

Name	systemStateChassisStatus
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.4
Description	Defines the system status of this chassis.
Syntax	DellStatus
Access	Read-only

# System State Power Unit State Details

Name	systemStatePowerUnitStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.5
Description	Defines the state of all power units in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific power unit. The first byte returned represents the state of the first power unit, the second byte returned represents the state of the second power unit, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Power Unit Status Redundancy

Name	systemStatePowerUnitStatusRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.6
Description	Defines the system status of the power unit(s) in this chassis.
Syntax	DellStatus
Access	Read-only

# System State Power Unit Status Details

Name Object ID	systemStatePowerUnitStatusDetails 1.3.6.1.4.1.674.10892.1.200.10.1.7
Description	Defines the status of all power units in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific power unit. The first byte returned represents the status of the first power unit, the second byte returned represents the status of the status of the second power unit, and so on. The bytes have the same definition type as DellStatusRedundancy.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Power Supply State Details

Name	systemStatePowerSupplyStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.8
Description	Defines the state of all power supplies in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific power supply. The first byte returned represents the state of the first power supply, the second byte returned represents the state of the second power supply, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Power Supply Status Combined

Name	systemStatePowerSupplyStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.9
Description	Defines the status of all power supplies in this chassis.
Syntax	DellStatus
Access	Read-only

#### System State Power Supply Status Details

Name Object ID	systemStatePowerSupplyStatusDetails 1.3.6.1.4.1.674.10892.1.200.10.1.10
Description	Defines the status of all power supplies in this chassis. The results are returned as a binary octet string, Each byte of the octet string represents the status of a specific power supply. The first byte returned represents the status of the first power supply, the second byte returned represents the status of the second power supply, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Voltage State Details

Name	systemStateVoltageStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.11
Description	Defines the state of all voltage probes in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific voltage probe. The first byte returned represents the status of the first voltage probe, the second byte returned represents the status of the second voltage probe, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Voltage Status Combined

Name	systemStateVoltageStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.12
Description	Defines the status of all voltage probes in this chassis.
Syntax	DellStatus
Access	Read-only

# System State Voltage Status Details

Name	systemStateVoltageStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.13
Description	Defines the status of all voltage probes in this chassis.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Amperage State Details

Name	systemStateAmperageStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.14
Description	Defines the state of all current probes in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific current probe. The first byte returned represents the state of the first current probe, the second byte returned represents the state of the second current probe, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Amperage Status Combined

Name	systemStateAmperageStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.15
Description	Defines the status of all amperage probes in this chassis. The result is returned as a combined status value. The value has the same definition type as DellStatus.
Syntax	DellStatus
Access	Read-only

#### System State Amperage Status Details

Name	systemStateAmperageStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.16
Description	Defines the status of all amperage probes in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific amperage probe. The first byte returned represents the status of the first amperage probe, the second byte returned represents the status of the second amperage probe, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Cooling Unit State Details

Name	statesystemStateCoolingUnitStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.17
Description	Defines the state of all cooling units in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific cooling unit. The first byte returned represents the state of the first cooling unit, the second byte returned represents the state of the second cooling unit, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Cooling Unit Status Redundancy

Name	systemStateCoolingUnitStatusRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.18
Description	Defines the state of all cooling units in this chassis.
Syntax	DellStatusRedundancy
Access	Read-only

#### System State Cooling Unit State Details

Name	systemStateCoolingUnitstateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.19
Description	Defines the state of all cooling units in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific cooling unit. The first byte returned represents the state of the first cooling unit, the second byte returned represents the state of the second cooling unit, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Cooling Device State Details

Name	systemStateCoolingDeviceStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.20
Description	Defines the state of all cooling devices in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific cooling device. The first byte returned represents the state of the first cooling device, the second byte returned represents the state of the second cooling device, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Cooling Device Status Combined

Name	systemStateCoolingDeviceStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.21
Description	This attribute defines the cooling device status of all cooling devices in this chassis. The results is returned as a combined status value. The value has the same definition type as DellStatus.
Syntax	DellStatus
Access	Read-only

#### System State Cooling Device Status Details

Name	systemStateCoolingDeviceStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.22
Description	Defines the status of all cooling devices in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific cooling device. The first byte returned represents the status of the first cooling device, the second byte returned represents the status of the second cooling device, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Temperature State Details

Name	systemStateTemperatureStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.23
Description	Defines the state of all temperature probes in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of a specific temperature probe. The first byte returned represents the state of the first temperature probe, the second byte returned represents the status of the second temperature probe, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Temperature Status Combined

Name	systemStateTemperatureStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.24
Description	Defines the status of all temperature probes in this chassis. The result is returned as a combined status value. The value has the same definition type as DellStatus.
Syntax	DellStatus
Access	Read-only

# System State Temperature Status Details

Name	systemStateTemperatureStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.25
Description	Defines the status of all temperature probes in this chassis. The first byte returned represents the status of the first temperature probe, the second byte returned represents the status of the second temperature probe, and so on.
Syntax	OCTET STRING (SIZE(1128)
Access	Read-only

#### System State Memory Device State Details

Name	systemStateMemoryDeviceStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.26
Description	Defines the state of all memory devices in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the state of the specific memory device. The first byte returned represents the state of the first memory device, the second byte returned represents the status of the second memory device, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128)
Access	Read-only

#### System State Memory Device Status Combined

Name	systemStateMemoryDeviceStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.27
Description	Defines the status of all memory devices in this chassis.
Syntax	DellStatus
Access	Read-only

#### System State Memory Device Status Details

Name Object ID	systemStateMemoryDeviceStatusDetails 1.3.6.1.4.1.674.10892.1.200.10.1.28
Description	Defines the status of all memory devices in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific memory device. The first byte returned represents the status of the first memory device, the second byte returned represents the status of the second memory device, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128)
Access	Read-only

# System State Chassis Intrusion State Details

Name	systemStateChassisIntrusionStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.29
Description	Defines the intrusion state of all intrusion detection devices in this chassis. The results are returned as a binary octet string. Each byte of the octet string represents the status of a specific intrusion detection device. The first byte returned represents the status of the first intrusion detection device, the second byte returned represents the status of the second intrusion detection device, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128)
Access	Read-only

# System State Chassis Intrusion Status Combined

Name	systemStateChassisIntrusionStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.30
Description	Defines the intrusion status of all intrusion detection devices in this chassis. The result is returned as a combined status value. The value has the same definition type as DellStatus.
Syntax	DellStatus
Access	Read-only

#### System State Chassis Intrusion Status Details

Name	systemStateChassisIntrusionStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.31
Description	Defines the intrusion status of all intrusion detection devices in this chassis. The first byte returned represents the status of the first intrusion detection device, the second byte returned represents the status of the second intrusion detection device, and so on.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State AC Power Switch State Details

Name	systemStateACPowerSwitchStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.32
Description	Defines the individual state of all AC power switches in this chassis. The first byte returned represents the state of the first AC power switch, the second byte returned represents the state of the second AC power switch, and so on.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

## System State AC Power Switch Status Redundancy

Name	systemStateACPowerSwitchStatusRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.33
Description	Defines the overall redundancy status of the AC power switches in this chassis.
Syntax	DellStatusRedundancy
Access	Read-only

#### System State AC Power Switch Status Details

Name	systemStateACPowerSwitchStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.34
Description	Defines the individual status of all AC power switches in this chassis. The first byte returned represents the status of the first AC power switch, the second byte returned represents the status of the second AC power switch, and so on.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State AC Power Cord State Details

Name	systemStateACPowerCordStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.35
Description	Defines the individual state of all AC power cords for any AC power switches in this chassis. The first byte returned represents the state of the first AC power cord, the second byte returned represents the state of the second AC power cord, and so on.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State AC Power Cord Status Combined

Name	systemStateACPowerCordStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.36
Description	Defines the overall status of all AC power cords for any AC power switches in this chassis.
Syntax	DellStatus
Access	Read-only

#### System State AC Power Cord Status Details

Name	systemStateACPowerCordStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.37
Description	Defines the individual status of all AC power cords for any AC power switches in this chassis. Defines the individual status of all AC power cords for any AC power switches in this chassis. The first byte returned represents the status of the first AC power cord, the second byte returned represents the status of the second AC power cord, and so on.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Redundant Memory Unit State Details

Name	systemStateRedundantMemoryUnitStateDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.38
Description	Defines the state of all redundant memory units in this chassis. The results are returned as a binary octet string, each byte of the octet string represents the state of the specific object. The first byte returned represents the state of the first object, and so on. The bytes have the same definition type as DellStateSettings.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Redundant Memory Unit Status Redundancy

Name	${\tt systemStateRedundantMemoryUnitStatusRedundancy}$
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.39
Description	Defines the overall redundancy status for redundant memory.
Syntax	DellStatusRedundancy
Access	Read-only

# System State Redundant Memory Unit Status Details

Name	systemStateRedundantMemoryUnitStatusDetails
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.40
Description	Defines the status of all redundant memory units in this chassis. The results are returned as a binary octet string, each byte of the octet string represents the status of the specific object. The first byte returned represents the status of the first object, and so on. The bytes have the same definition type as DellStatusRedundancy.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Event Log Status

systemStateEventLogStatus
1.3.6.1.4.1.674.10892.1.200.10.1.41
Defines the overall status of this chassis (ESM) event log.
DellStatus
Read-only

#### System State Power Unit Status Combined

Name	systemStatePowerUnitStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.42
Description	Defines the combined status of all power units of this chassis.
Syntax	DellStatus
Access	Read-only

#### System State Power Unit Status List

Name Object ID	systemStatePowerUnitStatusList 1.3.6.1.4.1.674.10892.1.200.10.1.43
Description	Lists the status of each power unit of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of a power unit. The first byte returned represents the status of the first power unit, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Cooling Unit Status Combined

Name	systemStateCoolingUnitStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.44
Description	Defines the combined status of all cooling units of this chassis.
Syntax	DellStatus
Access	Read-only

#### System State Cooling Unit Status List

Name	systemStateCoolingUnitStatusList
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.45
Description	Lists the status of each cooling unit of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of a cooling unit. The first byte returned represents the status of the first cooling unit, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State AC Power Switch Status Combined

Name	systemStateACPowerSwitchStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.46
Description	Defines the combined status of all AC power switches of this chassis.
Syntax	DellStatus
Access	Read-only

#### System State AC Power Switch Status List

Name Object ID	systemStateACPowerSwitchStatusList 1.3.6.1.4.1.674.10892.1.200.10.1.47
Description	Lists the status of each AC power switch of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of an AC power switch. The first byte returned represents the status of the first AC power switch, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

#### System State Redundant Memory Unit Status Combined

Name	systemStateRedundantMemoryUnitStatusCombined	
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.48	
Description	Defines the combined status of all redundant memory units of this chassis.	
Syntax	DellStatus	
Access	Read-only	

#### System State Redundant Memory Unit Status List

Name	systemStateRedundantMemoryUnitStatusList	
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.49	
Description	Lists the status of each redundant memory unit of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of a redundant memory unit. The first byte returned represents the status of the first redundant memory unit, and so on. The bytes have the same definition type as DellStatus.	
Syntax	OCTET STRING (SIZE(1128))	
Access	Read-only	

#### System State Processor Device Status Combined

Name	systemStateProcessorDeviceStatusCombined	
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.50	
Description	Defines the combined status of all processor devices of this chassis.	
Syntax	DellStatus	
Access	Read-only	

#### System State Processor Device Status List

Name Object ID	systemStateProcessorDeviceStatusList 1.3.6.1.4.1.674.10892.1.200.10.1.51
Description	Lists the status of each processor device of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of a processor device. The first byte returned represents the status of the first processor device, and so on. The bytes have the same definition type as DellStatus.
Syntax	OCTET STRING (SIZE(1128))
Access	Read-only

# System State Battery Status Combined

Name	systemStateBatteryStatusCombined
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.52
Description	Defines the combined status of all batteries of this chassis.
Syntax	DellStatus
Access	Read-only

# System State Battery Status List

Name	systemStateBatteryStatusList	
Object ID	1.3.6.1.4.1.674.10892.1.200.10.1.53	
Description	Lists the status of each battery of this chassis. The results are returned as a binary octet string where each byte of the octet string represents the status of a battery. The first byte returned represents the status of the first battery, and so on. The bytes have the same definition type as DellStatus.	
Syntax	OCTET STRING (SIZE(1128))	
Access	Read-only	

# **Chassis Information Group**

The Chassis Information Group provides information about the type or types of chassis in your system, as well as information about the light-emitting diode (LED) indicators and settings for devices on each chassis. Information is also available about the current date and time displayed on the chassis, intrusion warnings, watchdog timer, systems management basic input/output system (SMBIOS), and so on.

# **Chassis Information Group Tables**

The following management information base (MIB) tables define the objects in the Chassis Information Group:

- Chassis Information Table
- UUID Table
- POST Log Table
- Event Log Table
- System BIOS Table
- Firmware Table
- Intrusion Table
- Baseboard Table

# **Chassis Information Table**

The following object sets up the Chassis Information Table.

Name	chassisInformationTable
Object ID	1.3.6.1.4.1.674.10892.1.300.10
Description	Defines the chassis information table.
Syntax	SEQUENCE OF ChassisInformationTableEntry
Access	Not accessible

# **Chassis Information Table Entry**

Name	chassisInformationTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1
Description	Defines the chassis information table entry.
Syntax	ChassisInformationTableEntry
Access	Not accessible
Index	chassisIndexChassisInformation

#### **Chassis Index Chassis Information**

Name	chassisIndexChassisInformation	
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.1	
Description	Defines the index (one-based) of this chassis. The first chassis will be numbered one.	
Syntax	DellObjectRange	
Access	Read-only	

#### **Chassis State Capabilities**

Name	chassisStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.2
Description	Defines the capabilities of the chassis.
Syntax	DellStateCapabilities
Access	Read-only

#### **Chassis State Settings**

Name	chassisStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.3
Description	Defines the state settings for the chassis.
Syntax	DellStateSettings
Access	Read-write

#### **Chassis Status**

Name	chassisStatus
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.4
Description	Defines the status of the chassis.
Syntax	DellStatus
Access	Read-only

# **Chassis Parent Index Reference**

Name	chassisparentIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.4
Description	Defines the index (one-based) of the parent chassis of this chassis, if any. A zero (0) means that this chassis is the parent of all other chassis managed by the Server Administrator.
Syntax	DellObjectRange
Access	Read-only
Chassis Type	
Name	chassisType
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.6
Description	Defines the chassis type.
Syntax	DellChassisType (See Table 5-2.)
Access	Read-only
Chassis Name	
Name	chassisName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.7
Description	Defines the user-assigned chassis name of the chassis.
Syntax	DellString
Access	Read-write

#### **Chassis Manufacturer Name**

Name	chassisManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.8
Description	Defines the manufacturer's name for this chassis.
Syntax	DellString
Access	Read-only

# **Chassis Model Name**

Name	chassisModelName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.9
Description	Defines the system model type for this chassis.
Syntax	DellString
Access	Read-only

# **Chassis Asset Tag Name**

Name	chassisAssetTagName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.10
Description	Defines the user-assigned asset tag name for this chassis.
Syntax	DisplayString (SIZE (010))
Access	Read-write

# **Chassis Service Tag Name**

Name	chassisServiceTagName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.11
Description	Defines the service tag name for this chassis.
Syntax	DisplayString (SIZE (07))
Access	Read-only

# Chassis ID

Name	chassisID
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.12
Description	Defines the asset tag name for this chassis.
Syntax	DellUnsigned8BitRange
Access	Read-only

# **Chassis ID Extension**

Name	chassisIDExtension
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.13
Description	Defines the SMBIOS machine ID of this chassis.
Syntax	DellUnsigned16BitRange
Access	Read-only

# **Chassis System Class**

Name	chassisSystemClass
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.14
Description	Defines the chassis class of this chassis.
Syntax	DellChassisSystemClass (See Table 5-20.)
Access	Read-only

# **Chassis System Name**

Name	chassisSystemName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.15
Description	Defines the system name of this chassis.
Syntax	DellString
Access	Read-only

# **Chassis System Boot Date Name**

Name	chassisSystemBootDateName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.16
Description	Defines the boot time of this system.
Syntax	DellDateName
Access	Read-only

## **Chassis System Date Name**

Name	chassisSystemDateName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.17
Description	Defines the current time on this system.
Syntax	DellDateName
Access	Read-only

#### **Chassis System Location Name**

Name	chassisSystemLocationName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.18
Description	Defines the user-assigned location for this chassis.
Syntax	DellString
Access	Read-write

## **Chassis System Primary User Name**

Name	chassisSystemPrimaryUserName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.19
Description	Defines the user-assigned primary user name for this chassis.
Syntax	DellString
Access	Read-write

# **Chassis System User Phone Number Name**

Name	chassisSystemUserPhoneNumberName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.20
Description	Defines the user-assigned phone number of the primary user of the system.
Syntax	DellString
Access	Read-write

#### **Chassis Connection Status Unique**

Name	chassisConnectionStatusUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.21
Description	Defines the status of the connection from the system chassis to an expansion chassis.
Syntax	DellConnectionStatus (See Table 5-3.)
Access	Read-only

# **Chassis Fan Control Capabilities Unique**

Name	chassisFanControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.22
Description	Defines the capabilities of the fan control function in this chassis.
Syntax	DellFanControlCapabilities (See Table 5-4.)
Access	Read-only

#### **Chassis Fan Control Settings Unique**

Name	chassisFanControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.23
Description	Defines the readings and settings of the fan control hardware in the chassis.
Syntax	DellFanControlSettings
Access	Read-write

# **Chassis LED Control Capabilities Unique**

Name	chassisLEDControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.24
Description	Defines the capabilities of the LED control function in the chassis.
Syntax	DellLEDControlCapabilities (See Table 5-5.)
Access	Read-only

## **Chassis LED Control Settings Unique**

Name	chassisLEDControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.25
Description	Defines the readings and settings of the LED control hardware in the chassis.
Syntax	DellLEDControlSettings (See Table 5-6.)
Access	Read-write

#### **Chassis Hard-Drive (HD) Fault Clear Control Capabilities**

Name	chassisHDFaultClearControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.26
Description	Specifies whether the chassis allows reset of the chassis hard-drive fault LED.
Syntax	DellHDFaultLEDControlCapabilities (See Table 5-7.)
Access	Read-only

# **Chassis HD Fault Clear Control Settings**

Name	chassisHDFaultClearControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.27
Description	Allows reset of the chassis hard-drive fault LED.
Syntax	DellHDFaultLEDControlSettings (See Table 5-8.)
Access	Read-write

# **Chassis Identify Flash Control Capabilities**

Name	chassisIdentifyFlashControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.28
Description	Specifies whether the chassis front-panel LED can be set to flash.
Syntax	DellChassisIdentifyControlCapabilities (See Table 5-9.)
Access	Read-only

#### **Chassis Identify Flash Control Settings**

Name	chassisIdentifyFlashControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.29
Description	Causes the chassis front-panel LED to flash.
Syntax	DellChassisIdentifyControlSettings (See Table 5-10.)
Access	Read-write

#### **Chassis Lock Present**

Name	chassisLockPresent
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.30
Description	Specifies whether a chassis lock is present on the chassis.
Syntax	DellBoolean
Access	Read-only

## **Chassis Host Control Capabilities Unique**

Name	chassishostControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.31
Description	Defines the capabilities of the host control object.
Syntax	DellHostControlCapabilities (See Table 5-11.)
Access	Read-only

#### **Chassis Host Control Settings Unique**

Name	chassishostControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.32
Description	Defines the current settings of the host control object.
Syntax	DellHostControlSettings (See Table 5-13.)
Access	Read-write

#### **Chassis Watchdog Control Capabilities Unique**

Name	${\tt chassiswatchDogControlCapabilitiesUnique}$
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.33
Description	Defines the capabilities of the watchdog timer object.
Syntax	DellWatchDogControlCapabilities (See Table 5-13.)
Access	Read-only

#### **Chassis Watchdog Control Settings Unique**

Name	chassiswatchDogControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.34
Description	Defines the current settings and the values allowed to be set for the watchdog timer object.
Syntax	DellWatchDogControlCapabilities (See Table 5-13.)
Access	Read-write

# **Chassis Watchdog Control Expiry Time Capabilities Unique**

Name	${\tt chassiswatchDogControlExpiryTimeCapabilitiesUnique}$
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.35
Description	Defines the capabilities of the watchdog expiry timer object.
Syntax	DellWatchDogTimerCapabilities (See Table 5-13.)
Access	Read-only

# **Chassis Watchdog Control Expiry Time**

Name	chassiswatchDogControlExpiryTime	
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.36	
Description	Defines the current reading and allows setting of the nonrecoverable watchdog expiry timer object.	
Syntax	DellUnsigned16BitRange	
Access	Read-write	
Chassis Allow	Set Commands From SNMP	
Name	chassisallowSETCommandsfromSNMP	
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.37	
Description	Specifies whether Simple Network Management Protocol (SNMP) <b>Set</b> type commands are allowed by Server Administrator.	
	This attribute does not reflect whether SNMP Set type commands are allowed by the SNMP master agent.	
Syntax	DellBoolean	
Access	Read-only	
Chassis Powe	r Button Control Capabilities Unique	
Name	chassisPowerButtonControlCapabilitiesUnique	
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.38	
Description	Defines the capabilities of the power button control function.	
Syntax	DellPowerButtonControlCapabilities (See Table 5-16)	
Access	Read-only	
Chassis Power Button Control Settings Unique		
Name	chassisPowerButtonControlSettingsUnique	
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.39	
Description	Defines the current reading and allows setting of the power button control hardware.	
Syntax	DellPowerButtonControlSettings (See Table 5-17)	
Access	Read-write	

#### **Chassis Reseller Name**

Name	chassisResellerName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.40
Description	Defines the name of the chassis reseller.
Syntax	DisplayString (SIZE (0128))
Access	Read-only

## **Chassis Reseller Contact Information Name**

Name	chassisResellerContactInformationName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.41
Description	Defines the chassis reseller contact information name.
Syntax	DisplayString (SIZE (0128))
Access	Read-only

# **Chassis Reseller Product Name**

Name	chassisResellerProductName
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.42
Description	Defines the chassis reseller product name.
Syntax	DisplayString (SIZE (0128))
Access	Read-only

## **Chassis Reseller System ID**

Name	chassisResellerSystemID
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.43
Description	Defines the chassis reseller system ID.
Syntax	DellUnsigned16BitRange
Access	Read-only

#### **Chassis NMI Button Control Capabilities Unique**

Name	chassisNMIButtonControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.44
Description	Defines the capabilities of the NMI button control function.
Syntax	DellNMIButtonControlCapabilities (See Table 5-18)
Access	Read-only

#### **Chassis NMI Button Control Settings Unique**

Name	chassisNMIButtonControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.10.1.45
Description	Defines the current reading and allows setting of the NMI button control hardware.
Syntax	DellNMIButtonControlSettings (See Table 5-19)
Access	Read-write

# **UUID** Table

These objects comprise the server administrator definitions for the Universal Unique Identifier (UUID).

Name	uUIDTable
Object ID	1.3.6.1.4.1.674.10892.1.300.20
Description	Defines the UUID table.
Syntax	SEQUENCE OF UUIDTableEntry
Access	Not accessible

#### **UUID Table Entry**

Name	uUIDTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1
Description	Defines the UUID table entry.
Syntax	UUIDTableEntry
Access	Not accessible
Index	uUIDIndex, uUIDchassisIndex

#### **UUID Chassis Index**

Name	uUIDchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

# **UUID** Index

Name	uUIDIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.2
Description	Defines the index of the UUID in a specified chassis.
Syntax	DellObjectRange
Access	Read-only

# UUID Type

Name	uUIDType
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.3
Description	Defines the type of the UUID for this chassis.
Syntax	DellUUIDType
Access	Read-only

#### **UUID Value**

Name	uUIDValue
Object ID	1.3.6.1.4.1.674.10892.1.300.20.1.4
Description	Defines the value of the UUID for this chassis.
Syntax	OCTET STRING (SIZE(16))
Access	Read-only

# **POST Log Table**

This section defines attributes for the power-on self-test (POST) log. When you turn on your computer, the POST checks various system components before the operating system loads. The POST tests the random-access memory (RAM), the hard drives, and the keyboard, for example. While the POST is running, it makes a log file that system administrators can view. The variables in this section also contribute to managing the POST log.

Name	postLogTable
Object ID	1.3.6.1.4.1.674.10892.1.300.30
Description	Defines the POST Log Table.
Syntax	SEQUENCE OF PostLogTableEntry
Access	Not accessible

#### **POST Log Table Entry**

Name	postLogTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1
Description	Defines the POST Log Table entry.
Syntax	PostLogTableEntry
Access	Not accessible
Index	postLogchassisIndex, postLogRecordIndex

#### **POST Log Chassis Index**

Name	postLogchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **POST Log Record Index**

Name	postLogRecordIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.2
Description	Defines the record number (one-based) of the POST log.
Syntax	DellUnsigned32BitRange
Access	Read-only

# **POST Log State Capabilities Unique**

Name	postLogStateCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.3
Description	Defines the capabilities of the object that is writing the POST log.
Syntax	DellStateCapabilitiesLogUnique
Access	Read-only

#### **POST Log State Settings Unique**

Name	postLogStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.4
Description	Defines the state of the object that is writing the POST log.
Syntax	DellStateSettingsLogUnique
Access	Read-write

# **POST Log Record**

Name	postLogRecord
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.5
Description	Defines the data for the specified chassis and record index in the POST log being returned.
Syntax	DisplayString (SIZE (01024))
Access	Read-only

# **POST Log Format**

Name	postLogFormat
Object ID	1.3.6.1.4.1.674.10892.1.300.30.1.5
Description	Defines format of the POST log.
Syntax	DellLogFormat (See Table 5-1.)
Access	Read-only

# **Event Log Table**

Name	eventLogTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.40
Description	Defines the Event Log Table.
Syntax	SEQUENCE OF EventLogTableEntry
Access	Not accessible

# **Event Log Table Entry**

Name	eventLogTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1
Description	Defines the event Log Table Entry.
Syntax	EventLogTableEntry
Access	Not accessible
Index	eventLogchassisIndex,eventLogRecordIndex

# **Event Log Chassis Index**

Name	eventLogchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

# **Event Log Record Index**

Name	eventLogRecordIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.2
Description	Defines the record index of the event log.
Syntax	DellUnsigned32BitRange
Access	Read-only

# **Event Log State Capabilities Unique**

Name	eventLogStateCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.3
Description	Defines the capabilities of the object that is writing the event log.
Syntax	DellStateCapabilitiesLogUnique
Access	Read-only

# **Event Log State Settings Unique**

Name	eventLogStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.4
Description	Defines the state settings for the object that is writing the event log.
Syntax	DellStateSettingsLogUnique
Access	Read-write

#### **Event Log Record**

Name	eventLogRecord
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.5
Description	Defines the data for the specified chassis and log record index in the event log being returned.
Syntax	DisplayString (SIZE (01024))
Access	Read-only

#### **Event Log Format**

Name	eventLogFormat
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.6
Description	Defines the format of the event log.
Syntax	DellLogFormat (See Table 5-1.)
Access	Read-only

## **Event Log Severity Status**

Name	eventLogSeverityStatus
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.7
Description	Defines the severity of the event log record.
Syntax	DellStatus
Access	Read-only
Status	Mandatory

## **Event Log Date Name**

Name	eventLogDateName
Object ID	1.3.6.1.4.1.674.10892.1.300.40.1.8
Description	Defines the date and time of the event log record.
Syntax	DellDateName
Access	Read-only
Status	Mandatory

## **System BIOS Table**

This table lists objects that define the system's basic input/output system (BIOS).

Name	systemBIOSTable
Object ID	1.3.6.1.4.1.674.10892.1.300.50
Description	Defines the System BIOS Table.
Syntax	SEQUENCE OF SystemBIOSTableEntry
Access	Not accessible

### System BIOS Table Entry

Name	systemBIOSTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1
Description	Defines the System BIOS Table entry.
Syntax	SystemBIOSTableEntry
Access	Not accessible
Index	system BIOS chass is Index, system BIOS Index

## System BIOS Chassis Index

Name	systemBIOSchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## System BIOS Index

Name	systemBIOSIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.2
Description	Defines the index (one-based) of the system BIOS of this object.
Syntax	DellObjectRange
Access	Read-only

## System BIOS State Capabilities

Name	systemBIOSStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.3
Description	Defines the capabilities of the system BIOS of this object.
Syntax	DellStateCapabilities
Access	Read-only

## System BIOS State Settings

Name	systemBIOSStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.4
Description	Defines the state of the system BIOS of this object.
Syntax	DellStateSettings
Access	Read-write

## System BIOS Status

Name	systemBIOSStatus
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.5
Description	Defines the status of the system BIOS of this object.
Syntax	DellStatus
Access	Read-only

## System BIOS Size

Name	systemBIOSSize
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.6
Description	Defines the image size of the system BIOS in kilobytes (KB). A zero (0) indicates that the image size of the BIOS is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## System BIOS Release Date Name

Name	systemBIOSReleaseDateName
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.7
Description	Defines the release date of the system BIOS.
Syntax	DellDateName
Access	Read-only

## System BIOS Version Name

Name	systemBIOSVersionName
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.8
Description	Defines the version name of the system BIOS.
Syntax	DellString
Access	Read-only

## System BIOS Starting Address

Name	systemBIOSStartingAddress
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.9
Description	Defines the starting address of the system BIOS. A zero (0) indicates that the address is unknown.
Syntax	DellUnsigned64BitRange
Access	Read-only

## System BIOS Ending Address

Name	systemBIOSEndingAddress
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.10
Description	Defines the ending address of the system BIOS. A zero (0) indicates that the address is unknown.
Syntax	DellUnsigned64BitRange
Access	Read-only

## System BIOS Manufacturer Name

Name	systemBIOSManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.300.50.1.11
Description	Defines the system BIOS manufacturer's name.
Syntax	DellString
Access	Read-only

#### **System BIOS Characteristics**

Name systemBIOSCharacteristics

**Object ID** 1.3.6.1.4.1.674.10892.1.300.50.1.12

**Description** Defines characteristics of the system BIOS. This attribute is a bit field where a bit has the meaning defined below when set to 1 (one). Bit 63 is the first bit in the value, and bit 0 is the last bit in the value. See the description of DellUnsigned64BitRange at the beginning of this file for more information on the format of the value.

Bits 48-63 need to be examined in the context of the system ID. The system ID is available in the attribute chassisID. If the value for chassisID is non-zero, bits 48-63 have the meaning defined below: Bit Position Meaning if Set

Bit 0	Reserved
Bit 1	Reserved
Bit 2	Unknown
Bit 3	BIOS Characteristics Not Supported
Bit 4	ISA is supported
Bit 5	MCA is supported
Bit 6	EISA is supported
Bit 7	PCI is supported
Bit 8	PC Card (PCMCIA) is supported
Bit 9	Plug and Play is supported
Bit 10	APM is supported
Bit 11	BIOS is Upgradeable (Flash)
Bit 12	BIOS shadowing is allowed
Bit 13	VL-VESA is supported
Bit 14	ESCD support is available
Bit 15	Boot from CD is supported
Bit 16	Selectable Boot is supported
Bit 17	BIOS ROM is socketed
Bit 18	Boot From PC Card (PCMCIA) is supported
Bit 19	EDD (Enhanced Disk Drive) Specification is supported
Bit 20	Int 13h - Japanese Floppy for NEC 9800 1.2mb (3.5 in,
	1k Bytes/Sector, 360 RPM) is supported
Bit 21	Int 13h - Japanese Floppy for Toshiba 1.2mb (3.5 in,
	360 RPM) is supported
Bit 22	Int 13h - 5.25 in / 360 KB Floppy Services are supported
Bit 23	Int 13h - 5.25 in /1.2MB Floppy Services are supported
Bit 24	Int 13h - 3.5 in / 720 KB Floppy Services are supported
Bit 25	Int 13h - 3.5 in / 2.88 MB Floppy Services are supported
Bit 26	Int 5h, Print Screen Service is supported
Bit 27	Int 9h, 8042 Keyboard services are supported
Bit 28	Int 14h, Serial Services are supported

Name	systemBIOSCharacteristics	
Description	Bit Position	Meaning if Set
	Bit 29	Int 17h, Printer Services are supported
	Bit 30	Int 10h, CGA/Mono Video Services are supported
	Bit 31	NEC PC-98
	Bit 32-47	Reserved
	Bit 48	Built-in NIC supports Magic Packet
	Bit 49	System supports Wake-on-LAN
	Bit 50	System supports chassis intrusion
	Bit 51	Built-in NIC supports pattern-matching
	Bit 52	System BIOS supports a 7-character service tag
	Bit 53-63	Reserved
Syntax	DellUnsigne	d64BitRange

## System BIOS Characteristics Ext 1

Name	systemBIC	SCharacteristicsExt1
Object ID	1.3.6.1.4.1.67	74.10892.1.300.50.1.13
Description	Defines additional characteristics of the system basic input/output system (BIOS). This attribute is a bit field where a bit has the meaning defined below when set to 1 (one).	
	Bit Position	Meaning if Set
	Bit 0 Bit 1 Bit 2 Bit 3 Bit 4 Bit 5	ACPI supported USB Legacy is supported AGP is supported I2O boot is supported LS-120 boot is supported ATAPI ZIP Drive boot is supported
	Bit 6	1394 boot is supported
	Bit 7	Smart Battery supported
Syntax	DellUnsigne	d8BitRange
Access	Read-only	

## **System BIOS Characteristics Ext 2**

Name systemBIOSCharacteristicsExt2

**Object ID** 1.3.6.1.4.1.674.10892.1.300.50.1.14

**Description** Defines additional characteristics of the system BIOS. This attribute is a bit field where a bit has the meaning defined below when set to 1 (one).

	Bit Position	Meaning if Set
	Bit 0	BIOS Boot Specification supported
	Bit 1	Function key-initiated Network Service boot supported
	Bit 2	Targeted Content Distribution supported
	Bit 3-7	Reserved
Syntax	DellUnsigned8BitRange	
Access	Read-only	

## **Firmware Table**

Name	firmwareTable
Object ID	1.3.6.1.4.1.674.10892.1.300.60
Description	Defines the Firmware Table.
Syntax	SEQUENCE OF FirmwareTableEntry
Access	Not accessible

#### **Firmware Table Entry**

Name	firmwareTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1
Description	Defines the Firmware Table entry.
Syntax	FirmwareTableEntry
Access	Not accessible
Index	firm ware chassis Index, firm ware Index

## **Firmware Chassis Index**

Name	firmwarechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Firmware Index**

Name	firmwareIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.2
Description	Defines the index (one-based) of the firmware in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Firmware State Capabilities**

Name	firmwareStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.3
Description	Defines the capabilities of the firmware states.
Syntax	DellStateCapabilities
Access	Read-only

## Firmware State Capabilities

Name	firmwareStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.4
Description	Defines the state of the firmware and allows for the setting of the firmware.
Syntax	DellStateSettings
Access	Read-write

## **Firmware Status**

Name	firmwareStatus
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.5
Description	Defines the status of the firmware.
Syntax	DellStateSettings
Access	Read-only

## Firmware Size

Name	firmwareSize
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.6
Description	Defines the image size of the firmware in KB. A zero (0) indicates that the size is unknown.
Syntax	DellUnsigned16BitRange
Access	Read-only

## Firmware Type

Name	firmwareType
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.7
Description	Defines the type of the firmware.
Syntax	DellFirmwareType
Access	Read-only

## Firmware Type Name

Name	firmwareTypeName
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.8
Description	Defines the name of firmware type.
Syntax	DellString
Access	Read-only

## **Firmware Update Capabilities**

Name	firmwareUpdateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.9
Description	Defines the bitmap of supported methods for firmware update.
Syntax	DellUnsigned16BitRange
Access	Read-only

#### **Firmware Date Name**

Name	firmwareDateName
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.10
Description	Defines the date of the firmware.
Syntax	DellDateName
Access	Read-only

### **Firmware Version Name**

Name	firmwareVersionName
Object ID	1.3.6.1.4.1.674.10892.1.300.60.1.11
Description	Defines the version name of the firmware.
Syntax	DellString
Access	Read-only

## **Intrusion Table**

The following objects and attributes describe the different forms of chassis intrusion, a situation that occurs when the cover of a computer is removed.

Name	intrusionTable
Object ID	1.3.6.1.4.1.674.10892.1.300.70
Description	Defines the Intrusion Table.
Syntax	SEQUENCE OF IntrusionTableEntry
Access	Not accessible

## **Intrusion Table Entry**

Name	intrusionTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1
Description	Defines the Intrusion Table entry.
Syntax	IntrusionTableEntry
Access	Not accessible
Index	intrusionchassisIndex, intrusionIndex

## **Intrusion Chassis Index**

Name	intrusionchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## Intrusion Index

Name	intrusionIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.2
Description	Defines the index of the intrusion objects in this subgroup.
Syntax	DellObjectRange
Access	Read-only

## **Intrusion State Capabilities**

Name	intrusionStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.3
Description	Defines the capabilities of the intrusion object.
Syntax	DellStateCapabilities
Access	Read-only

## **Intrusion State Settings**

Name	intrusionStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.4
Description	Defines the settings of the intrusion object.
Syntax	DellStateSettings
Access	Read-write

## **Intrusion Status**

Name	intrusionStatus
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.5
Description	Defines the status of the intrusion object.
Syntax	DellStatus
Access	Read-only

## Intrusion Reading

Name	intrusionReading
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.6
Description	Defines the reading of the intrusion object.
Syntax	DellIntrusionReading
Access	Read-only

## **Intrusion Type**

Name	intrusionType
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.7
Description	Defines the type of the intrusion object.
Syntax	DellIntrusionType
Access	Read-only

## **Intrusion Location Name**

Name	intrusionLocationName
Object ID	1.3.6.1.4.1.674.10892.1.300.70.1.8
Description	Defines the location name of the intrusion object in this subgroup.
Syntax	DellString
Access	Read-only

## **Baseboard Table**

This table lists objects that define the baseboard of a system.

Name	baseBoardTable
Object ID	1.3.6.1.4.1.674.10892.1.300.80
Description	Defines the Baseboard Table.
Syntax	SEQUENCE OF BaseBoardTableEntry
Access	Not accessible

## **Baseboard Table Entry**

Name	baseBoardTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1
Description	Defines the Baseboard Table entry.
Syntax	BaseBoardTableEntry
Access	Not accessible
Index	baseBoardChassisIndex, baseBoardIndex

## **Baseboard Chassis Index**

Name	baseBoardChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

### **Baseboard Index**

Name	baseBoardIndex
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.2
Description	Defines the index (one-based) of the base board.
Syntax	DellObjectRange
Access	Read-only

## **Baseboard State Capabilities**

Name	baseBoardStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.3
Description	Defines the state capabilities of the baseboard.
Syntax	DellStateCapabilities
Access	Read-only

## **Baseboard State Settings**

Name	baseBoardStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.4
Description	Defines the state settings of the baseboard.
Syntax	DellStateSettings
Access	Read-write

## **Baseboard Status**

Name	baseBoardStatus	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.5	
Description	Defines the status of the baseboard.	
Syntax	DellStatus	
Access	Read-only	

## **Baseboard Feature Flags**

Name	baseBoardFeatureFlags	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.6	
Description	Defines the features of the baseboard.	
Syntax	DellBaseBoardFeatureFlags	
Access	Read-only	

## **Baseboard Type**

Name	baseBoardType	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.7	
Description	Defines the type of the baseboard.	
Syntax	DellBaseBoardType	
Access	Read-only	

## **Baseboard Type Name**

Name	baseBoardTypeName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.8	
Description	Defines the name of the type of baseboard.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Location Name**

Name	baseBoardLocationName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.9	
Description	Defines the location name of the baseboard.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Manufacturer Name**

Name	baseBoardManufacturerName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.10	
Description	Defines the baseboard manufacturer's name.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Product Name**

Name	baseBoardProductName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.11	
Description	Defines the baseboard product's name.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Version Name**

Name	baseBoardVersionName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.12	
Description	Defines the baseboard version name.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Service Tag Name**

Name	baseBoardServiceTagName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.13	
Description	Defines the baseboard service tag name.	
Syntax	DellString	
Access	Read-only	

## Baseboard Piece Part ID (PPID) Name

Name	baseBoardPiecePartIDName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.14	
Description	Defines the baseboard PPID.	
Syntax	DellString	
Access	Read-only	

## **Baseboard Asset Tag Name**

Name	baseBoardAssetTagName	
Object ID	1.3.6.1.4.1.674.10892.1.300.80.1.15	
Description	Defines the baseboard asset tag name.	
Syntax	DellString	
Access	Read-only	

## **Chassis Information Group Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

#### Table 5-1. Log Format

Variable Name: DellLogFormat	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
raw(1)	The log is in the format received from the firmware.
ascii(2)	The log is in ASCII format.
uniCode(3)	The log is in Unicode format.

## Table 5-2. Chassis Type

## Variable Name: DellChassisType

Possible Data Values	Meaning of Data Value
other(1)	The chassis type is not one of the following:
unknown(2)	The chassis type is unknown.
desktop(3)	The chassis type is a desktop.
lowProfileDesktop(4)	The chassis type is a low-profile desktop.
pizzaBox(5)	The chassis type is a pizza box.
miniTower(6)	The chassis type is a minitower.
tower(7)	The chassis type is a tower.
portable(8)	The chassis type is a portable.
lapTop(9)	The chassis type is a laptop.
noteBook(10)	The chassis type is a notebook.
handHeld(11)	The chassis type is a handheld.
dockingStation(12)	The chassis type is a docking station.
allInOne(13)	The chassis type is an all-in-one.
subNoteBook(14)	The chassis type is a subnotebook.
<pre>spaceSaving(15)</pre>	The chassis type is a spacesaver.
lunchBox(16)	The chassis type is a lunch box.
mainSystemChassis(17)	The chassis type is the main system chassis.
expansionChassis(18)	The chassis type is an expansion chassis.
subChassis(19)	The chassis type is a subchassis.
busExpansionChassis(20)	The chassis type is a bus-expansion chassis.
peripheralChassis(21)	The chassis type is a peripheral chassis.
raidChassis(22)	The chassis type is a disk RAID chassis.
rackMountChassis(23)	The chassis type is a rack-mounted chassis.
<pre>sealedCasePC(24)</pre>	The chassis type is a sealed-case chassis.
multiSystemChassis(25)	The chassis type is a multisystem chassis.

#### Table 5-3. Connection Status

Variable Name: DellConnectionStatus

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(2)	The status of the chassis connection is unknown.
ok(3)	The status of the chassis connection is OK.
failure(4)	The status of the chassis connection is failure.

### Table 5-4. Fan Control Capabilities

Variable Name: DellFanControlCapabilities	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	The fan's capabilities are unknown.
lowSpeedCapable(2)	The fan can be set to low speed.
highSpeedCapable(4)	The fan can be set to high speed.
lowOrHighSpeedCapable(6)	The fan can be set to low or high speed.

#### Table 5-5. Front-Panel LED Control Capabilities

Variable Name: DellLEDControlCapabilities

Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	The LED control capabilities are unknown.
alertOnErrorCapable(2)	The LED control can be set to alert on an error condition.
alertOnWarningAndErrorCapable(4)	The LED control can be set to alert on an error and a warning condition.
alertOnWarningOrErrorCapable(6)	The LED control can be set to alert on an error or a warning condition.

#### Table 5-6. Front-Panel LED Control Settings

Variable Name: DellLEDControlSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	The LED control setting is unknown.
alertOnError(2)	The LED control is set to alert on an error condition.
alertOnWarningAndError(4)	The LED control is set to alert on an error or a warning condition.

#### Table 5-7. Hard-Drive Fault LED Control Capabilities

Variable Name: DellHDFaultLEDControlCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The hard drive has no fault LED capabilities.
unknownCapabilities(1)	The hard-drive fault LED capabilities are unknown.
enableCapable(2)	The hard-drive fault LED can be disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReadyCapable(4)	The hard-drive fault LED can indicate not ready.
resetCapable(8)	The hard-drive fault LED can be reset.

#### Table 5-8. Hard-Drive Fault LED Control Settings

Variable Name: DellHDFaultLEDControlSettings

Possible Data Values	Meaning of Data Value
none(0)	The LEDs do not have any fault settings capabilities.
unknown(1)	The hard-drive fault LEDs' state is unknown.
enabled(2)	The hard-drive fault LEDs' state is disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReady(4)	The hard-drive fault LEDs' state is not ready.
reset(8)	The hard-drive fault LEDs have been reset.
resetAndEnable(10)	The hard-drive fault LEDs have been reset and enabled.

#### Table 5-9. Chassis Identification Control Capabilities

Variable Name: DellChassisIdentifyControlCapabilities

#### Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The LEDs do not have any chassis identification capabilities.
unknownCapabilities(1)	The chassis identification control's capabilities are unknown.
enableCapable(2)	The chassis identification controls can be disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReadyCapable(4)	The chassis identification control's capabilities are not ready.
identifyCapable(8)	The chassis identification control's LEDs can be made to identify the chassis.

**NOTE:** Chassis identification capabilities allow system administrators to set front panel light-emitting diodes (LEDs) to blink when the chassis has malfunctioning components. When enabled, the blinking lights help administrators locate the problem chassis.

#### Table 5-10. Chassis Identification Control Settings

#### Variable Name: DellChassisIdentifyControlSettings

Possible Data Values	Meaning of Data Value
unknown(1)	The chassis identification control's state is unknown.
enabled(2)	The chassis identification control's state is disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReady(4)	The chassis identification control's state is not ready.
identifyChassis(8)	The chassis identification control's LEDs may be returned to (normal) 0, or (identify chassis) 1.
identifyChassisAndEnable(10)	The chassis identification control's LEDs may be returned to normal (a binary 0 value), or identify chassis and enabled (a binary 1 value).

#### Table 5-11. Host Control Capabilities

Variable Name: DellHostControlCapabilities

#### NOTE: An operator can manually cause these actions using SNMP.

Data Type: Integer

Possible Data Values	Meaning of Data Value
manualRebootCapable(1)	The operator can reboot capable host.
<pre>manualPowerOFFCapable(2)</pre>	The operator can power off capable host.
<pre>manualPowerCycleCapable(4)</pre>	The operator can power-cycle capable host.
<pre>manualAllExceptOperatingSystemShutdown Capable(7)</pre>	The operator can reboot and power off capable host.
manualOperatingSystemShutdownCapable(8)	The operator can shut down the operating-system–shutdown capable host.
<pre>manualFullyCapable(15)</pre>	The operator can reboot, power on and off the power-cycle capable host, and shut down the operating-system–shutdown capable host.

#### Table 5-12. Host Control Settings

Variable Name: DellHostControlSettings

NOTE: An operator can manually cause these actions using SNMP.

Possible Data Values	Meaning of Data Value
manualReboot(1)	The operator can reboot the host.
<pre>manualPowerOFF(2)</pre>	The operator can power off the host.
<pre>manualPowerCycle(4)</pre>	Power cycle the host.
manualOperatingSystemShutdown(8)	The operator can shut down the operating system on the host.
<pre>manualOperatingSystemShutdownThenReboot (9)</pre>	The operator can shut down the operating system on the host then reboot.
manualOperatingSystemShutdownThenPowerOFF (10)	The operator can shut down the operating system on the host then power off machine.
<pre>manualOperatingSystemShutdownThenPower Cycle(12)</pre>	The operator can shut down the operating system on the host then power cycle machine.

#### Table 5-13. Watchdog Control Capabilities

#### Variable Name: DellWatchDogControlCapabilities

**NOTE:** When the system determines that the operating system is not responding, it will automatically perform the selected action without operator intervention.

#### Data Type: Integer

Possible Data Values	Meaning of Data Value
automaticRebootCapable(1)	Watchdog controls can be set to reboot capable host.
<pre>automaticPowerCycleCapable(2)</pre>	Watchdog controls can be set to power cycleable capable host.
automaticNotificationCapable(4)	Watchdog controls can be set to notify capable host.
automaticWatchDogTimerCapable(8)	Watchdog controls can be set to function automatically.
<pre>automaticPowerOffCapable(16)</pre>	Watchdog controls can be set to automatically power off host.
<pre>automaticAllExceptNotificationCap able(27)</pre>	Watchdog controls can be set to automatically perform all functions except notification capable.
automaticFullyCapable(31)	Watchdog controls can be set to automatically perform all functions.

#### Table 5-14. Watchdog Control Settings

#### Variable Name: DellWatchControlSettings

**NOTE:** The watchdog timer is the mechanism used by a chassis to determine if the operating system has stopped responding.

Possible Data Values	Meaning of Data Value
automaticRebootEnabled(1)	Automatic reboot is enabled for this host.
automaticPowerCycleEnabled(2)	Automatic power cycleable is enabled for this host.
automaticNotificationEnabled(4)	Automatic notification is enabled for this host.
automaticPowerOffEnabled(8)	Automatic power off is enabled for this host.

## Table 5-15. Watchdog Timer Capabilities

Variable Name: DellWatchDogTimerCapabilities		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
type1Capable(1)	Watchdog timer can time in intervals from 20-480 seconds.	
type2Capable(2)	Watchdog timer can time in 30-, 60-, 120-, and 480-second intervals.	
type3Capable(4)	Watchdog timer can time in 60-second intervals.	

Table 5-16.	Power Button Control Capabilities	
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Variable Name: DellPowerButtonControlCapabilities	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
none(0)	The power button has no capabilities.
unknownCapabilities(1)	The power button capabilities are unknown.
enableCapable(2)	The power button can be enabled (online) or disabled (offline).

Table 5-17.	Power Button	<b>Control Settings</b>
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Variable Name: DellPowerButtonControlSettings	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
none(0)	The power button has no settings capabilities.
unknown(1)	The power button settings are unknown.
enabled(2)	The power button state is enabled.
disabled(4)	The power button state is disabled.

#### Table 5-18. NMI Button Control Capabilities

#### Variable Name: DellNMIButtonControlCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The NMI button has no capabilities.
unknownCapabilities(1)	The NMI button capabilities are unknown.
enableCapable(2)	The NMI button can be enabled (online) or disabled (offline).

#### Table 5-19. NMI Button Control Settings

Variable Name: DellNMIButtonControlSettings

Data Type: Integer	
Possible Data Values	Meaning of Data Value
none(0)	The NMI button has no settings capabilities.
unknown(1)	The NMI button settings are unknown.
enabled(2)	The NMI button state is enabled.
disabled(4)	The NMI button state is disabled.

#### Table 5-20. Chassis System Class

Variable	Name: DellChassisSystemClass
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Possible Data Values	Meaning of Data Value
other(1)	The chassis system class is not one of the following:
unknown(2)	The chassis system class is unknown.
workstationClass(3)	The chassis system class is a workstation.
serverClass(4)	The chassis system class is a server.
desktopClass(5)	The chassis system class is a desktop.
portableClass(6)	The chassis system class is a portable.
netPCClass(7)	The chassis system class is a "Net PC."
storageClass(8)	The chassis system class is storage.

## Table 5-21. Firmware Type

Variable Name: DellFirmwareType

```
Data Type: Integer
```

Possible Data Values	Meaning of Data Value
other(1)	The firmware type is other than following values.
unknown(2)	The firmware type is unknown.
systemBIOS(3)	The firmware type is System BIOS
<pre>embeddedSystemManagementController(4)</pre>	The firmware type is Embedded System Management Controller.
powerSupplyParallelingBoard(5)	The firmware type is Power Supply Paralleling Board.
systemBackPlane(6)	The firmware type is System (Primary) Backplane.
<pre>powerVault2XXSKernel(7)</pre>	The firmware type is Dell™ PowerVault™ 2XXS Kernel.
powerVault2XXSApplication(8)	The firmware type is PowerVault 2XXS Application.
frontPanel(9)	The firmware type is Front Panel Controller.
baseboardManagementController(10)	The firmware type is Baseboard Management Controller.
hotPlugPCI(11)	The firmware type is Hot Plug Peripheral Component Interconnect (PCI) Controller.
sensorData(12)	The firmware type is Sensor Data Records.
peripheralBay(13)	The firmware type is Peripheral Bay Backplane.
secondaryBackPlane(14)	The firmware type is Secondary Backplane for ESM 2 systems.
secondaryBackPlaneESM3And4(15)	The firmware type is Secondary Backplane for ESM 3 and 4 systems.
rac(16)	The firmware type is Remote Access Controller.

## Table 5-22. Baseboard Type

Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	The baseboard type is unknown.
other(2)	The baseboard type is not one of the following types.
serverBlade(3)	The baseboard type is a server blade.
connectivitySwitch(4)	The baseboard type is a connectivity switch.
<pre>systemManagementModule(5)</pre>	The baseboard type is a system management module.
processorModule(6)	The baseboard type is a processor module.
ioModule(7)	The baseboard type is an I/O module.
memoryModule(8)	The baseboard type is a memory module
daughterBoard(9)	The baseboard type is a daughter board.
motherboard(10)	The baseboard type is a mother board.
processorMemoryModule(11)	The baseboard type is a processor or memory module
processorIOModule(12)	The baseboard type is a processor or I/O module
interconnectBoard(13)	The baseboard type is an interconnect board.

Variable Name: DellBaseBoardType

#### Table 5-23. Baseboard Feature Flags

Variable Name: DellBaseBoardFeatureFlags		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
<b>NOTE:</b> These values are bit fields, so combination values are possible.		
no features(0)	This baseboard has no feature flags.	
boardIsHostingBoard(1)	This baseboard is a hosting board.	
boardRequiresDaughterBoard(2)	This baseboard requires at least one daughter board or auxiliary card.	
boardIsRemovable(4)	This baseboard is removable.	
boardIsReplaceable(8)	This baseboard is replaceable.	
<pre>boardIsHotSwappable(16)</pre>	This baseboard is hot swappable.	

# **Operating System Group**

The Operating System Group provides status and identifying information about a system's operating system. Identifying information includes the name, version, service pack, and patch level of the installed operating system.

## **Operating System Group Table**

The following management information base (MIB) tables define the objects in the Operating System Group:

- Operating System Table
- Operating System Memory Table

## **Operating System Table**

The following object sets up the Operating System Table.

Name	operatingSystemTable
Object ID	1.3.6.1.4.1.674.10892.1.400.10
Description	Defines the Operating System Table.
Syntax	SEQUENCE OF OperatingSystemTableEntry
Access	Not accessible

## **Operating System Table Entry**

Name	operatingSystemTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1
Description	Defines the Operating System Table entry.
Syntax	OperatingSystemTableEntry
Access	Not accessible
Index	operatingSystemchassisIndex

## **Operating System State Capabilities**

Name	operatingSystemStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.2
Description	Defines the capabilities of the operating system.
Syntax	DellStateCapabilities
Access	Read-only

## **Operating System State Settings**

Name	operatingSystemStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.3
Description	Defines the state of the operating system.
Syntax	DellStateSettings
Access	Read-write

## **Operating System Status**

Name	operatingSystemStatus
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.4
Description	Defines the status of the operating system.
Syntax	DellStatus
Access	Read-only

## **Operating System Is Primary**

Name	operatingSystemIsPrimary
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.5
Description	Specifies whether this operating system is the primary operating system.
Syntax	DellBoolean
Access	Read-only

## **Operating System Name**

Name	operatingSystemOperatingSystemName
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.6
Description	Defines the name of the operating system running on the system.
Syntax	DellString
Access	Read-only

## **Operating System Version Name**

Name	operatingSystemOperatingSystemVersionName
Object ID	1.3.6.1.4.1.674.10892.1.400.10.1.7
Description	Defines the version of the operating system running on the system.
Syntax	DellString
Access	Read-only

## **Operating System Memory Table**

Name	operatingSystemMemoryTable
Object ID	1.3.6.1.4.1.674.10892.1.400.20
Description	Defines the Operating System Memory Table.
Syntax	SEQUENCE OF OperatingSystemMemoryTableEntry
Access	Not accessible

## **Operating System Memory Table Entry**

Name	operatingSystemTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1
Description	Defines the Operating System Memory Table entry.
Syntax	OperatingSystemMemoryTableEntry
Access	Not accessible
Index	operatingSystemMemorychassisIndex

## **Operating System Memory Chassis Index**

Name	operatingSystemMemorychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellStateCapabilities
Access	Read-only

## **Operating System Memory State Capabilities**

Name	operatingSystemMemoryStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.2
Description	Defines the capabilities of the operating system memory.
Syntax	DellStateCapabilities
Access	Read-only

## **Operating System Memory State Settings**

Name	operatingSystemMemoryStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.3
Description	Defines the state and allows the setting of the operating system memory.
Syntax	DellStateSettings
Access	Read-write

## **Operating System Memory Status**

Name	operatingSystemMemoryStatus
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.4
Description	Defines the status of the operating system memory.
Syntax	DellStatus
Access	Read-only

## **Operating System Total Physical Size**

Name	operatingSystemMemoryTotalPhysicalSize
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.5
Description	Defines the total physical memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Operating System Memory Available Physical Size**

Name	$operating {\tt System} {\tt Memory} {\tt Availble Physical Size}$
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.6
Description	Defines the available physical memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Operating System Memory Total Page File Size**

Name	operatingSystemMemoryTotalPageFileSize
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.7
Description	Defines the total page file memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-on

## **Operating System Memory Available Page File Size**

Name	operatingSystemMemoryAvailblePageFileSize
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.8
Description	Defines the available page file memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Operating System Memory Total Virtual Size**

Name	operatingSystemMemoryTotalVirtualSize
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.9
Description	Defines the total virtual memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Operating System Memory Available Virtual Size**

Name	${\tt operatingSystemMemoryAvailableVirtualSize}$
Object ID	1.3.6.1.4.1.674.10892.1.400.20.1.10
Description	Defines the available virtual memory size in bytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

# System Resource Group

The Management Information Base (MIB) variables presented in this section enable you to track various attributes of your system resources. This section includes System Resource Group Tables that track variables such as the owner, ports, system memory, interrupts, and direct memory access.

## System Resource Group Tables

The following MIB tables define objects for the System Resource Group:

- System Resource Map Table
- System Resource Owner Table
- System Resource Input/Output (I/O) Port Table
- System Resource Memory Table
- System Resource Interrupt Table
- System Resource Direct Memory Access (DMA) Table

## System Resource Map Table

Name	systemResourceMapTable
Object ID	1.3.6.1.4.1.674.10892.1.500.10
Description	Defines the System Resource Map Table.
Syntax	SEQUENCE OF SystemResourceMapTableEntry
Access	Not accessible

## System Resource Map Table Entry

Name	systemResourceMapTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1
Description	Defines the System Resource Map Table entry.
Syntax	SystemResourceMapTableEntry
Access	Not accessible
Index	system Resource Map chassis Index, system Resource Map Index

## System Resource Map Chassis Index

Name	systemResourceMapChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## System Resource Map Index

Name	systemResourceMapIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.2
Description	Defines the index of system resource maps in this chassis.
Syntax	DellObjectRange
Access	Read-only

## System Resource Map State Capabilities

Name	systemResourceMapStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.3
Description	Defines the capabilities of this system map.
Syntax	DellStateCapabilities
Access	Read-only

## System Resource Map State Settings

Name	systemResourceMapStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.4
Description	Defines the state and allows the setting of this system map.
Syntax	DellStateSettings
Access	Read-write

# System Resource Map Status

Name	systemResourceMapStatus
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.5
Description	Defines the status of this system map.
Syntax	DellStatus
Access	Read-only

# System Resource Map Type

Name	systemResourceMapType
Object ID	1.3.6.1.4.1.674.10892.1.500.10.1.6
Description	Defines the type of this system map.
Syntax	DellSystemResourceMapType (See Table 7-1.)
Access	Read-only

# System Resource Owner Table

Name	systemResourceOwnerTable
Object ID	1.3.6.1.4.1.674.10892.1.500.20
Description	Defines the System Resource Owner Table.
Syntax	SEQUENCE OF SystemResourceOwnerTableEntry
Access	Not accessible

### System Resource Owner Table Entry

Name	systemResourceOwnerTable
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1
Description	Defines the System Resource Owner Table entry. Variables in this group reference the System Resource Map index.
Syntax	SystemResourceOwnerTableEntry
Access	Not accessible
Index	system Resource Owner chassis Index, system Resource Owner Index

# System Resource Owner Chassis Index

Name	systemResourceOwnerchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource Owner Index

Name	systemResourceOwnerIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.2
Description	Defines the index of system resource owners for this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource Owner State Capabilities

Name	systemResourceOwnerStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.3
Description	Defines the capabilities of this system resource owner.
Syntax	DellStateCapabilities
Access	Read-only

#### System Resource Owner State Settings

Name	systemResourceOwnerStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.4
Description	Defines the state settings of this system resource owner.
Syntax	DellStateSettings
Access	Read-write

#### System Resource Owner Status

Name	systemResourceOwnerStatus
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.5
Description	Defines the status of this system resource owner.
Syntax	DellStatus
Access	Read-write

#### System Resource Owner Interface Type

Name	systemResourceOwnerInterfaceType
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.6
Description	Defines the interface type for this system resource owner.
Syntax	DellResourceOwnerInterfaceType (See Table 7-2.)
Access	Read-only

#### System Resource Map Index Reference

Name	systemResourceMapIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.7
Description	Defines the index to the associated system resource map in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource Owner Description Name

Name	systemResourceOwnerDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.8
Description	Defines the description name of the system resource owner.
Syntax	DellString
Access	Read-only

#### System Resource Owner Interface Instance

Name	systemResourceOwnerInterfaceInstance
Object ID	1.3.6.1.4.1.674.10892.1.500.20.1.9
Description	Defines the associated system resource owner interface instance in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource Input/Output (I/O) Port Table

Name	systemResourceIOPortTable
Object ID	1.3.6.1.4.1.674.10892.1.500.30
Description	Defines the System Resource I/O Port Table.
Syntax	SEQUENCE OF SystemResourceIOPortTableEntry
Access	Not accessible

#### System Resource I/O Port Table Entry

Name	systemResourceIOPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1
Description	Defines the System Resource I/O Port Table entry.
Syntax	SystemResourceIOPortTableEntry
Access	Not accessible
Index	system Resource IOP ortchass is Index, system Resource IOP ortIndex

#### System Resource I/O Port Chassis Index

Name	systemResourceIOPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource I/O Port Index

Name	systemResourceIOPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.2
Description	Defines the index (one-based) of the system resource I/O ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource I/O Port State Capabilities

Name	systemResourceIOPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.3
Description	Defines the capabilities of the system resource I/O port.
Syntax	DellStateCapabilities
Access	Read-only

# System Resource I/O Port State Settings

Name	systemResourceIOPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.4
Description	Defines the state and allows the setting of the system resource I/O port.
Syntax	DellStateSettings
Access	Read-write

#### System Resource I/O Port Status

systemResourceIOPortStatus
1.3.6.1.4.1.674.10892.1.500.30.1.5
Defines the status of the system resource I/O port.
DellStateSettings
Read-only

#### System Resource I/O Port Owner Index Reference

Name	systemResourceIOPortOwnerIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.6
Description	Defines the index to the associated system resource owner in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource I/O Port Share Disposition

Name	systemResourceIOPortShareDisposition
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.7
Description	Defines the share disposition of the system resource I/O port.
Syntax	DellResourceShareDisposition (See Table 7-3.)
Access	Read-only

#### System Resource I/O Port Starting Address

Name	systemResourceIOPortStartingAddress
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.8
Description	Defines the 64 bits of the starting address of the system resource I/O port.
Syntax	DellUnsigned64BitRange
Access	Read-only

#### System Resource I/O Port Ending Address

Name	systemResourceIOPortEndingAddress
Object ID	1.3.6.1.4.1.674.10892.1.500.30.1.9
Description	Defines the 64 bits of the ending address of the system resource I/O port.
Syntax	DellUnsigned64BitRange
Access	Read-only

# System Resource Memory Table

Name	systemResourceMemoryTable
Object ID	1.3.6.1.4.1.674.10892.1.500.40
Description	Defines the System Resource Memory Table.
Syntax	SEQUENCE OF SystemResourceMemoryTableEntry
Access	Not accessible

# System Resource Memory Table Entry

Name	systemResourceMemoryTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1
Description	Defines the System Resource Memory Table entry.
Syntax	SystemResourceMemoryTableEntry
Access	Not accessible
Index	systemResourceMemorychassisIndex, systemResourceMemoryIndex

#### System Resource Memory Chassis Index

Name	systemResourceMemorychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource Memory Index

Name	systemResourceMemoryIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.2
Description	Defines the index of system resource memory in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource Memory State Capabilities

Name	systemResourceMemoryStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.3
Description	Defines the capabilities of this system resource memory.
Syntax	DellObjectRange
Access	Read-only

#### System Resource Memory State Settings

Name	systemResourceMemoryStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.4
Description	Defines the state of this system resource memory.
Syntax	DellObjectRange
Access	Read-write

#### System Resource Memory Status

Name	systemResourceMemoryStatus
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.5
Description	Defines the status of this system resource memory.
Syntax	DellStatus
Access	Read-only

#### System Resource Memory Owner Index Reference

Name	systemResourceMemoryOwnerIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.6
Description	Defines the index to the associated system resource owner in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource Memory Share Disposition

Name	systemResourceMemoryShareDisposition
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.7
Description	Defines the share disposition of the system resource memory.
Syntax	DellResourceShareDisposition (See Table 7-3.)
Access	Read-only

#### System Resource Memory Starting Address

Name	systemResourceMemoryStartingAddress
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.8
Description	Defines the 64 bits of the starting address of the system resource memory.
Syntax	DellUnsigned64BitRange
Access	Read-only

#### System Resource Memory Ending Address

Name	systemResourceMemoryEndingAddress
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.9
Description	Defines the 64 bits of the ending address of the system resource memory.
Syntax	DellUnsigned64BitRange
Access	Read-only

# System Resource Memory Flags

Name	systemResourceMemoryFlags
Object ID	1.3.6.1.4.1.674.10892.1.500.40.1.10
Description	Defines the permission flags for the system resource memory.
Syntax	DellResourceMemoryFlags (See Table 7-4.)
Access	Read-only

# System Resource Interrupt Table

Name	systemResourceInterruptTable
Object ID	1.3.6.1.4.1.674.10892.1.500.50
Description	Defines the System Resource Interrupt Table.
Syntax	SEQUENCE OF SystemResourceInterruptTableEntry
Access	Not accessible

# System Resource Interrupt Table Entry

Name	systemResourceInterruptTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1
Description	Defines the System Resource Interrupt Table entry.
Syntax	SystemResourceInterruptTableEntry
Access	Not accessible
Index	systemResourceInterruptchassisIndex, systemResourceInterruptIndex

# System Resource Interrupt Chassis Index

Name	systemResourceInterruptchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Not accessible

#### System Resource Interrupt Index

Name	systemResourceInterruptIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.2
Description	Defines the index (one-based) of this interrupt resource.
Syntax	DellObjectRange
Access	Read-only

# System Resource Interrupt State Capabilities

Name	systemResourceInterruptStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.3
Description	Defines the capabilities of this system resource interrupt.
Syntax	DellStateCapabilities
Access	Read-only

#### System Resource Interrupt State Settings

Name	systemResourceInterruptStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.4
Description	Defines the state of this system resource interrupt.
Syntax	DellStateSettings
Access	Read-write

#### System Resource Interrupt Status

Name	systemResourceInterruptStatus
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.5
Description	Defines the status of this system resource interrupt.
Syntax	DellStatus
Access	Read-only

#### System Resource Interrupt Owner Index Reference

Name	systemResourceInterruptOwnerIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.6
Description	Defines the index for the associated system resource owner in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource Interrupt Owner Share Disposition

Name	systemResourceInterruptShareDisposition
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.7
Description	Defines the share disposition of the system resource interrupt.
Syntax	DellResourceShareDisposition (See Table 7-3.)
Access	Read-only

#### System Resource Interrupt Level

Name	systemResourceInterruptLevel
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.8
Description	Defines the interrupt request (IRQ) level of the system resource interrupt.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### System Resource Interrupt Type

Name	systemResourceInterruptType
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.9
Description	Defines the interrupt type of the system resource interrupt.
Syntax	DellResourceInterruptType (See Table 7-5.)
Access	Read-only

#### System Resource Interrupt Trigger

Name	systemResourceInterruptTrigger
Object ID	1.3.6.1.4.1.674.10892.1.500.50.1.10
Description	Defines the interrupt trigger of the system resource interrupt.
Syntax	DellResourceInterruptTrigger (See Table 7-6.)
Access	Read-only

# System Resource Direct Memory Access (DMA) Table

Name	systemResourceDMATable
Object ID	1.3.6.1.4.1.674.10892.1.500.60
Description	Defines the System Resource DMA Table.
Syntax	SEQUENCE OF SystemResourceDMATableEntry
Access	Not accessible

# System Resource DMA Table Entry

Name	systemResourceDMATable
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1
Description	Defines the System Resource DMA Table entry.
Syntax	SystemResourceDMATableEntry
Access	Not accessible
Index	system Resource DMA chassis Index, system Resource DMA Index

# System Resource DMA Chassis Index

Name	systemResourceDMAchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Resource DMA Index

Name	systemResourceDMAIndex
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.2
Description	Defines the index of system resource DMAs in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource DMA State Capabilities

Name	systemResourceDMAStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.3
Description	Defines the capabilities of this system resource DMA.
Syntax	DellStateCapabilities
Access	Read-only

#### System Resource DMA State Settings

Name	systemResourceDMAStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.4
Description	Defines the state and setting of this system resource DMA.
Syntax	DellStateSettings
Access	Read-write

#### System Resource DMA Status

Name	systemResourceDMAStatus
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.5
Description	Defines the status of this system resource DMA.
Syntax	DellStatus
Access	Read-only

#### System Resource DMA Owner Index Reference

Name	systemResourceDMAOwnerIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.6
Description	Defines the index to the associated system resource owner in this chassis.
Syntax	DellObjectRange
Access	Read-only

# System Resource DMA Share Disposition

Name	systemResourceDMAShareDisposition
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.7
Description	Defines the share disposition of the system resource DMA.
Syntax	DellResourceShareDisposition (See Table 7-3.)
Access	Read-only

#### System Resource DMA Maximum Transfer Size

Name	systemResourceDMAMaximumTransferSize
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.8
Description	Defines the maximum size of a memory transfer in bytes for the system resource DMA.
Syntax	DellUnsigned32BitRange
Access	Read-only

# System Resource DMA Transfer Width

Name	systemResourceDMATransferWidth
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.9
Description	Defines the transfer width of the system resource DMA.
Syntax	DellResourceDMATransferWidth (See Table 7-8.)
Access	Read-only

# System Resource DMA Bus Master

Name	systemResourceDMABusMaster
Object ID	1.3.6.1.4.1.674.10892.1.500.60.1.10
Description	Defines the bus mastering capabilities of the system resource DMA.
Syntax	DellResourceDMABusMaster (See Table 7-7.)
Access	Read-only

# System Resource Group Variable Values

This section includes definitions for server administrator-specific variable values used in this section.

Variable Name: DellSystemResourceMapType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
other(1)	The system resource map type is not one of the following:
unknown(2)	The system resource map type is unknown (not known or not monitored).
typeOne(3)	The system resource map is type 1 (one).

#### Table 7-1. System Resource Map Type

#### Table 7-2. Resource Owner Interface Type

Variable Name: DellResourceOwnerInterfaceType

Data Type: Integer

Possible Data Values	Meaning of Data Value
typeIsOther(1)	The interface type is not one of the following:
typeIsUnknown(2)	The interface type is unknown.
typeIsInternal(3)	The interface type is internal.
typeIsISA(4)	The interface type is an Industry Standard Architecture (ISA) bus.
typeIsEISA(5)	The interface type is an Extended Industry Standard Architecture (EISA) bus.
typeIsMCA(6)	The interface type is a microchannel architecture (MCA) bus.
typeIsTurboChannel(7)	The interface type is a turbo-channel bus.

#### Table 7-3. Resource Share Disposition

Variable Name: DellResourceShareDisposition

Data Type: Integer

Possible Data Values	Meaning of Data Value
shareIsOther(1)	The share disposition is not one of the following:
shareIsUnknown(2)	The share disposition is unknown (not known or not monitored).
<pre>shareIsDeviceExclusive(3)</pre>	The share disposition is device exclusive.
<pre>shareIsDriverExclusive(4)</pre>	The share disposition is driver exclusive.
shareIsShared(5)	The share disposition is shared.

#### Table 7-4. Resource Memory Flags

Data Type: Integer

Possible Data Values	Meaning of Data Value
memoryIsReadOnly(1)	The resource memory is read-only.
<pre>memoryIsWriteOnly(2)</pre>	The resource memory is write-only.
<pre>memoryIsPreFetchable(4)</pre>	The resource memory is prefetchable.
<pre>memoryIsCombinedWritable(8)</pre>	The resource memory is read-write.
memoryIsF24(16)	The resource memory is F24.

#### Table 7-5. Resource Interrupt Type

Variable Name: DellResourceInterruptType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
interruptIsLevelSensitive(1)	The interrupt type is level sensitive.
interruptIsLatched(2)	The interrupt type is latched.

#### Table 7-6. Resource Interrupt Trigger

Variable Name: DellResourceInterruptTrigger

Data Type: Integer

Possible Data Values	Meaning of Data Value
interruptIsActiveWhenLow(1)	The interrupt trigger is active on a low signal.
interruptIsActiveWhenHigh(2)	The interrupt trigger is active on a high signal.

#### Table 7-7. Resource DMA Bus Master

Variable Name: DellResourceDMABusMaster	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
dmaIsOther(1)	The DMA bus master capability is not one of the following:
dmaIsUnknown(2)	The DMA bus master capability is unknown.
dmaIsNotABusmaster(3)	The DMA does not have bus master capability.

#### Table 7-8. Resource DMA Transfer Width

Variable Name: DellResourceDMATransferWidth

Data Type: Integer

Possible Data Values	Meaning of Data Value
dmaTransferWidthIsOther(1)	The DMA transfer width is not one of the following:
dmaTransferWidthIsunknown(2)	The DMA transfer width is unknown.
dmaTransferWidthIs8Bits(3)	The DMA transfer width is 8 bits.
dmaTransferWidthIs16Bits(4)	The DMA transfer width is 16 bits.
dmaTransferWidthIs32Bits(5)	The DMA transfer width is 32 bits.
dmaTransferWidthIs64Bits(6)	The DMA transfer width is 64 bits.
dmaTransferWidthIs128Bits(7)	The DMA transfer width is 128 bits.

# **Power Group**

The Power Group provides information about power units (a group of power supplies in a system chassis), power supplies, and voltage and amperage probes.

# **Power Group Tables**

The following management information base (MIB) tables define objects for the Power Group:

- Power Unit Table
- Power Supply Table
- Voltage Probe Table
- Amperage Probe Table
- AC Power Switch Table
- AC Power Cord Table
- Battery Table

# **Power Unit Table**

Name	powerUnitTable
Object ID	1.3.6.1.4.1.674.10892.1.600.10
Description	Defines the Power Unit Table.
Syntax	PowerUnitTableEntry
Access	Not accessible

# **Power Unit Table Entry**

Name	powerUnitTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1
Description	Defines the Power Unit Table entry.
Syntax	DellObjectRange
Access	Read-only
Index	powerUnitchassisIndex, powerUnitIndex

# **Power Unit Chassis Index**

Name	powerUnitchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Power Unit Index**

Name	powerUnitIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.2
Description	Defines the index of the power unit in this chassis.
Syntax	DellObjectRange
Access	Read-only

# **Power Unit State Capabilities**

Name	powerUnitStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.3
Description	Defines the capabilities of the power unit.
Syntax	DellStateCapabilities
Access	Read-only

# **Power Unit State Settings**

Name	powerUnitStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.4
Description	Defines the state and settings of the power unit.
Syntax	DellStateSettings
Access	Read-write

# **Power Unit Redundancy Status**

Name	powerUnitRedundancyStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.5
Description	Defines the redundancy status of the power unit.
Syntax	DellStatusRedundancy
Access	Read-only

# Power Supply Count for Redundancy

Name	powerSupplyCountForRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.6
Description	Defines the total number of power supplies required for this power unit to have redundancy.
Syntax	DellString
Access	Read-only

## **Power Unit Name**

Name	powerUnitName
Object ID	1.3.6.1.4.1.674.10892.1.600.10.1.7
Description	Defines the name of the power unit in this chassis.
Syntax	DellString
Access	Read-only

#### **Power Unit Status**

powerUnitStatus
1.3.6.1.4.1.674.10892.1.600.10.1.8
Defines the status of the power unit in this chassis.
DellStatus
Read-only

# **Power Supply Table**

Name	powerSupplyTable
Object ID	1.3.6.1.4.1.674.10892.1.600.12
Description	Defines the Power Supply Table.
Syntax	PowerSupplyTableEntry
Access	Not accessible

# **Power Supply Table Entry**

Name	powerSupplyTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1
Description	Defines the Power Supply Table entry.
Syntax	PowerSupplyTableEntry
Access	Not accessible
Index	powerSupplychassisIndex, powerSupplyIndex

# **Power Supply Chassis Index**

Name	powerSupplychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Power Supply Index**

Name	powerSupplyIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.2
Description	Defines the index of power supply.
Syntax	DellObjectRange
Access	Read-only

# **Power Supply State Capabilities Unique**

Name	powerSupplyStateCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.3
Description	Defines the capabilities of the power supply.
Syntax	DellPowerSupplyStateCapabilitiesUnique (See Table 8-1.)
Access	Read-only

# **Power Supply State Settings Unique**

Name	powerSupplyStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.4
Description	Defines the state and settings of the power supply.
Syntax	DellPowerSupplyStateSettingsUnique (See Table 8-2.)
Access	Read-write

# **Power Supply Status**

Name	powerSupplyStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.5
Description	Defines the status of the power supply.
Syntax	DellStatus
Access	Read-only

# **Power Supply Output Watts**

Name	powerSupplyOutputWatts
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.6
Description	Defines the maximum sustained output wattage of the power supply in tenths of watts.
Syntax	DellSigned32BitRange
Access	Read-only

# **Power Supply Type**

Name	powerSupplyType
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.7
Description	Defines the type of power supply.
Syntax	DellPowerSupplyType (See Table 8-3.)
Access	Read-only

# **Power Supply Location Name**

Name	powerSupplyLocationName
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.8
Description	Defines the location name of the power supply.
Syntax	DellString
Access	Read-only

# **Power Supply Input Voltage**

Name	powerSupplyInputVoltage
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.9
Description	Defines the input voltage to the power supply in volts.
Syntax	DellSigned32BitRange
Access	Read-only

# **Power Supply Power Unit Index Reference**

Name	powerSupplypowerUnitIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.10
Description	Defines the index to the associated system power unit in this chassis.
Syntax	DellObjectRange
Access	Read-only

# **Power Supply Sensor State**

Name	powerSupplySensorState
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.11
Description	Defines the state reported by the power supply sensor, and supplements the state and settings of the power supply.
Syntax	DellPowerSupplySensorState (See Table 8-4)
Access	Read-only

# Power Supply Configuration Error Type

Name	powerSupplyConfigurationErrorType
Object ID	1.3.6.1.4.1.674.10892.1.600.12.1.12
Description	Defines the type of configuration error reported by the power supply sensor.
Syntax	DellPowerSupplyConfigurationErrorType (See Table 8-5)
Access	Read-only

# Voltage Probe Table

Name	voltageProbeTable
Object ID	1.3.6.1.4.1.674.10892.1.600.20
Description	Defines the Voltage Probe Table.
Syntax	VoltageProbeTableEntry
Access	Not accessible

#### Voltage Probe Table Entry

Name	voltageProbeTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1
Description	Defines the Voltage Probe Table entry.
Syntax	VoltageProbeTableEntry
Access	Not accessible
Index	voltageProbechassisIndex, voltageProbeIndex

# Voltage Probe Chassis Index

Name	voltageProbechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Voltage Probe Index**

Name	voltageProbeIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.2
Description	Defines the index of voltage probes in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Voltage Probe State Capabilities**

Name	voltageProbeStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.3
Description	Defines the capabilities of the voltage probe.
Syntax	DellStateCapabilities
Access	Read-only

# **Voltage Probe State Settings**

Name	voltageProbeStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.4
Description	Defines the state and settings of the voltage probe.
Syntax	DellStateSettings
Access	Read-write

# **Voltage Probe Status**

Name	voltageProbeStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.5
Description	Defines the status of the voltage probe.
Syntax	DellStatusProbe
Access	Read-only

# Voltage Probe Reading

Name	voltageProbeReading
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.6
Description	Defines the value of the voltage probe reading. The value is an integer representing the voltage in millivolts that the probe is reading.
	When the value for voltageProbeType is voltageProbeTypeIsDiscrete, a value is not returned for this attribute.
Syntax	DellSigned32BitRange
Access	Read-only

#### Voltage Probe Type

Name	voltageProbeType
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.7
Description	Defines the type of the voltage probe.
Syntax	DellVoltageType
Access	Read-only

#### **Voltage Probe Location Name**

Name	voltageProbeLocationName
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.8
Description	Defines the location of the voltage probe in this chassis.
Syntax	DellString
Access	Read-only

#### Voltage Probe Upper Nonrecoverable Threshold

Name	voltageProbeUpperNonRecoverableThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.9
Description	Defines the value of the voltage probe's upper nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Voltage Probe Upper Critical Threshold**

Name	voltageProbeUpperCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.10
Description	Defines the value of the voltage probe's upper critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Voltage Probe Upper Noncritical Threshold**

Name	voltageProbeUpperNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.11
Description	Defines the user-assigned value of the voltage probe's upper noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### **Voltage Probe Lower Noncritical Threshold**

Name	voltageProbeLowerNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.12
Description	Defines the user-assigned value of the voltage probe's lower noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

# Voltage Probe Lower Critical Threshold

Name	voltageProbeLowerCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.13
Description	Defines the value of the voltage probe's lower critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### Voltage Probe Lower Nonrecoverable Threshold

Name	voltageProbeLowerNonRecoverableThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.14
Description	Defines the value of the voltage probe's lower nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

# **Voltage Probe Probe Capabilities**

Name	voltageProbeProbeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.20.1.15
Description	Defines the probe capabilities of the voltage probe.
Syntax	DellProbeCapabilities
Access	Read-only

# Voltage Probe Discrete Reading

Name Object ID Description	voltageProbeDiscreteReading 1.3.6.1.4.1.674.10892.1.600.20.1.16 Defines the reading for a voltage probe of type voltageProbeTypeIsDiscrete.
	When the value for voltageProbeType is other than voltageProbeTypeIsDiscrete, a value is not returned for this attribute. When the value for voltageProbeType is voltageProbeTypeIsDiscrete, the value returned for this attribute is the discrete reading for the probe.
Syntax	DellVoltageDiscreteReading
Access	Read-only

# Amperage Probe Table

Name	amperageProbeTable
Object ID	1.3.6.1.4.1.674.10892.1.600.30
Description	Defines the Amperage Probe Table.
Syntax	SEQUENCE OF AmperageProbeTableEntry
Access	Not accessible

# Amperage Probe Table Entry

Name	amperageProbeTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1
Description	Defines the Amperage Probe Table entry.
Syntax	AmperageProbeTableEntry
Access	Not accessible
Index	$amperage {\it Probe chass is Index, amperage {\it Probe Index}}$

#### Amperage Probe Chassis Index

Name	amperageProbechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Amperage Probe Index**

Name	amperageProbeIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.2
Description	Defines the index of amperage probes in this chassis.
Syntax	DellObjectRange
Access	Read-only

# **Amperage Probe State Capabilities**

Name	amperageProbeStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.3
Description	Defines the capabilities of the amperage probe.
Syntax	DellStateCapabilities
Access	Read-only

#### Amperage Probe State Settings

Name	amperageProbeStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.4
Description	Defines the state and settings of the amperage probe.
Syntax	DellStateSettings
Access	Read-write

#### **Amperage Probe Status**

Name	amperageProbeStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.5
Description	Defines the status of the amperage probe.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Amperage Probe Reading**

Name Object ID Description	amperageProbeReading 1.3.6.1.4.1.674.10892.1.600.30.1.6 Defines the value of the amperage probe. When the value for amperageProbeType is other than
	amperageProbeTypeIsDiscrete, the value returned for this attribute is the amperage that the probe is reading in milliamps. When the value for amperageProbeType is amperageProbeTypeIsDiscrete, a value is not returned for this attribute.
Syntax	DellSigned32BitRange
Access	Read-only

# Amperage Probe Type

Name	amperageProbeType
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.7
Description	Defines the type of the amperage probe.
Syntax	DellAmperageProbeType
Access	Read-only

#### **Amperage Probe Location Name**

Name	amperageProbeLocationName
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.8
Description	Defines the location name of the amperage probe in this chassis.
Syntax	DellString
Access	Read-only

# Amperage Probe Upper Nonrecoverable Threshold

Name	${\tt amperageProbeUpperNonRecoverableThreshold}$
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.9
Description	Defines the value of the amperage probe's upper nonrecoverable threshold. The value is an integer representing the amperage in milliamperes that the probe is reading.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Amperage Probe Upper Critical Threshold**

Name	amperageProbeUpperCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.10
Description	Defines the value of the amperage probe's upper critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Amperage Probe Upper Noncritical Threshold**

Name	amperageProbeUpperNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.11
Description	Defines the user-assigned value of the amperage probe's upper critical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### Amperage Probe Lower Noncritical Threshold

Name	$\verb+amperageProbeLowerNonCriticalThreshold$
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.12
Description	Defines the user-assigned value of the amperage probe's lower noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

# **Amperage Probe Lower Critical Threshold**

Name	amperageProbeLowerCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.13
Description	Defines the value of the amperage probe's lower critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### Amperage Probe Lower Nonrecoverable Threshold

Name	$\verb+amperageProbeLowerNonRecoverableThreshold$
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.14
Description	Defines the value of the amperage probe's lower nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

# **Amperage Probe Probe Capabilities**

Name	amperageProbeProbeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.15
Description	Defines the probe capabilities of the amperage probe.
Syntax	DellProbeCapabilities
Access	Read-only

#### **Amperage Probe Discrete Reading**

Name	amperageProbeDiscreteReading
Object ID	1.3.6.1.4.1.674.10892.1.600.30.1.16
Description	Defines the reading for a amperage probe of type amperageProbeTypeIsDiscrete.
	When the value for amperageProbeType is other than amperageProbeTypeIsDiscrete, a value is not returned for this attribute. When the value for amperageProbeType is amperageProbeTypeIsDiscrete, the value returned for this attribute is the discrete reading for the probe.
Syntax	DellAmperageDiscreteReading (See Table 8-9)
Access	Read-only

# **AC Power Switch Table**

Name	aCPowerSwitchTable
Object ID	1.3.6.1.4.1.674.10892.1.600.40
Description	Defines the AC Power Switch Table.
Syntax	$SEQUENCE \ OF \ ACPower Switch Table Entry$
Access	Not accessible

#### AC Power Switch Table Entry

Name	aCPowerSwitchTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1
Description	Defines the AC Power Switch Table entry.
Syntax	ACPowerSwitchTableEntry
Access	Not accessible

#### **AC Power Switch Chassis Index**

Name	aCPowerSwitchChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.1
Description	Defines the index (one-based) of the chassis containing this AC power switch.
Syntax	DellObjectRange
Access	Read-only

# **AC Power Switch Index**

Name	aCPowerSwitchIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.2
Description	Defines the index (one-based) of this AC power switch.
Syntax	DellObjectRange
Access	Read-only

# **AC Power Switch Capabilities**

Name	aCPowerSwitchCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.3
Description	Defines the capabilities of this AC power switch.
Syntax	DellACPowerSwitchCapabilities
Access	Read-only

# **AC Power Switch Settings**

Name	aCPowerSwitchSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.4
Description	Defines the settings of this AC power switch.
Syntax	DellACPowerSwitchSettings
Access	Read-write

# **AC Power Switch Redundancy Status**

Name	aCPowerSwitchRedundancyStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.5
Description	Defines the redundancy status of this AC power switch.
Syntax	DellStatusRedundancy
Access	Read-only

# AC Power Cord Count for Redundancy

Name	aCPowerCordCountForRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.6
Description	Defines the total number of AC power cords required for this AC power switch to have redundancy.
Syntax	DellObjectRange
Access	Read-only

# **AC Power Switch Name**

Name	aCPowerSwitchName
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.7
Description	Defines the name of this AC power switch.
Syntax	DellString
Access	Read-only

# AC Power Switch Redundancy Mode

Name	aCPowerSwitchRedundancyMode
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.8
Description	Defines the redundancy mode of this AC power switch.
Syntax	DellACPowerSwitchRedundancyMode
Access	Read-write

#### **AC Power Switch Status**

Name	aCPowerSwitchStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.40.1.9
Description	Defines the status of this AC power switch.
Syntax	DellStatus
Access	Read-only

#### **AC Power Cord Table**

Name	aCPowerCordTable
Object ID	1.3.6.1.4.1.674.10892.1.600.42
Description	Defines the AC Power Cord Table.
Syntax	SEQUENCE OF ACPowerCordTableEntry
Access	Not accessible

#### **AC Power Cord Table Entry**

Name	aCPowerCordTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1
Description	Defines the AC Power Cord Table entry.
Syntax	ACPowerCordTableEntry
Access	Not accessible

#### **AC Power Cord Chassis Index**

Name	aCPowerCordChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.1
Description	Defines the index (one-based) of the chassis containing this AC power cord.
Syntax	DellObjectRange
Access	Read-only

#### **AC Power Cord Index**

Name	aCPowerCordIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.2
Description	Defines the index (one-based) of this AC power cord.
Syntax	DellObjectRange
Access	Read-only

#### **AC Power Cord State Capabilities**

Name	aCPowerCordStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.3
Description	Defines the capabilities of this AC power cord.
Syntax	DellACPowerCordStateCapabilities
Access	Read-only

#### **AC Power Cord State Settings**

Name	aCPowerCordStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.4
Description	Defines the settings of this AC power cord.
Syntax	DellACPowerCordStateSettings
Access	Read-write

#### **AC Power Cord Status**

Name	aCPowerCordStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.5
Description	Defines the status of this AC power cord.
Syntax	DellStatus
Access	Read-only

#### AC Power Cord AC Power Switch Index Reference

Name	aCPowerCordaCPowerSwitchIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.6
Description	Defines the index (one-based) to the associated AC power switch for this AC power cord.
Syntax	DellObjectRange
Access	Read-only

#### **AC Power Cord Location Name**

Name	aCPowerCordLocationName
Object ID	1.3.6.1.4.1.674.10892.1.600.42.1.7
Description	Defines the location name of this AC power cord.
Syntax	DellString
Access	Read-only

#### **Battery Table**

Name	batteryTable
Object ID	1.3.6.1.4.1.674.10892.1.600.50
Description	Defines the Battery Table.
Syntax	SEQUENCE OF BatteryTableEntry
Access	Not accessible

#### **Battery Table Entry**

Name	batteryTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1
Description	Defines the Battery Table Entry.
Syntax	BatteryTableEntry
Access	Not accessible

#### **Battery Chassis Index**

Name	batteryChassisIndex	
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.1	
Description	Defines the index (one-based) of the chassis that contains the battery.	
Syntax	DellObjectRange	
Access	Read-only	
Battery Index		

Name	batteryIndex
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.2
Description	Defines the index (one-based) of the battery.
Syntax	DellObjectRange
Access	Read-only

#### **Battery State Capabilities**

Name	batteryStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.3
Description	Defines the state capabilities of the battery.
Syntax	DellStateCapabilities
Access	Read-only

#### **Battery State Settings**

Name	batteryStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.4
Description	Defines the state settings of the battery.
Syntax	DellStateSettings
Access	Read-write

#### **Battery Status**

Name	batteryStatus
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.5
Description	Defines the status of the battery.
Syntax	DellStatus
Access	Read-only

#### **Battery Reading**

Name	batteryReading
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.6
Description	Defines the reading of the battery.
Syntax	DellBatteryReading (see Table )
Access	Read-only

#### **Battery Location Name**

Name	batteryLocationName
Object ID	1.3.6.1.4.1.674.10892.1.600.50.1.7
Description	Defines the location of the battery.
Syntax	DellString
Access	Read-only

### **Power Group Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Variable Name: DellPowerSupplyStateCapabilitiesUnique	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	The power supply's capabilities are unknown.
onlineCapable(2)	The power supply can be disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReadyCapable(4)	The power supply's capabilities are not ready.

 Table 8-1.
 Power Supply State Capabilities Unique

#### Table 8-2. Power Supply State Settings Unique

Variable Name: DellPowerSupplyStateSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	The power supply's capabilities are unknown.
onLine(2)	The power supply's state is disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReady(4)	The power supply's state is not ready.
fanFailure(8)	The power supply fan has failed.
onlineAndFanFailure(10)	The power supply is online and indicating that its fan is not working.
powerSupplyIsON(16)	The power supply is indicating that it is on.
powerSupplyIsOk(32)	The power supply is indicating that it is OK.
acSwitchIsON(64)	The power supply is indicating that the AC power switch is on.
onlineandAcSwitchIsON(66)	The power supply is online and indicating that the AC power supply switch capability is activated.
acPowerIsON(128)	The power supply is indicating that the AC power is on.
onlineAndAcPowerIsON(130)	The power supply is online and indicating that the AC power is on.
onlineAndPredictiveFailure(210)	The power supply is online and indicating that it has a problem.
acPowerAndSwitchAreOnPowerSupplyIs OnIsOkAndOnline(242)	The power supply is online and OK.

#### Table 8-3. Power Supply Type Definitions

Variable Name: DellPowerSupplyType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
powerSupplyTypeIsOther(1)	The power supply type is not one of the following:
<pre>powerSupplyTypeIsUnknown(2)</pre>	The power supply type is unknown (not known or not monitored).
<pre>powerSupplyTypeIsLinear(3)</pre>	The power supply type is a linear power supply.
powerSupplyTypeIsSwitching(4)	The power supply type is a switching power supply.
<pre>powerSupplyTypeIsBattery(5)</pre>	The power supply type is a battery.
powerSupplyTypeIsUPS(6)	The power supply type is an uninterruptable power supply.

#### Table 8-3. Power Supply Type Definitions (continued)

Variable Name: DellPowerSupplyType

Data Type: Integer

Possible Data Values	Meaning of Data Value	
powerSupplyTypeIsConverter(7)	The power supply type is a power converter power supply.	
powerSupplyTypeIsRegulator(8)	The power supply type is a regulator power supply.	
powerSupplyTypeIsAC(9)	The power supply type is an AC power supply.	
powerSupplyTypeIsDC(10)	The power supply type is a DC power supply.	
powerSupplyTypeIsVRM(11)	The power supply type is a voltage regulator module (VRM) power supply.	

#### Table 8-4. Power Supply Sensor State

Variable Name: DellPowerSupplySensorState

Data Type: Integer

Possible Data Values	Meaning of Data Value
presenceDetected(1)	The power supply's presence is detected.
psFailureDetected(2)	The power supply failure is detected.
predictiveFailure(4)	The power supply sensor detects predictive failure
psACLost(8)	The power supply's AC power is lost.
acLostOrOutOfRange(16)	The power supply's AC power is lost or out of range.
acOutOfRangeButPresent(32)	The power supply's AC power is present, but it is out of range.
configurationError(64)	The power supply sensor detects a configuration error.

Table 8-5.	Power Supply	Configuration Error Type
10510 0 5.	I Ower ouppiy	ooninguruuon Error Type

Variable Name: DellPowerSupplyConfigurationErrorType		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
vendorMismatch(1)	The power supply configuration error type is vendor mismatch.	
revisionMismatch(2)	The power supply configuration error type is revision mismatch.	
processorMissing(3)	The power supply configuration error type is processor missing.	

#### Table 8-6. Voltage Probe Type

Variable Name: DellVoltageType

Data Type: Integer

Possible Data Values	Meaning of Data Value
voltageProbeTypeIsOther(1)	The voltage probe type is not one of the following:
voltageProbeTypeIsUnknown(2)	The voltage probe type is unknown (not known or not monitored).
voltageProbeTypeIs1Point5Volt(3)	The voltage probe type is a 1.5-volt (V) probe.
voltageProbeTypeIs3Point3Volt(4)	The voltage probe type is a 3.3-V probe.
voltageProbeTypeIs5Volt(5)	The voltage probe type is a 5-V probe.
voltageProbeTypeIsMinus5Volt(6)	The voltage probe type is a $-5$ -V probe.
voltageProbeTypeIs12Volt(7)	The voltage probe type is a 12-V probe.
voltageProbeTypeIsMinus12Volt(8)	The voltage probe type is a $-12$ -V probe.
voltageProbeTypeIsIO(9)	The voltage probe type is an I/O volt probe.
voltageProbeTypeIsCore(10)	The voltage probe type is a core volt probe.
voltageProbeTypeIsFLEA(11)	The voltage probe type is a FLEA (standby) volt probe.
voltageProbeTypeIsBattery(12)	The voltage probe type is a battery volt probe.
voltageProbeTypeIsTerminator(13)	The voltage probe type is a SCSI termination volt probe.
voltageProbeTypeIs2Point5Volt(14)	The voltage probe type is a 2.5-V probe.
voltageProbeTypeIsGTL(15)	The voltage probe type is a ground termination logic (GTL) probe.
voltageProbeTypeIsDiscrete(16)	The voltage probe type is a voltage probe with discrete reading.

#### Table 8-7. Voltage Probe Discrete Reading

Variable Name: DellVoltageDiscreteReading	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
voltageIsGood(1)	The voltage probe discrete reading is good.
voltageIsBad(2)	The voltage probe discrete reading is bad.

#### Table 8-8. Amperage Probe Definitions

Variable Name: DellAmperageType

Data Type: Integer

Possible Data Values	Meaning of Data Value
amperageProbeTypeIsOther(1)	The amperage probe type is not one of the following:
amperageProbeTypeIsUnknown(2)	The amperage probe type is unknown (not known or not monitored).
<pre>amperageProbeTypeIs1Point5Volt(3)</pre>	The amperage probe type is a 1.5-ampere (A) probe.
<pre>amperageProbeTypeIs3Point3volt(4)</pre>	The amperage probe type is a 3.3-A probe.
<pre>amperageProbeTypeIs5Volt(5)</pre>	The amperage probe type is a 5-A probe.
amperageProbeTypeIsMinus5Volt(6)	The amperage probe type is a –5-A probe.
<pre>amperageProbeTypeIs12Volt(7)</pre>	The amperage probe type is a 12-A probe.
<pre>amperageProbeTypeIsMinus12Volt(8)</pre>	The amperage probe type is a –12-A probe.
amperageProbeTypeIsIO(9)	The amperage probe type is an I/O amperage probe.
amperageProbeTypeIsCore(10)	The amperage probe type is a core amperage probe.
amperageProbeTypeIsFLEA(11)	The amperage probe type is a FLEA (standby) amperage probe.
amperageProbeTypeIsBattery(12)	The amperage probe type is a battery amperage probe.
amperageProbeTypeIsTerminator(13)	The amperage probe type is a Small Computer System Interface (SCSI) termination amperage probe.
amperageProbeTypeIs2Point5Volt(14)	The amperage probe type is a 2.5-V amperage probe.
amperageProbeTypeIsGTL(15)	The amperage probe type is a Gunning Transceiver Logic (GTL) probe.
amperageProbeTypeIsDiscrete(16)	The amperage probe type is an amperage probe with discrete reading.

#### Table 8-9. Amperage Probe Discrete Reading

Variable Name: DellAmperageDiscreteReading	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
amperageIsGood(1)	The amperage probe discrete reading is good.
amperageIsBad(2)	The amperage probe discrete reading is bad.

#### Table 8-10. AC Power Switch Capabilities

Variable Name: DellACPowerSwitchCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknownCapabilities(1)	The AC power switch's capabilities are unknown.
<pre>inputSourceCord1NoReturnCapable(2)</pre>	Input source is AC power cord 1, with no return.
inputSourceCord1ReturnCapable(4)	Input source is AC power cord 1, with return.
inputSourceCord2NoReturnCapable(8)	Input source is AC power cord 2, with no return.
inputSourceCord2ReturnCapable(16)	Input source is AC power cord 2, with return.
inputSourceSharedCapable(32)	Input source is shared.

#### Table 8-11. AC Power Switch Settings

Variable Name: DellACPowerSwitchSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	The AC power switch's settings are unknown.
inputSourceCord1NoReturn(2)	Input source is AC power cord 1, with no return.
inputSourceCord1Return(4)	Input source is AC power cord 1, with return.
inputSourceCord2NoReturn(8)	Input source is AC power cord 2, with no return.
inputSourceCord2Return(16)	Input source is AC power cord 2, with return.
inputSourceShared(32)	Input source is shared.

Table 8-12.	AC Power Switch	Redundancy Mode

Variable Name: DellACPowerSwitchRedundancyMode	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
nonRedundant(1)	The AC power switch is not expecting redundancy.
redundant(2)	The AC power switch is expecting redundancy.

#### Table 8-13. AC Power Cord State Capabilities

# Variable Name: DellACPowerCordStateCapabilities Data Type: Integer Meaning of Data Value Possible Data Values Meaning of Data Value unknown(1) The AC power cord's capabilities are unknown. onlineCapable(2) The AC power cord can be disabled (offline) or enabled (online). notReadyCapable(4) The AC power cord's capabilities are not ready.

#### Table 8-14. AC Power Cord State Settings

Variable Name: DellACPowerCordStateSettings		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
unknown(1)	The AC power cord's state is unknown.	
online(2)	The AC power cord's state is disabled (offline) 0 or enabled (online) 1.	
notReady(4)	The AC power cord's state is not ready.	
acPowerCordHasPower(8)	The AC power cord has power.	
acPowerCordIsActiveSource(16)	The AC power cord is the active source of AC power.	

#### Table 8-15. Battery Reading

Variable Name: DellBatteryReading	
Data Type: Integer NOTE: These values are bit masks, so combination values are possible.	
Possible Data Values	Meaning of Data Value
predictiveFailure(1)	Battery sensor detects predictive failure.
failed(2)	Battery has failed.
presenceDetected(4)	Battery presence is detected.

## **Thermal Group**

The Thermal Group provides information about cooling units, cooling devices, and temperature probes. Cooling units are sets of fans or other cooling devices in a system chassis. Thermal Group variables include threshold values and types of cooling devices and temperature probes.

## **Thermal Group Tables**

The following management information base (MIB) tables define the objects in the Thermal Group:

- Cooling Unit Table
- Cooling Unit Status
- Temperature Probe Table

#### **Cooling Unit Table**

Name	coolingUnitTable
Object ID	1.3.6.1.4.1.674.10892.1.700.10
Description	Defines the Cooling Unit Table.
Syntax	TableEntry
Access	Not accessible

#### **Cooling Unit Table Entry**

Name	coolingUnitTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1
Description	Defines the Cooling Unit Table entry.
Syntax	TableEntry
Access	Not accessible
Index	cooling Unit chassis Index, cooling Unit Index

#### **Cooling Unit Chassis Index**

Name	coolingUnitchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	TableEntry
Access	Read-only

#### **Cooling Unit Index**

Name	coolingUnitIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.2
Description	Defines the index (one-based) of cooling units.
Syntax	DellObjectRange
Access	Read-only

#### **Cooling Unit State Capabilities**

Name	coolingUnitStateCapabilties
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.3
Description	Defines the capabilities of the cooling unit.
Syntax	DellStateCapabilities
Access	Read-only

#### **Cooling Unit State Settings**

Name	coolingUnitStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.4
Description	Defines the state and settings of the cooling unit.
Syntax	DellStateSettings
Access	Read-write

#### **Cooling Unit Redundancy Status**

Name	coolingUnitRedundancyStatus
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.5
Description	Defines the redundancy status of the cooling unit.
Syntax	DellStatusRedundancy
Access	Read-only

#### **Cooling Device Count For Redundancy**

Name	coolingDeviceCountForRedundancy
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.6
Description	Defines the total number of cooling devices required for this cooling unit to have redundancy.
Syntax	DellObjectRange
Access	Read-only

#### **Cooling Unit Name**

Name	coolingUnitName
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.7
Description	Defines the cooling unit name in this chassis.
Syntax	DellString
Access	Read-only

#### **Cooling Unit Status**

Name	coolingUnitStatus
Object ID	1.3.6.1.4.1.674.10892.1.700.10.1.8
Description	Defines the status of the cooling unit in this chassis.
Syntax	DellStatus
Access	Read-only

#### **Cooling Device Table**

Name	coolingDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.700.12
Description	Defines the Cooling Device Table.
Syntax	CoolingDeviceTableEntry
Access	Not accessible

#### **Cooling Device Table Entry**

Name	coolingDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1
Description	Defines the Cooling Device Table entry.
Syntax	CoolingDeviceTableEntry
Access	Not accessible
Index	cooling DevicechassisIndex, coolingDeviceIndex

#### **Cooling Device Chassis Index**

Name	coolingDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Cooling Device Index**

Name	coolingDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.2
Description	Defines the index of cooling devices in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Cooling Device State Capabilities**

Name	coolingDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.3
Description	Defines the capabilities of the cooling device.
Syntax	DellStateCapabilities
Access	Read-only

#### **Cooling Device State Settings**

Name	coolingDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.4
Description	Defines the state and settings of the cooling device.
Syntax	DellStateSettings
Access	Read-write

#### **Cooling Device Status**

Name	coolingDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.5
Description	Defines the status of the cooling device.
Syntax	DellStatusProbe
Access	Read-only

#### **Cooling Device Reading**

Name Object ID Description	coolingDeviceReading 1.3.6.1.4.1.674.10892.1.700.12.1.6 Defines either the cooling device's speed in revolutions per minute (RPM), or the off/on value of the fan.
	When the value for coolingDeviceSubType is other than coolingDeviceSubTypeIsDiscrete, the value returned for this attribute is the speed in RPM or the OFF/ON value of the cooling device. When the value for coolingDeviceSubType is coolingDeviceSubTypeIsDiscrete, a value is not returned for this attribute.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Cooling Device Type**

Name	coolingDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.7
Description	Defines the cooling device type.
Syntax	DellCoolingDeviceType (See Table 9-1.)
Access	Read-only

#### **Cooling Device Location Name**

Name	coolingDeviceLocationName
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.8
Description	Defines the location of the cooling device in this chassis.
Syntax	DellString
Access	Read-only

#### **Cooling Device Upper Nonrecoverable Threshold**

Name	coolingDeviceUppernonrecoverableThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.9
Description	Defines the value of the fan's upper nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Cooling Device Upper Critical Threshold**

Name	coolingDeviceUpperCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.10
Description	Defines the value of the fan's upper critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Cooling Device Upper Noncritical Threshold**

Name	coolingDeviceUpperNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.11
Description	Defines the user-assigned value of the fan's upper noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### **Cooling Device Lower Noncritical Threshold**

Name	coolingDeviceLowerNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.12
Description	Defines the user-assigned value of the fan's lower noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### **Cooling Device Lower Critical Threshold**

Name	coolingDeviceLowerCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.13
Description	Defines the value of the fan's lower critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Cooling Device Lower Nonrecoverable Threshold**

Name	coolingDeviceLowerNonRecoverableThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.14
Description	Defines the value of the fan's lower nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Cooling Device Cooling Unit Index Reference**

Name	coolingDevicecoolingUnitIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.15
Description	Defines the index for the associated system cooling unit in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Cooling Device Subtype**

Name	coolingDeviceSubType
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.16
Description	Defines the cooling device subtype.
Syntax	DellCoolingDeviceSubType (See Table 9-2.)
Access	Read-only

#### **Cooling Device Probe Capabilities**

Name	coolingDeviceProbeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.700.12.1.17
Description	Defines the probe capabilities of the cooling device.
Syntax	DellProbeCapabilities
Access	Read-only

#### **Cooling Device Discrete Reading**

Name Object ID Description	coolingDeviceDiscreteReading 1.3.6.1.4.1.674.10892.1.700.12.1.18 Defines the reading for a voltage probe of type coolingDeviceSubTypeIsDiscrete.
	When the value for coolingDeviceSubType is other than coolingDeviceSubTypeIsDiscrete, a value is not returned for this attribute. When the value for coolingDeviceSubType is coolingDeviceSubTypeIsDiscrete, the value returned for this attribute is the discrete reading for the cooling device.
Syntax	DellCoolingDeviceDiscreteReading (See Table 9-3)
Access	Read-only

#### **Temperature Probe Table**

Name	temperatureProbeTable
Object ID	1.3.6.1.4.1.674.10892.1.700.20
Description	Defines the Temperature Probe Table.
Syntax	TemperatureProbeTableEntry
Access	Not accessible

#### **Temperature Probe Table Entry**

Name	temperatureProbeTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1
Description	Defines the Temperature Probe Table entry.
Syntax	TemperatureProbeTableEntry
Access	Not accessible
Index	temperatureProbechassisIndex, temperatureProbeIndex

#### Temperature Probe Chassis Index

Name	temperatureProbechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Temperature Probe Index**

Name	temperatureProbeIndex
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.2
Description	Defines the index of temperature probes in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Temperature Probe State Capabilities**

Name	temperatureProbeStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.3
Description	Defines the capabilities of the temperature probe.
Syntax	DellStateCapabilities
Access	Read-only

#### **Temperature Probe State Settings**

Name	temperatureProbeStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.4
Description	Defines the state and settings of the temperature probe.
Syntax	DellStateSettings
Access	Read-write

#### **Temperature Probe Status**

Name	temperatureProbeStatus
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.5
Description	Defines the status of the temperature probe in tenths of degrees Celsius.
Syntax	DellStatusProbe
Access	Read-only

#### **Temperature Probe Reading**

Name Object ID Description	temperatureProbeReading 1.3.6.1.4.1.674.10892.1.700.20.1.6 Defines the value of the temperature probe.
	When the value for temperatureProbeType is other than temperatureProbeTypeIsDiscrete, the value returned for this attribute is the temperature that the probe is reading in tenths of degrees Centigrade. When the value for temperatureProbeType is temperatureProbeTypeIsDiscrete, a value is not returned for this attribute.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Temperature Probe Type**

Name	temperatureProbeType
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.7
Description	Defines the temperature probe type.
Syntax	DellTemperatureProbeType (See Table 9-4.)
Access	Read-only

#### **Temperature Probe Location Name**

Name	temperatureProbeLocationName
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.8
Description	Defines the location of the temperature probe in this chassis.
Syntax	DellString
Access	Read-only

#### Temperature Probe Upper Nonrecoverable Threshold

Name	${\tt temperatureProbeUpperNonRecoverableThreshold}$
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.9
Description	Defines the value of the temperature probe's upper nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Temperature Probe Upper Critical Threshold**

Name	temperatureProbeUpperCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.10
Description	Defines the value of the temperature probe's upper critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Temperature Probe Upper Noncritical Threshold**

Name	temperatureProbeUpperNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.11
Description	Defines the user-assigned value of the temperature probe's upper noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### **Temperature Probe Lower Noncritical Threshold**

Name	temperatureProbeLowerNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.12
Description	Defines the user-assigned value of the temperature probe's lower noncritical threshold.
Syntax	DellSigned32BitRange
Access	Read-write

#### **Temperature Probe Lower Critical Threshold**

Name	temperatureProbeLowerCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.13
Description	Defines the value of the temperature probe's lower critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Temperature Probe Lower Nonrecoverable Threshold**

Name	${\tt temperatureProbeLowerNonRecoverableThreshold}$
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.14
Description	Defines the value of the temperature probe's lower nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Temperature Probe Probe Capabilities**

Name	temperatureProbeProbeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.15
Description	Defines the probe capabilities of the temperature probe.
Syntax	DellProbeCapabilities
Access	Read-only

#### **Temperature Probe Discrete Reading**

Name	temperatureProbeDiscreteReading
Object ID	1.3.6.1.4.1.674.10892.1.700.20.1.16
Description	Defines the reading for a temperature probe of type temperatureProbeTypeIsDiscrete.
	When the value for temperatureProbeType is other than temperatureProbeTypeIsDiscrete, a value is not returned for this attribute. When the value for temperatureProbeType is temperatureProbeTypeIsDiscrete, the value returned for this attribute is the discrete reading for the probe.
Syntax	DellTemperatureDiscreteReading (See Table 9-5)
Access	Read-only

### **Thermal Group Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Table 9-1.	Cooling	Device Tune	
Table 3-1.	COOIIIIG	Device Type	;

Variable Name: DellCoolingDeviceType

```
Data Type: Integer
```

Possible Data Values	Meaning of Data Value
coolingDeviceTypeIsOther(1)	The cooling device type is not one of the following:
coolingDeviceTypeIsUnknown(2)	The cooling device type is unknown (not known or not monitored).
coolingDeviceTypeIsAFan(3)	The cooling device type is a fan.
coolingDeviceTypeIsABlower(4)	The cooling device type is a centrifugal blower.
coolingDeviceTypeIsAChipFan(5)	The cooling device type is a fan on an integrated circuit.
coolingDeviceTypeIsACabinetFan(6)	The cooling device type is a cabinet fan.

#### Table 9-1. Cooling Device Type (continued)

Variable Name: DellCoolingDeviceType

Data Type: Integer

Possible Data Values	Meaning of Data Value
<pre>coolingDeviceTypeIsAPowerSupplyFan(7)</pre>	The cooling device type is a power supply fan.
coolingDeviceTypeIsAHeatPipe(8)	The cooling device type is a heat pipe.
<pre>coolingDeviceTypeIsRefrigeration(9)</pre>	The cooling device type is an integrated refrigeration unit.
coolingDeviceTypeIsActiveCooling(10)	The cooling device type is an active cooling device.
<pre>coolingDeviceTypeIsPassiveCooling(11)</pre>	The cooling device type is a passive cooling device.

#### Table 9-2. Cooling Device Subtype

Variable Name: DellCoolingDeviceSubType

Data Type: Integer

Possible Data Values	Meaning of Data Value
coolingDeviceSubTypeIsOther(1)	The cooling device subtype is not one of the following:
coolingDeviceSubTypeIsUnknown(2)	The cooling device subtype is unknown (not known or not monitored).
coolingDeviceSubTypeIsAFanThatReadsIn RPM(3)	The cooling device subtype is a fan that reads in RPMs.
<pre>coolingDeviceSubTypeIsAFanReadsONorOFF (4)</pre>	The cooling device subtype is a fan that reads 0 (off) or 1 (on).
coolingDeviceSubTypeIsAPowerSupplyFan ThatReadsinRPM(5)	The cooling device subtype is a power supply fan that reads in RPMs.
coolingDeviceSubTypeIsAPowerSupplyFan ThatReads- ONorOFF(6)	The cooling device subtype is a power supply fan that reads 0 (off) or 1 (on).
coolingDeviceSubTypeIsDiscrete(16)	The cooling device subtype is a cooling device with discrete reading.

#### Table 9-3. Cooling Device Discrete Reading

Variable Name: DellCoolingDeviceDiscreteReading

Data Type: Integer

Possible Data Values	Meaning of Data Value
coolingDeviceIsGood(1)	The cooling device discrete reading is good.
coolingDeviceIsBad(2)	The cooling device discrete reading is bad.

#### Table 9-4. Temperature Probe Type

Variable Name: DellTemperatureProbeType

Data Type: Integer

Possible Data Values	Meaning of Data Value
temperatureProbeTypeIsOther(1)	The temperature probe subtype is not one of the following:
<pre>temperatureProbeTypeIsUnknown(2)</pre>	The temperature probe subtype is unknown (not known or not monitored).
<pre>temperatureProbeTypeIsAmbientESM(3)</pre>	The temperature probe is for ambient Embedded Systems Management (ESM).
temperatureProbeTypeIsDiscrete(16)	The temperature probe subtype is a temperature probe with discrete reading.

#### Table 9-5. Temperature Probe Discrete Reading

Variable Name: DellTemperatureDiscreteReading

Data Type: Integer

Possible Data Values	Meaning of Data Value
temperatureIsGood(1)	The temperature probe discrete reading is good.
temperatureIsBad(2)	The temperature probe discrete reading is bad.

## 10

## **User Security Group**

The User Security Table defines the objects that allow administrators to create and modify user accounts and to control which users can perform **Set** operations on managed systems.

## **User Security Group Table**

The User Security Group defines objects in the User Security MIB table.

#### **User Security Table**

The following object sets up the User Security Table:

Name	userSecurityTable
Object ID	1.3.6.1.4.1.674.10892.1.800
Description	Contains the database of users that are authorized to perform Set operations on a managed system.
Syntax	UserSecurityTableEntry
Access	Not accessible

#### **User Security Table Entry**

Name	userSecurityTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.800.1
Description	Defines a row in the User Security Table.
Syntax	UserSecurityTableEntry
Access	Not accessible
Index	userSecuritychassisIndex, userSecurityIndex

#### **User Security Chassis Index**

Name	userSecuritychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.800.1.1
Description	Defines the user security index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **User Security Index**

Name	userSecurityIndex
Object ID	1.3.6.1.4.1.674.10892.1.800.1.2
Description	Defines the user security index.
Syntax	DellObjectRange
Access	Read-only

#### **User Security User Name**

Name	userSecurityUserName
Object ID	1.3.6.1.4.1.674.10892.1.800.1.3
Description	Defines the user security user name.
Syntax	DellSecurityString
Access	Read-only

#### **User Security Control Name**

userSecurityControlName
1.3.6.1.4.1.674.10892.1.800.1.4
Defines a control name used for creating, deleting, and editing users.
DellSecurityString
Read-write

#### **User Security Request Name**

Name	userSecurityRequestName
Object ID	1.3.6.1.4.1.674.10892.1.800.1.5
Description	Defines a request name used for creating, deleting, and editing users.
Syntax	DellSecurityString
Access	Read-write

## 11

## **Remote Flash BIOS Group**

The Remote Flash Basic Input/Output System (BIOS) Table defines the variables used to remotely update the BIOS in a system. The variables also define the capabilities of BIOS updates on the system.

## **Remote Flash BIOS Group Table**

The Remote Flash BIOS Group defines objects in the Remote Flash BIOS MIB table.

#### **Remote Flash BIOS Table**

The following object sets up the Remote Flash BIOS Table:

Name	remoteFlashBIOSTable
Object ID	1.3.6.1.4.1.674.10892.1.900.10
Description	Defines the Remote Flash BIOS Table.
Syntax	RemoteFlashBIOSTableEntry
Access	Not accessible

#### **Remote Flash BIOS Table Entry**

Name	remoteFlashBIOSTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1
Description	Defines the Remote Flash BIOS Table entry.
Syntax	RemoteFlashBIOSTableEntry
Access	Not accessible
Index	remote Flash BIOS chassis Index, remote Flash BIOS Index

#### **Remote Flash BIOS Chassis Index**

Name	remoteFlashBIOSchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Flash BIOS Index**

Name	remoteFlashBIOSIndex
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.2
Description	Defines the index to the remote BIOS update hardware on this system.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Flash BIOS State Capabilities Unique**

Name	remoteFlashBIOSStateCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.3
Description	Defines the capabilities of the remote BIOS update hardware on this system.
Syntax	DellRemoteFlashBIOSStateCapabilitiesUnique (See Table 11-1.)
Access	Read-only

#### **Remote Flash BIOS State Settings Unique**

Name	remoteFlashBIOSStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.4
Description	Defines the state and settings of the remote BIOS update hardware on this system.
Syntax	DellRemoteFlashBIOSStateSettingsUnique (See Table 11-2.)
Access	Read-write

#### **Remote Flash BIOS Status**

Name	remoteFlashBIOSStatus
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.5
Description	Defines the status of the remote BIOS update hardware on this system.
Syntax	DellRemoteFlashBIOSStateStatus
Access	Read-only

#### **Remote Flash BIOS Last BIOS Date Name**

Name	${\tt remoteFlashBIOSLastBIOSDateName}$
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.6
Description	Defines the date of the last BIOS update.
Syntax	DellDateName
Access	Read-only

#### **Remote Flash BIOS Completion Code**

Name	remoteFlashBIOSCompletionCode
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.7
Description	Defines the completion code of the last BIOS update.
Syntax	DellRemoteFlashBIOSCompletionCode (See Table 11-3.)
Access	Read-only

#### Remote Flash BIOS Minimum Contiguous Memory

Name	remoteFlashBIOSMinimumContiguousMemory
Object ID	1.3.6.1.4.1.674.10892.1.900.10.1.8
Description	Defines the minimum size of contiguous memory required for remote BIOS update in kilobytes.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Remote Flash BIOS Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

#### Table 11-1. Remote Flash BIOS State Capabilities Unique

Variable Name: DellRemoteFlashBIOSStateCapabilitiesUnique

#### Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	The remote flash BIOS's capabilities are unknown.
enableCapable(2)	The remote flash BIOS can be disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).
notReadyCapable(4)	The remote flash BIOS can be set to indicate not ready.
cancelCapable(8)	Flash of BIOS can be canceled.
enableAndCancelCapable(10)	Flash of BIOS can be enabled or canceled.

#### Table 11-2. Remote Flash BIOS State Settings

Variable Name: DellRemoteFlashBIOSStateSettingsUnique

#### Data Type: Integer

Possible Data Values	Meaning of Data Value	
unknown(1)	The remote flash BIOS's capabilities are unknown.	
enabled(2)	The remote flash BIOS update is disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).	
notReady(4)	The remote flash BIOS's state is not ready.	
canceled(8)	The remote flash BIOS has been canceled.	
pending(16)	The remote flash BIOS update is pending.	
other(32)	her (32) The remote flash BIOS state/setting is not one of the previous value	

#### Table 11-3. Remote Flash BIOS Completion Code

Variable Name: DellRemoteFlashBIOSCompletionCode

Data Type: Integer

Possible Data Values	Meaning of Data Value
completionCodeIsOther(1)	The completion code status is not one of the following:
completionCodeIsUnknown(2)	The completion code is unknown (not known or not monitored).
completionCodeIsOK(3)	This completion code completed successfully.
completionCodeIsBadImage(4)	This completion code is a bad flash BIOS image.
completionCodeIsNoFileAccess(5)	Flash BIOS could not be accessed.
completionCodeIsNotReady(6)	Flash BIOS memory not ready.
completionCodeIsDisabled(7)	Flash BIOS is currently disabled.
completionCodeIsNoBattery(8)	A battery must be installed.
completionCodeIsNoChargedBattery(9)	A fully charged battery must be installed.
completionCodeIsNoExternalPower(10)	An external power adapter must be connected.
completionCodeIsNo12VoltSet(11)	12 volts (V) could not be set.
completionCodeIsNo12VoltRemoval(12)	12 V could not be removed.
completionCodeIsFlashMemoryFailed(13)	A flash memory failure occurred.
completionCodeIsGeneralFailure(14)	A general failure occurred.
completionCodeIsDataMiscompare(15)	A data miscompare error occurred.
completionCodeIsNoImageFound(16)	The flash BIOS image could not be found in memory.
completionCodeIsNoUpdatePerformed(17)	No update operation has been performed.

# 12

# **Port Group**

The Port Group provides information about the different types of ports that may be present in your system. This management information base (MIB) group also provides information about the capabilities, states, and settings that are possible for each port.

## **Port Group Tables**

The following MIB tables define objects in the Port Group:

- Pointing Port Table
- Keyboard Port Table
- Processor Port Table
- Memory Device Port Table
- Monitor Port Table
- Small Computer System Interface (SCSI) Port Table
- Parallel Port Table
- Serial Port Table
- Universal Serial Bus (USB) Port Table

#### **Pointing Port Table**

Name	pointingPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.10
Description	Defines the Pointing Port Table.
Syntax	IntegerPointingPortTableEntry
Access	Not accessible

#### **Pointing Port Table Entry**

Name	pointingPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.1
Description	Defines the Pointing Port Table entry.
Syntax	PointingPortTableEntry
Access	Not accessible
Index	pointingPortchassisIndex, pointingPortIndex

#### **Pointing Port Chassis Index**

Name	pointingPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Pointing Port Index**

Name	pointingPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.1.2
Description	Defines the index of the pointing ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Pointing Port State Capabilities**

Name	pointingPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.3
Description	Defines the capabilities of the pointing port.
Syntax	DellStateCapabilities
Access	Read-only

#### **Pointing Port State Settings**

Name	pointingPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.4
Description	Defines the state and settings of the pointing port.
Syntax	DellStateSettings
Access	Read-write

#### **Pointing Port Status**

Name	pointingPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.5
Description	Defines the status of the pointing port.
Syntax	DellStatus
Access	Read-only

#### **Pointing Port Security State**

Name	pointingPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.6
Description	Defines the security settings of the pointing port.
Syntax	DellPortSecurityState
Access	Read-only

#### **Pointing Port Connector Type**

Name	pointingPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.7
Description	Defines the connector type of the pointing port.
Syntax	DellPointingPortConnectorType (See Table 12-1.)
Access	Read-only

#### **Pointing Port Name**

Name	pointingPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.8
Description	Defines the name of the pointing port.
Syntax	DellString
Access	Read-only

#### Pointing Port BIOS Connector Type

Name	pointingPortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.10.9
Description	Defines the basic input/output system (BIOS) connector type of the pointing port.
Syntax	DellGenericPortConnectorType
Access	Read-only

#### **Keyboard Port Table**

Name	keyboardPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.20
Description	Defines the Keyboard Port Table.
Syntax	IntegerKeyboardPortTableEntry
Access	Not accessible

#### **Keyboard Port Table Entry**

Name	keyboardPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1
Description	Defines the Keyboard Port Table entry.
Syntax	KeyboardPortTableEntry
Access	Not accessible
Index	key board Portchass is Index, key board Port Index

#### Keyboard Port Chassis Index

Name	keyboardPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Keyboard Port Index**

Name	keyboardPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.2
Description	Defines the index of the keyboard ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Keyboard Port State Capabilities**

keyboardPortStateCapabilities
1.3.6.1.4.1.674.10892.1.1000.20.1.3
Defines the capabilities of the keyboard port.
DellStateCapabilities
Read-only

#### **Keyboard Port State Settings**

Name	keyboardPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.4
Description	Defines the state and settings of the keyboard port.
Syntax	DellStateSettings
Access	Read-only

#### **Keyboard Port Status**

Name	keyboardPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.5
Description	Defines the status of the keyboard port.
Syntax	DellStatus
Access	Read-only

#### **Keyboard Port Security State**

Name	keyboardPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.6
Description	Defines the security settings of the keyboard port.
Syntax	DellPortSecurityState
Access	Read-only

#### **Keyboard Port Connector Type**

Name	keyboardPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.7
Description	Defines the connector type of the keyboard port.
Syntax	DellKeyboardPortConnectorType (See Table 12-2.)
Access	Read-only

#### **Keyboard Port Name**

Name	keyboardPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.8
Description	Defines the name of the keyboard port.
Syntax	DellString
Access	Read-only

#### Keyboard Port BIOS Connector Type

Name	keyboardPortBIOSConnectorType	
Object ID	1.3.6.1.4.1.674.10892.1.1000.20.1.9	
Description	Defines the BIOS connector type of the keyboard port.	
Syntax	DellGenericPortConnectorType	
Access	Read-only	

#### **Processor Port Table**

Name	processorPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.30
Description	Defines the Processor Port Table.
Syntax	IntegerProcessorPortTableEntry
Access	Not accessible

#### **Processor Port Table Entry**

Name	processorPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1
Description	Defines the Processor Port Table entry.
Syntax	ProcessorPortTableEntry
Access	Not accessible
Index	processorPortchassisIndex, processorPortIndex

#### **Processor Port Chassis Index**

Name	processorPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Processor Port Index**

Name	processorPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.2
Description	Defines the index of the processor ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Processor Port State Capabilities**

Name	processorPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.3
Description	Defines the capabilities of the processor port.
Syntax	DellStateCapabilities
Access	Read-only

#### **Processor Port State Settings**

Name	processorPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.4
Description	Defines the state and settings of the processor port.
Syntax	DellStateSettings
Access	Read-write

#### **Processor Port Status**

Name	processorPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.5
Description	Defines the status of the processor port.
Syntax	DellStatus
Access	Read-only

#### **Processor Port Security State**

Name	processorPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.6
Description	Defines the security settings of the processor port.
Syntax	DellPortSecurityState
Access	Read-only

#### **Processor Port Connector Type**

Name	processorPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.7
Description	Defines the connector type of the processor port.
Syntax	DellProcessorPortConnectorType (See Table 12-3.)
Access	Read-only

#### **Processor Port Name**

Name	processorPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.8
Description	Defines name of the processor port.
Syntax	DellString
Access	Read-only

#### **Processor Port BIOS Connector Type**

Name	processorPortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.30.1.9
Description	Defines the BIOS connector type of the processor port.
Syntax	DellGenericPortConnectorType
Access	Read-only

#### Memory Device Port Table

Name	memoryDevicePortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.40
Description	Defines the Memory Device Port Table.
Syntax	Integer Memory Device Port Table Entry
Access	Not accessible

#### Memory Device Port Table Entry

Name	memoryDevicePortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1
Description	Defines the Memory Device Port Table entry.
Syntax	MemoryDevicePortTableEntry
Access	Not accessible
Index	memory Device Portchass is Index, memory Device PortIndex

#### Memory Device Port Chassis Index

Name	memoryDevicePortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Memory Device Port Index**

Name	memoryDevicePortIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.2	
Description	Defines the index of the memory device port in this chassis.	
Syntax	DellObjectRange	
Access	Read-only	

#### **Memory Device Port State Capabilities**

Name	memoryDevicePortStateCapabilities	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.3	
Description	Defines the capabilities of the memory device port.	
Syntax	DellStateCapabilities	
Access	Read-only	

#### **Memory Device Port State Settings**

Name	memoryDevicePortStateSettings	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.4	
Description	Defines the state and settings of the memory device port.	
Syntax	DellStateSettings	
Access	Read-write	

#### **Memory Device Port Status**

Name	memoryDevicePortStatus	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.5	
Description	Defines the status of the memory device port.	
Syntax	DellStatus	
Access	Read-only	

#### **Memory Device Port Security State**

Name	memoryDevicePortSecurityState	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.6	
Description	Defines the security settings of the memory device port.	
Syntax	DellPortSecurityState	
Access	Read-only	

#### Memory Device Port Connector Type

Name	memoryDevicePortConnectorType	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.7	
Description	Defines the connector type of the memory device port.	
Syntax	DellMemoryDevicePortConnectorType (See Table 12-4.)	
Access	Read-only	

#### **Memory Device Port Name**

Name	memoryDevicePortName	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.8	
Description	Defines the name of the memory device port.	
Syntax	DellString	
Access	Read-only	

#### Memory Device Port BIOS Connector Type

Name	memoryDevicePortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.9
Description	Defines the BIOS connector type of the memory device port.
Syntax	DellGenericPortConnectorType
Access	Read-only

#### Memory Device Port Physical Memory Array Index Reference

Name	memoryDevicePortPhysicalMemoryArrayIndexReference	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.10	
Description	Defines the index to the associated physical memory array.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

#### Memory Device Port Physical Memory Card Index Reference

Name	memoryDevicePortPhysicalMemoryCardIndexReference	
Object ID	1.3.6.1.4.1.674.10892.1.1000.40.1.11	
Description	Defines the index (one-based) of the Physical Memory Card Table entry for the physical memory card with the same chassis index that this memory device port is associated with (if any).	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

#### **Monitor Port Table**

Name	monitorPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.50
Description	Defines the Monitor Port Table.
Syntax	IntegerMonitorPortTableEntry
Access	Not accessible

#### **Monitor Port Table Entry**

Name	monitorPortTableEntry	
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1	
Description	Defines the Monitor Port Table entry.	
Syntax	MonitorPortTableEntry	
Access	Not accessible	
Index	monitorPortchassisIndex, monitorPortIndex	

#### **Monitor Port Chassis Index**

Name	monitorPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.1
Description	Defines the index (one-based) of this chassis
Syntax	DellObjectRange
Access	Read-only

#### **Monitor Port Index**

Name	monitorPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.2
Description	Defines the index of the monitor ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Monitor Port State Capabilities**

Name	monitorPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.3
Description	Defines the capabilities of the monitor port.
Syntax	DellStateCapabilities
Access	Read-only

#### **Monitor Port State Settings**

Name	monitorPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.4
Description	Defines the state of the monitor port.
Syntax	DellStateSettings
Access	Read-write

#### **Monitor Port Status**

Name	monitorPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.5
Description	Defines the status of the monitor port.
Syntax	DellStatus
Access	Read-only

#### **Monitor Port Security State**

Name	monitorPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.6
Description	Defines the security settings of the monitor port.
Syntax	DellPortSecurityState
Access	Read-only

#### **Monitor Port Connector Type**

Name	monitorPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.7
Description	Defines the connector type of the monitor port.
Syntax	DellMonitorPortConnectorTypes (See Table 12-5.)
Access	Read-only

#### **Monitor Port Name**

Name	monitorPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.8
Description	Defines the name of the monitor port.
Syntax	DellString
Access	Read-only

#### **Monitor Port BIOS Connector Type**

Name	monitorPortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.50.1.9
Description	Defines the name of the BIOS connector type of the monitor port.
Syntax	DellGenericPortConnectorType
Access	Read-only

#### Small Computer System Interface (SCSI) Port Table

Name	sCSIPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.60
Description	Defines the SCSI Port Table.
Syntax	IntegerSCSIPortTableEntry
Access	Not accessible

#### **SCSI Port Table Entry**

Name	sCSIPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1
Description	Defines the SCSI Port Table entry.
Syntax	SCSIPortTableEntry
Access	Not accessible
Index	sCSIPortchassisIndex, sCSIPortIndex

#### **SCSI Port Chassis Index**

Name	sCSIPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.1
Description	Defines the index (one-based) of this chassis
Syntax	DellObjectRange
Access	Read-only

#### **SCSI Port Index**

Name	sCSIPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.2
Description	Defines the index of the SCSI ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **SCSI Port State Capabilities**

Name	sCSIPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.3
Description	Defines the capabilities of the SCSI port.
Syntax	DellStateCapabilities
Access	Read-only

#### **SCSI Port State Settings**

Name	DellStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.4
Description	Defines the state and settings of the SCSI port.
Syntax	DellStatus
Access	Read-write

#### **SCSI Port Status**

Name	sCSIPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.5
Description	Defines the status of the SCSI port.
Syntax	DellStatus
Access	Read-only

#### **SCSI Port Security State**

Name	sCSIPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.6
Description	Defines the security settings of the SCSI port.
Syntax	DellPortSecurityState
Access	Read-only

#### **SCSI Port Connector Type**

Name	sCSIPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.7
Description	Defines the connector type of the SCSI port.
Syntax	DellSCSIPortConnectorType (See Table 12-6.)
Access	Read-only

#### **SCSI Port Name**

Name	sCSIPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.8
Description	Defines the name of the SCSI port.
Syntax	DellString
Access	Read-only

#### SCSI Port BIOS Connector Type

Name	sCSIPortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.60.1.9
Description	Defines the BIOS connector type of the SCSI port.
Syntax	DellGenericPortConnectorType
Access	Read-only

#### Parallel Port Table

Name	parallelPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.70
Description	Defines the Parallel Port Table.
Syntax	IntegerParallelPortTableEntry
Access	Not accessible

#### **Parallel Port Table Entry**

Name	parallelPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1
Description	Defines the Parallel Port Table entry.
Syntax	ParallelPortTableEntry
Access	Not accessible
Index	parallelPortchassisIndex, parallelPortIndex

#### **Parallel Port Chassis Index**

Name	parallelPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Parallel Port Index**

Name	parallelPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.2
Description	Defines the index of the parallel ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Parallel Port State Capabilities**

Name	parallelPortStateCapabilities	
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.3	
Description	Defines the capabilities of the parallel port.	
Syntax	DellStateSettings	
Access	Read-write	

#### **Parallel Port State Settings**

Name	parallelPortStateSettings	
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.4	
Description	Defines the state and settings of the parallel port.	
Syntax	DellStateSettings	
Access	Read-write	

#### **Parallel Port Status**

Name	parallelPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.5
Description	Defines the status of the parallel port.
Syntax	DellStatus
Access	Read-only

#### **Parallel Port Security State**

Name	DellPortSecurityState	
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.6	
Description	Defines the security state of the parallel port.	
Syntax	DellStatus	
Access	Read-only	

#### **Parallel Port Connector Type**

Name	parallelPortConnectorType	
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.7	
Description	Defines the connector type of the parallel port.	
Syntax	DellParallelPortConnectorType	
Access	Read-only	

#### **Parallel Port Name**

Name	parallelPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.8
Description	Defines the name of the parallel port.
Syntax	DellString
Access	Read-only

#### Parallel Port Connector Pin Out

Name	parallelPortConnectorPinOut
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.9
Description	Defines the pinout of the parallel port.
Syntax	DellParallelPortConnectorPinout
Access	Read-only

#### **Parallel Port Capabilities Unique**

Name	parallelPortCapabilitiesUnique	
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.10	
Description	Defines the capabilities of the parallel port.	
Syntax	DellParallelPortConnectorPinout	
Access	Read-only	

#### Parallel Port Base I/O Address

Name	parallelPortBaseIOAddress
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.11
Description	Defines the Base Input/Output (I/O) address of the parallel port.
Syntax	DellUnsigned64BitRange
Access	Read-only

#### Parallel Port IRQ Level

Name	parallelPortIRQLevel
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.12
Description	Defines the Interrupt Request Level (IRQ) of the parallel port.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### Parallel Port DMA Support

Name	parallelPortDMASupport
Object ID	1.3.6.1.4.1.674.10892.1.1000.70.1.13
Description	Defines if direct memory access (DMA) is supported by the parallel port.
Syntax	DellBoolean
Access	Read-only

#### **Serial Port Table**

Name	serialPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.80
Description	Defines the Serial Port Table.
Syntax	IntegerSerialPortTableEntry
Access	Not accessible

#### **Serial Port Table Entry**

Name	serialPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1
Description	Defines the Serial Port Table entry.
Syntax	SerialPortTableEntry
Access	Not accessible

#### Serial Port Chassis Index

Name	serialPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### Serial Port Index

Name	serialPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.2
Description	Defines the index of the serial ports in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Serial Port State Capabilities**

Name	serialPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.3
Description	Defines the capabilities of the serial port.
Syntax	DellStateCapabilities
Access	Read-only

#### **Serial Port State Settings**

Name	serialPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.4
Description	Defines the state and settings of the serial port.
Syntax	DellStateSettings
Access	Read-write

#### **Serial Port Status**

Name	serialPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.5
Description	Defines the status of the serial port.
Syntax	DellStatus
Access	Read-only

#### Serial Port Security State

Name	serialPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.6
Description	Defines the security settings of the serial port.
Syntax	DellPortSecurityState
Access	Read-only

#### **Serial Port Connector Type**

Name	serialPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.7
Description	Defines connector type of the serial port.
Syntax	DellSerialPortConnectorType
Access	Read-only

#### Serial Port Name

Name	serialPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.8
Description	Defines the name of the serial port.
Syntax	DellString
Access	Read-only

#### **Serial Port Maximum Speed**

Name	serialPortMaximumSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.9
Description	Defines the maximum speed the serial interface can support in bits per second (bps).
Syntax	DellUnsigned32BitRange
Access	Read-only

#### Serial Port Capabilities Unique

Name	serialPortCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.10
Description	Defines additional capabilities of the serial port.
Syntax	DellSerialPortCapabilitiesUnique
Access	Read-only

#### Serial Port Base I/O Address

Name	serialPortBaseIOAddress
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.11
Description	Defines the base I/O address of the serial port.
Syntax	DellUnsigned64BitRange
Access	Read-only

#### Serial Port IRQ Level

Name	serialPortIRQLevel
Object ID	1.3.6.1.4.1.674.10892.1.1000.80.1.12
Description	Defines the IRQ of the serial port.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **Universal Serial Bus (USB) Port Table**

Name	uSBPortTable
Object ID	1.3.6.1.4.1.674.10892.1.1000.90
Description	Defines the USB Port Table.
Syntax	IntegerUSBPortTableEntry
Access	Not accessible

#### **USB Port Table Entry**

Name	uSBPortTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1
Description	Defines the USB Port Table entry.
Syntax	USBPortTableEntry
Access	Not accessible
Index	pointing Portchassis Index, pointing PortIndex

#### **USB Port Chassis Index**

Name	uSBPortchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **USB** Port Index

Name	uSBPortIndex
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.2
Description	Defines the index of the USB ports in this chassis
Syntax	DellObjectRange
Access	Read-only

#### **USB Port State Capabilities**

Name	uSBPortStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.3
Description	Defines the capabilities of the USB port.
Syntax	DellStateCapabilities
Access	Read-only

#### **USB Port State Settings**

Name	uSBPortStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.4
Description	Defines the state and settings of the USB port.
Syntax	DellStateSettings
Access	Read-write

#### **USB Port Status**

Name	uSBPortStatus
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.5
Description	Defines the state of the USB port.
Syntax	DellStatus
Access	Read-only

#### **USB Port Security State**

Name	uSBPortSecurityState
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.6
Description	Defines the security settings of the USB port.
Syntax	DellPortSecurityState
Access	Read-only

#### **USB Port Connector Type**

Name	uSBPortConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.7
Description	Defines the connector type of the USB port.
Syntax	DellUSBPortConnectorType
Access	Read-only

#### **USB Port Name**

Name	uSBPortName
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.8
Description	Defines the name of the USB port.
Syntax	DellString
Access	Read-only

#### **USB Port BIOS Connector Type**

Name	uSBPortBIOSConnectorType
Object ID	1.3.6.1.4.1.674.10892.1.1000.90.1.9
Description	Defines the BIOS connector type of the USB port.
Syntax	DellGenericPortConnectorType
Access	Read-only

### Port Group Variable Values

Variable Name: DellPointingPortConnectorType

This section includes definitions for server administrator-specific variable values used in this section.

Data Type: Integer	
Possible Data Values	Meaning of Data Value
connectorPortTypeIsOther(1)	The pointing port connector type is not one of the following:
connectorPortTypeIsUnknown(2)	The pointing port connector type is unknown.
connectorPortTypeIsSerial(3)	The pointing port connector type is serial.
connectorPortTypeIsPS2(4)	The pointing port connector type is a Personal System/2 (PS/2).
connectorPortTypeIsInfrared(5)	The pointing port connector type is infrared.
connectorPortTypeIsHPHIL(6)	The pointing port connector type is HP-HIL.
connectorPortTypeIsBusMouse(7)	The pointing port connector type is a bus mouse.
connectorPortTypeIsADB(8)	The pointing port connector type is ADB.
connectorPortTypeIsDB9(9)	The pointing port connector type is nine-pin DB-9.
connectorPortTypeIsMicroDIN(10)	The pointing port connector type is micro Deutsche Industrie Norm (DIN).
connectorPortTypeIsAccessBusUSB(11)	The pointing port connector type is Access Bus USB.
connectorPortTypeIsPC98(12)	The port connector type is a PC-98.

#### Table 12-1. Pointing Port Connector Type

#### Table 12-2. Keyboard Port Connector Types

Variable Name: DellKeyboardPortConnectorType

Data Type: Integer

Possible Data Values	Meaning of Data Value
connectorPortTypeIsOther(1)	The keyboard port connector type is not one of the following:
connectorPortTypeIsUnknown(2)	The keyboard port connector type is unknown.
connectorPortTypeIsMiniDIN(3)	The keyboard port connector type is a mini DIN.
connectorPortTypeIsMicroDIN(4)	The keyboard port connector type is a MicroDIN.
connectorPortTypeIsPS2(5)	The keyboard port connector type is PS/2.
connectorPortTypeIsInfrared(6)	The keyboard port connector type is infrared.
connectorPortTypeIsHPHIL(7)	The keyboard port connector type is HP-HIL.
connectorPortTypeIsDB9(8)	The keyboard port connector type is DB-9.
connectorPortTypeIsAccessBusUSB(9)	The keyboard port connector type is bus USB.
connectorPortTypeIsPC98(10)	The keyboard port connector type is PC-98.

#### Table 12-3. Processor Port Connector Types

#### Data Type: Integer

Possible Data Values	Meaning of Data Value
connectorPortTypeIsOther(1)	The processor port connector type is not one of the following:
connectorPortTypeIsUnknown(2)	The processor port connector type is unknown.
connectorPortTypeIsDaughterdBoard(3)	The processor port connector type is a daughter board.
connectorPortTypeIsZIFSocket(4)	The processor port connector type is a zero insertion force (ZIF) socket.
connectorPortTypeIsAPiggyBackBoard(5)	The processor port connector type is a replacement piggyback board.
connectorPortTypeIsNone(6)	There is no processor port connector; processor is soldered in place.
connectorPortTypeIsLIFSocket(7)	The processor port connector type is a low insertion force (LIF) socket.
connectorPortTypeIsSlot1(8)	The processor port connector type is a slot one.
connectorPortTypeIsSlot2(9)	The processor port connector type is a slot two.
connectorPortTypeIs370PinSocket(10)	The processor port connector type is a 370 pin socket.

#### Table 12-4. Memory Device Port Connector Types

connectorPortTypeIsSRIMM(14)

Data Type: Integer **Possible Data Value** Meaning of Data Value connectorPortTypeIsOther(1) The memory device port connector type is not one of the following: connectorPortTypeIsUnknown(2) The memory device port connector type is unknown. connectorPortTypeIsSIMM(3) The memory device port connector type is a single in-line memory module (SIMM). connectorPortTypeIsSIP(4) The memory device port connector type is a SIP. The memory device port connector type is a chip. connectorPortTypeIsAChip(5) The memory device port connector type is a dual in-line connectorPortTypeIsDIP(6) package (DIP). connectorPortTypeIsZIP(7) The memory device port connector type is a ZIP. connectorPortTypeIsAProprietaryCard(8) The memory device port connector type is a proprietary card. connectorPortTypeIsDIMM(9) The memory device port connector type is a dual in-line memory module (DIMM). The memory device port connector type is a TSOP. connectorPortTypeIsTSOP(10) connectorPortTypeIsARowOfChips(11) The memory device port connector type is a row of chips. connectorPortTypeIsRIMM(12) The memory device port connector type is a Rambus Inline Memory Module (RIMM). connectorPortTypeIsSODIMM(13) The memory device port connector type is a small outline, dual in-line memory module (SODIMM).

Variable Name: DellMemoryDevicePortConnectorType

The memory device port connector type is a SRIMM.

#### Table 12-5. Monitor Port Connector Types

Variable Name: DellMonitorPortConnectorType

Data Type: Integer

Possible Data Values	Meaning of Data Value
connectorPortTypeIsOther(1)	The monitor port connector type is not one of the following:
connectorPortTypeIsUnknown(2)	The monitor port connector type is unknown.
connectorPortTypeIsDB15PinMale(3)	The monitor port connector type is a male DB-15.
connectorPortTypeIsDB15PinFemale(4)	The monitor port connector type is a female DB-15.

#### Table 12-6. SCSI Port Connector Types

Variable Name: DellSCSIPortConnectorType		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
connectorPortTypeIsOther(1)	The SCSI port connector type is not one of the following:	
connectorPortTypeIsUnknown(2)	The SCSI port connector type is unknown.	
connectorPortTypeIsDIN25pin(3)	The SCSI port connector type is a DIN 25-pin.	
connectorPortTypeIsDIN50pin(4)	The SCSI port connector type is a DIN 50-pin.	
connectorPortTypeIsDIN68pin(5)	The SCSI port connector type is a DIN 68-pin.	

# 13

## **Device Group**

The Device Group provides information about different types of pointing, keyboard, processor, cache, memory, and peripheral component interconnect (PCI) devices. Variables in this group cover information about type, settings, configuration, manufacturer, address or location, and if applicable, the speed of the device.

### **Device Tables**

The following management information base (MIB) tables define objects in the Device Group:

- Pointing Device Table
- Keyboard Device Table
- Processor Device Table
- Processor Device Status Table
- Cache Device Table
- Memory Device Table
- Memory Device Mapped Address Table
- Generic Device Table
- PCI Device Table
- PCI Device Configuration Space Table
- Network Device Table

#### **Pointing Device Table**

Name	pointingDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.10
Description	Defines the Pointing Device Table. This group of objects references the Pointing Port Index (See Section 12).
Syntax	SEQUENCE OF PointingDeviceTableEntry
Access	Not accessible

#### **Pointing Device Table Entry**

Name	pointingDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1
Description	Defines the Pointing Device Table entry.
Syntax	PointingDeviceTableEntry
Access	Not accessible
Index	pointing Device chassis Index, pointing Device Index

#### **Pointing Device Chassis Index**

Name	pointingDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Pointing Device Index**

Name	pointingDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.2
Description	Defines the index of the pointing device in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Pointing Device State Capabilities**

Name	pointingDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.3
Description	Defines the capabilities of the pointing device.
Syntax	DellStateCapabilities
Access	Read-only

#### **Pointing Device State Settings**

Name	pointingDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.4
Description	Defines the state of the pointing device.
Syntax	DellStateSettings
Access	Read-write

#### **Pointing Device Status**

Name	pointingDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.5
Description	Defines the status of the pointing device.
Syntax	DellStatus
Access	Read-only

#### **Pointing Port Index Reference**

Name	pointingPortIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.6
Description	Defines the index to the pointing port in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Pointing Device Type**

Name	pointingDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.7
Description	Defines the type of the pointing device.
Syntax	DellPointingDeviceType (See Table 13-1.)
Access	Read-only

#### **Pointing Device Number of Buttons**

Name	pointingDeviceNumberofButtons
Object ID	1.3.6.1.4.1.674.10892.1.1100.10.1.8
Description	Defines the number of buttons on the pointing device.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **Keyboard Device Table**

Name	keyboardDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.20
Description	Defines the Keyboard Device Table. This table references the Keyboard Port Index (See Section 12).
Syntax	SEQUENCE OF KeyboardDeviceTableEntry
Access	Not accessible

#### **Keyboard Device Table Entry**

Name	keyboardDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1
Description	Defines the Keyboard Device Table entry.
Syntax	KeyboardDeviceTableEntry
Access	Not accessible
Index	keyboardDevicechassisIndex, keyboardDeviceIndex

#### **Keyboard Device Chassis Index**

Name	keyboardDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Keyboard Device Index**

Name	keyboardDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.2
Description	Defines the index of the keyboard device for this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Keyboard Device State Capabilities**

Name	keyboardDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.3
Description	Defines the capabilities of the keyboard device.
Syntax	DellStateCapabilities
Access	Read-only

## **Keyboard Device State Settings**

Name	keyboardDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.4
Description	Defines the state of the keyboard device.
Syntax	DellStatesSettings
Access	Read-write

## **Keyboard Device Status**

Name	keyboardDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.5
Description	Defines the status of the keyboard device.
Syntax	DellStatus
Access	Read-only

## **Keyboard Port Index Reference**

Name	keyboardPortIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.6
Description	Defines the index to the associated the keyboard port in this chassis.
Syntax	DellStatus
Access	Read-only

## Keyboard Device Type Name

Name	keyboardDeviceTypeName
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.7
Description	Defines the name of the keyboard type.
Syntax	DellString
Access	Read-only

### **Keyboard Device Layout Name**

Name	keyboardDeviceLayoutName
Object ID	1.3.6.1.4.1.674.10892.1.1100.20.1.8
Description	Defines the name of the keyboard layout.
Syntax	DellString
Access	Read-only

# **Processor Device Table**

Name	processorDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.30
Description	Defines the Processor Device Table.
Syntax	SEQUENCE OF ProcessorDeviceTableEntry
Access	Not accessible

## **Processor Device Table Entry**

Name	processorDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1
Description	Defines the Processor Device Table entry.
Syntax	ProcessorDeviceTableEntry
Access	Not accessible
Index	$processor Device chassis Index, \ processor Device Index\\$

### **Processor Device Chassis Index**

Name	processorDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Processor Device Index**

Name	processorDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.2
Description	Defines the index of the processor device in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Processor Device State Capabilities**

Name	processorDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.3
Description	Defines the capabilities of the processor device.
Syntax	DellStateCapabilities
Access	Read-only

## **Processor Device State Settings**

Name	processorDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.4
Description	Defines the state of the processor device.
Syntax	DellStateSettings
Access	Read-write

## **Processor Device Status**

Name	processorDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.5
Description	Defines the status of the processor device.
Syntax	DellStatus
Access	Read-only

## **Processor Port Index Reference**

Name	processorPortIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.6
Description	Defines the index to the associated processor port in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Processor Device Type**

Name	processorDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.7
Description	Defines the type of processor device.
Syntax	DellProcessorDeviceType (See Table 13-4)
Access	Read-only

### **Processor Device Manufacturer Name**

Name	processorDeviceManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.8
Description	Defines the name of manufacturer of the processor device.
Syntax	DellString
Access	Read-only

## **Processor Device Status State**

Name	processorDeviceStatusState
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.9
Description	Defines the status state of the processor device.
Syntax	DellProcessorDeviceStatusState (See Table 13-2.)
Access	Read-only

## **Processor Device Family**

Name	processorDeviceFamily
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.10
Description	Defines the family of the processor device.
Syntax	DellProcessorDeviceFamily (See Table 13-6.)
Access	Read-only

## **Processor Device Maximum Speed**

Name	processorDeviceMaximumSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.11
Description	Defines the maximum speed of the processor device in megahertz (MHz). A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Processor Device Current Speed**

Name	processorDeviceCurrentSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.12
Description	Defines the current speed of the processor device in MHz. A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Processor Device External Clock Speed**

Name	processorDeviceExternalClockSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.13
Description	Defines the speed of the external clock (the front-side bus speed) for the processor device in MHz. A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

### **Processor Device Voltage**

Name	processorDeviceVoltage
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.14
Description	Defines he voltage powering the processor device in millivolts. A zero (0) indicates the speed is unknown.
Syntax	DellSigned32BitRange
Access	Read-only

## **Processor Device Upgrade Information**

Name	processorDeviceUpgradeInformation
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.15
Description	Defines the processor upgrade information for the processor device.
Syntax	DellProcessorUpgradeInformation (See Table 13-5.)
Access	Read-only

### **Processor Device Version Name**

Name	processorDeviceVersionName
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.16
Description	Defines the version name of the processor device.
Syntax	DellString
Access	Read-only

## **Processor Device Core Count**

Name	processorDeviceCoreCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.17
Description	Defines the number of processor cores detected for the processor device.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Processor Device Core Enabled Count**

Name	processorDeviceCoreEnabledCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.18
Description	Defines the number of processor cores enabled for the processor device.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Processor Device Thread Count**

Name	processorDeviceThreadCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.19
Description	Defines the number of processor threads detected for the processor device.
Syntax	DellUnsigned32BitRange
Access	Read-only

### **Processor Device Characteristics**

Name	processor	DeviceCharacteristics
Object ID	1.3.6.1.4.1.6	74.10892.1.1100.30.1.20
Description	attribute is a when set to <b>NOTE: Bits 2</b>	te defines characteristics of the processor device. This a bit field where a bit has the meaning defined below l (one). 2-15 need to be examined in the context of bit 1. If bit 1 is essor characteristics are unknown and bits 2-15 cannot be
	used to deter supported.	mine if the functions associated with the bits are
	Bit Position	Meaning if Set
	Bit 0	Reserved
	Bit 1	Unknown
	Bit 2	64-bit capable
	Bit 3-15	Reserved
Syntax	DellUnsigne	d16BitRange
Access	Read-only	

# **Processor Device Extended Capabilities**

Name	processorDeviceExtendedCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.21
Description	This attribute defines extended capabilities of the processor device. This attribute is a bit field where a bit has the meaning defined below when set to 1 (one).
	Bit Position Meaning if Set
	Bit 0Virtualization Technology (VT) supportedBit 1Demand-Based Switching (DBS) supportedBit 2eXecute Disable (XD) supported
	Bit 3 Hyper-Threading (HT) supported
Syntax	DellUnsigned16BitRange
Access	Read-only

## **Processor Device Extended Settings**

Name	processo	rDeviceExtendedSettings
Object ID	1.3.6.1.4.1.6	74.10892.1.1100.30.1.22
Description	This attribute defines extended settings of the processor device. This attribute is a bit field where a bit has the meaning defined below when set to 1 (one).	
	Bit Position	Meaning if Set
	Bit 0	Virtualization Technology (VT) enabled
	Bit 1	Demand Based Switching (DBS) enabled
	Bit 2	eXecute Disable (XD) enabled
	Bit 3	Hyper-Threading (HT) enabled
Syntax	DellUnsigne	ed16BitRange
Access	Read-only	

## **Processor Device Brand Name**

Name	processorDeviceBrandName
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.23
Description	Defines the brand of the processor device.
Syntax	DellString
Access	Read-only

## **Processor Device Model Name**

Name	processorDeviceModelName
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.24
Description	Defines the model of the processor device.
Syntax	DellString
Access	Read-only

## **Processor Device Stepping Name**

Name	processorDeviceSteppingName
Object ID	1.3.6.1.4.1.674.10892.1.1100.30.1.25
Description	Defines the stepping of the processor device.
Syntax	DellString
Access	Read-only

# **Processor Device Status Table**

Name	processorDeviceStatusTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.32
Description	Defines the Processor Device Status Table.
Syntax	SEQUENCE OF ProcessorDeviceStatusTableEntry
Access	Not accessible

### **Processor Device Status Table Entry**

Name	processorDeviceStatusTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1
Description	Defines the Processor Device Status Table Entry.
Syntax	ProcessorDeviceStatusTableEntry
Access	Not accessible
Index	processorDeviceStatusChassisIndex, processorDeviceStatusIndex

## **Processor Device Status Chassis Index**

Name	processorDeviceStatusChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

### **Processor Device Status Index**

Name	processorDeviceStatusIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.2
Description	Defines the index (one-based) of the processor device status probe.
Syntax	DellObjectRange
Access	Read-only

## **Processor Device Status State Capabilities**

Name	processorDeviceStatusStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.3
Description	Defines the state capabilities of the processor device status probe.
Syntax	DellStateCapabilities
Access	Read-only

## **Processor Device Status State Settings**

Name	processorDeviceStatusStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.4
Description	Defines the state settings of the processor device status probe.
Syntax	DellStateSettings
Access	Read-write

## **Processor Device Status Status**

Name	processorDeviceStatusStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.5
Description	Defines the status of the processor device status probe. This status will be joined into the processorDeviceStatus attribute.
Syntax	DellStatus
Access	Read-only

## **Processor Device Status Reading**

Name	processorDeviceStatusReading
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.6
Description	Defines the reading of the processor device status probe.
Syntax	DellProcessorDeviceStatusReading
Access	Read-only

## **Processor Device Status Location Name**

Name	processorDeviceStatusLocationName
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.7
Description	Defines the location name of the processor device status probe.
Syntax	DellString
Access	Read-only

## **Processor Device Status Port Index Reference**

Name	processorDeviceStatusPortIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.32.1.8
Description	Defines the index (one-based) of the associated processor port in the same chassis.
Syntax	DellObjectRange
Access	Read-only

# **Cache Device Table**

Name	cacheDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.40
Description	Defines the Cache Device Table.
Syntax	SEQUENCE OF CacheDeviceTableEntry
Access	Not accessible

## **Cache Device Table Entry**

Name	cacheDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1
Description	Defines the Cache Device Table entry.
Syntax	CacheDeviceTableEntry
Access	Not accessible
Index	cacheDevicechassisIndex, cacheDeviceIndex

## **Cache Device Chassis Index**

Name	cacheDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Cache Device Index**

Name	cacheDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.2
Description	Defines the index of the cache device in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Cache Device State Capabilities**

cacheDeviceStateCapabilities
1.3.6.1.4.1.674.10892.1.1100.40.1.3
Defines the capabilities of the cache device.
DellStateCapabilities
Read-only

### **Cache Device State Settings**

Name	cacheDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.4
Description	Defines the state of the cache device.
Syntax	DellStateSettings
Access	Read-write

## **Cache Device Status**

Name	cacheDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.5
Description	Defines the status of the cache device.
Syntax	DellStatus
Access	Read-only

## **Cache Device Processor Device Index Reference**

Name	cacheDeviceprocessorDeviceIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.6
Description	Defines the index number of the processor device with which this cache device is associated.
Syntax	DellObjectRange
Access	Read-only

## **Cache Device Type**

Name	cacheDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.7
Description	Defines the type of cache device.
Syntax	DellCacheDeviceType (See Table 13-7.)
Access	Read-only

### **Cache Device Location**

Name	cacheDeviceLocation
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.8
Description	Defines the location of the cache device.
Syntax	DellCacheDeviceLocation (See Table 13-13.)
Access	Read-only

## **Cache Device Status State**

Name	cacheDeviceStatusState
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.9
Description	Defines the status state of the cache device.
Syntax	DellCacheDeviceStatusState (See Table 13-10.)
Access	Read-only

## **Cache Device External Socket Name**

Name	cacheDeviceExternalSocketName
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.10
Description	Defines the external socket name of the cache device, if the cache is socketed.
Syntax	DellString
Access	Read-only

### **Cache Device Level**

Name	cacheDeviceLevel
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.11
Description	Defines the level of the cache device.
Syntax	DellCacheDeviceLevel (See Table 13-8)
Access	Read-only

### **Cache Device Maximum Size**

Name	cacheDeviceMaximumSize
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.12
Description	Defines the maximum size of the cache device in kilobytes (KB). A zero (0) indicates that the size is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Cache Device Current Size**

Name	cacheDeviceCurrentSize
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.13
Description	Defines the current size of the cache device in KB. A zero (0) indicates that the size is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

### **Cache Device Speed**

Name	cacheDeviceSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.14
Description	Defines the speed of the cache device in nanoseconds. A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

### **Cache Device Write Policy**

Name	cacheDeviceWritePolicy
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.15
Description	Defines the write policy of the cache device.
Syntax	DellCacheDeviceWritePolicy (See Table 13-9.)
Access	Read-only

### **Cache Device Is Socketed**

Name	cacheDeviceIsSocketed
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.16
Description	Defines if the cache device is socketed.
Syntax	DellBoolean
Access	Read-only

## Cache Device Error Checking and Correction (ECC) Type

Name	cacheDeviceECCType
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.17
Description	Defines the type of error correction in use by the cache device.
Syntax	DellCacheDeviceECCType (See Table 13-7.)
Access	Read-only

## **Cache Device Associativity**

Name	cacheDeviceAssociativity
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.18
Description	Defines the type of associativity in use by the cache device.
Syntax	DellCacheDeviceAssociativity (See Table 13-12.)
Access	Read-only

## **Cache Device Supported Type**

Name	cacheDeviceSupportedType
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.19
Description	Defines the type of static random-access memory (SRAM) that the cache device can support.
Syntax	DellCacheDeviceSupportedType
Access	Read-only

## **Cache Device Current Type**

Name	cacheDeviceCurrentType
Object ID	1.3.6.1.4.1.674.10892.1.1100.40.1.20
Description	Defines the current type of SRAM for the cache device.
Syntax	DellCacheDeviceSRAMType (See Table 13-14.)
Access	Read-only

# **Memory Device Table**

Name	memoryDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.50
Description	Defines the Memory Device Table.
Syntax	SEQUENCE OF MemoryDeviceTableEntry
Access	Not accessible

## **Memory Device Table Entry**

Name	memoryDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1
Description	Defines the Memory Device Table entry.
Syntax	MemoryDeviceTableEntry
Access	Not accessible
Index	memoryDevicechassisIndex, memoryDeviceIndex

### **Memory Device Chassis Index**

Name	memoryDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Memory Device Index**

Name	memoryDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.2
Description	Defines the index of the memory device in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Memory Device State Capabilities**

Name	memoryDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.3
Description	Defines the capabilities of the memory device.
Syntax	DellStateCapabilities
Access	Read-only

### **Memory Device State Settings**

Name	memoryDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.4
Description	Defines the state of the memory device.
Syntax	DellStateSettings
Access	Read-write

## **Memory Device Status**

Name	memoryDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.5
Description	Defines the status of the memory device.
Syntax	DellStatus
Access	Read-only

### **Memory Device Memory Port Index Reference**

Name	memoryDeviceMemoryPortIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.6
Description	Defines the index of the memory port of which this memory device is part.
Syntax	DellObjectRange
Access	Read-only

#### **Memory Device Type**

Name	memoryDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.7
Description	Defines the type of the memory device.
Syntax	DellMemoryDeviceType (See Table 13-16.)
Access	Read-only

#### **Memory Device Location Name**

Name	memoryDeviceLocationName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.8
Description	Defines the location name of the memory device.
Syntax	DellString
Access	Read-write

#### **Memory Device Error Count**

**NOTE:** Memory Device Failure Modes has now replaced this attribute. Memory Device Error Count should no longer be used. If you use the Memory Device Error Count attribute, the value returned is always zero, and using the attribute will have no effect.

Name	memoryDeviceErrorCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.9
Description	Defines the total number of Error Checking and Correction (ECC) errors detected by the memory device. Writing a 0 (zero) to this variable will reset the devices error counts.
Syntax	DellSigned32BitRange
Access	Read-write

## Memory Device Bank Location Name

Name	memoryDeviceBankLocationName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.10
Description	Defines the bank location name of the memory device.
Syntax	DellString
Access	Read-only

## Memory Device Type Details

Name	memoryDeviceTypeDetails
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.11
Description	Defines the detailed type of the memory device.
Syntax	DellMemoryDeviceTypeDetails (See Table 13-17.)
Access	Read-only

### Memory Device Form Factor

Name	memoryDeviceFormFactor
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.12
Description	Defines the form factor of the memory device.
Syntax	DellMemoryDeviceFormFactor (See Table 13-15.)
Access	Read-only

## **Memory Device Set**

Name	memoryDeviceSet
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.13
Description	Defines if the memory device is a part of a set. A zero (0) indicates that this device is not part of a set.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Memory Device Size**

Name	memoryDeviceSize
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.14
Description	Defines the size in KB of the memory device.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Memory Device Speed**

Name	memoryDeviceSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.15
Description	Defines the speed in nanoseconds of the memory device. A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Memory Device Total Bus Width**

Name	memoryDeviceTotalBusWidth
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.16
Description	Defines the total number of bits, including ECC, used by the memory device.
Syntax	DellUnsigned32BitRange
Access	Read-only

### Memory Device Total Data Bus Width

Name	memoryDeviceTotalDataBusWidth
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.17
Description	Defines the total number of data bits used by the memory device.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### **Memory Device Correctable Memory Event Count**



**NOTE:** Memory Device Failure Modes has now replaced this attribute. Memory Device Correctable Memory Event Count should no longer be used. If you use the Memory Device Correctable Memory Event Count attribute, the value returned is always zero, and using the attribute will have no effect.

Name	memoryDeviceSingleBitErrorCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.18
Description	Defines the total number of Correctable Memory Events detected by the memory device.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Memory Device Uncorrectable Memory Event Count**

**NOTE:** Memory Device Failure Modes has now replaced this attribute. Memory Device Uncorrectable Memory Event Count should no longer be used. If you use the Memory Device Uncorrectable Memory Event Count attribute, the value returned is always zero, and using the attribute will have no effect.

Name	memoryDeviceMultiBitErrorCount
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.19
Description	Defines the total number of Uncorrectable Memory Events detected by the memory device.
Syntax	DellSigned32BitRange
Access	Read-only

#### **Memory Device Failure Modes**

Name Object ID	memoryDeviceFailureModes 1.3.6.1.4.1.674.10892.1.1100.50.1.20
Description	Defines the failure modes of the memory device when the memoryDeviceStatus attribute is not OK. It is a bit field that can be used to report more than one type of failure mode by using a combination of the defined bit masks.
Syntax	DellMemoryDeviceFailureModes
Access	Read-only

## Memory Device Manufacturer Name

Name	memoryDeviceManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.21
Description	Defines the manufacturer of the memory device.
Syntax	DellString
Access	Read-only

### Memory Device Part Number Name

Name	memoryDevicePartNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.22
Description	Defines the manufacturer's part number for the memory device.
Syntax	DellString
Access	Read-only

### Memory Device Serial Number Name

Name	memoryDeviceSerialNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.23
Description	Defines the serial number of the memory device.
Syntax	DellString
Access	Read-only

## Memory Device Asset Tag Name

Name	memoryDeviceAssetTagName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.24
Description	Defines the asset tag of the memory device.
Syntax	DellString
Access	Read-only

### **Memory Device Speed Name**

Name	memoryDeviceSpeedName
Object ID	1.3.6.1.4.1.674.10892.1.1100.50.1.25
Description	This attribute defines the speed of the memory device in string format with units specified in string.
Syntax	DellString
Access	Read-only

# Memory Device Mapped Address Table

Name	memoryDeviceMappedAddressTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.60
Description	Defines the Memory Device Mapped Address Table.
Syntax	SEQUENCE OF MemoryDeviceMappedAddressTableEntry
Access	Not accessible

## Memory Device Mapped Address Table Entry

Name	memoryDeviceMappedAddressTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1
Description	Defines the Memory Device Mapped Address Table entry.
Syntax	MemoryDeviceMappedAddressTableEntry
Access	Not accessible
Index	memoryDeviceMappedAddresschassisIndex, memoryDeviceMappedAddressIndex

### Memory Device Mapped Address Chassis Index

Name	memoryDeviceMappedAddresschassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### **Memory Device Mapped Address Index**

Name	memoryDeviceMappedAddressIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.2	
Description	Defines the index (one-based) of the memory device mapped address in this chassis.	
Syntax	DellObjectRange	
Access	Read-only	

#### **Memory Device Mapped Address State Capabilities**

Name	memoryDeviceMappedAddressStateCapabilities	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.3	
Description	Defines the capabilities of the memory device mapped address.	
Syntax	DellStateCapabilities	
Access	Read-only	

## **Memory Device Mapped Address State Settings**

Name	memoryDeviceMappedAddressStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.4
Description	Defines the state of the memory device mapped address.
Syntax	DellStateSettings
Access	Read-write

### **Memory Device Mapped Address Status**

Name	memoryDeviceMappedAddressStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.5
Description	Defines the status of the memory device mapped address.
Syntax	DellStatus
Access	Read-only

### **Memory Device Index Reference**

Name	memoryDeviceIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.6
Description	Defines the index of the memory device(s) associated with this memory device mapped address.
Syntax	DellObjectRange
Access	Read-only

### **Memory Device Mapped Address Row Position**

Name	memoryDeviceMappedAddressRowPosition	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.7	
Description	Defines the position of the referenced memory in a row of the memory device mapped address.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

### **Memory Device Mapped Address Interleave Position**

Name	memoryDeviceMappedAddressInterleavePosition	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.8	
Description	Defines the position of the referenced memory in an interleave of the memory device mapped address.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

### Memory Device Mapped Address Interleave Depth

Name	memoryDeviceMappedAddressInterleaveDepth	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.9	
Description	Defines the maximum number of consecutive rows from the referenced memory device that are accessed in a single interleaved transfer in the memory device mapped address.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

### Memory Device Mapped Address Starting Address

Name	memoryDeviceMappedAddressStartingAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.10
Description	Defines the physical starting address in KB of the memory device mapped address.
Syntax	DellUnsigned64BitRange
Access	Read-only

### **Memory Device Mapped Address Ending Address**

Name	memoryDeviceMappedAddressEndingAddress	
Object ID	1.3.6.1.4.1.674.10892.1.1100.60.1.11	
Description	Defines the physical ending address in KB of the memory device mapped address.	
Syntax	DellUnsigned64BitRange	
Access	Read-only	

# **Generic Device Table**

Name	genericDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.70
Description	Defines the Generic Device Table.
Syntax	SEQUENCE OF GenericDeviceTableEntry
Access	Not accessible

## **Generic Device Table Entry**

Name	genericDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1
Description	Defines the Generic Device Table entry.
Syntax	GenericDeviceTableEntry
Access	Not accessible
Index	generic Device chassis Index, generic Device Index

### **Generic Device Chassis Index**

Name	genericDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Generic Device Index**

Name	genericDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.2
Description	Defines the index of the generic device in this chassis.
Syntax	DellObjectRange
Access	Read-only

# **Generic Device State Capabilities**

genericDeviceStateCapabilities
1.3.6.1.4.1.674.10892.1.1100.70.1.3
Defines the capabilities of the generic device.
DellStateCapabilities
Read-only

## **Generic Device State Settings**

Name	genericDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.4
Description	Defines the state of the generic device.
Syntax	DellStateSettings
Access	Read-write

## **Generic Device Status**

Name	genericDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.5
Description	Defines the status of the generic device.
Syntax	DellStatus
Access	Read-only

## Generic Device System Slot Index Reference

Name	genericDeviceSystemSlotIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.6
Description	Defines the index of the system slot into which this generic device is plugged.
Syntax	DellObjectRange
Access	Read-only

# **Generic Device Type**

Name	genericDeviceType
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.7
Description	Defines the type of the generic device.
Syntax	DellGenericDeviceType (See Table 13-18.)
Access	Read-only

### **Generic Device Name**

Name	genericDeviceName
Object ID	1.3.6.1.4.1.674.10892.1.1100.70.1.8
Description	Defines the name of the generic device.
Syntax	DellString
Access	Read-only

# **PCI Device Table**

Name	pCIDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.80
Description	Defines the PCI Device Detail Table.
Syntax	SEQUENCE OF PCIDeviceTableEntry
Access	Not accessible

# **PCI Device Table Entry**

Name	pCIDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1
Description	Defines the PCI Device Table entry.
Syntax	Not accessible
Access	PCIDeviceTableEntry
Index	pCIDevicechassisIndex, pCIDeviceIndex

# **PCI Device Chassis Index**

Name	pCIDevicechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	Read-only
Access	DellObjectRange

## **PCI Device Index**

Name	pCIDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.2
Description	Defines the index (one-based) of the PCI device in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **PCI Device State Capabilities**

Name	pCIDeviceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.3
Description	Defines the capabilities of the PCI device.
Syntax	DellStateCapabilities
Access	Read-only

## **PCI Device State Settings**

Name	pCIDeviceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.4
Description	Defines the state of the PCI device.
Syntax	DellStateSettings
Access	Read-write

## **PCI Device Status**

Name	pCIDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.5
Description	Defines the status of the PCI device.
Syntax	DellStatus
Access	Read-only

## PCI Device System Slot Index Reference

Name	pCIDeviceSystemSlotIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.6
Description	Defines the index number of the system slot that this PCI device is in.
Syntax	DellObjectRange
Access	Read-only

### **PCI** Device Data Bus Width

Name	pCIDeviceDataBusWidth
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.7
Description	Defines the bus width of the PCI device in this chassis.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **PCI Device Manufacturer Name**

Name	pCIDeviceManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.8
Description	Defines the name of the PCI device manufacturer.
Syntax	DellString
Access	Read-only

## **PCI Device Description Name**

Name	pCIDeviceDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.9
Description	Defines the descriptive name of the PCI device.
Syntax	DellString
Access	Read-only

# **PCI Device Speed**

Name	pCIDeviceSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.10
Description	Defines the bus speed in MHz of the PCI device in this chassis. A zero (0) indicates that the speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **PCI Device Adapter Fault**

Name	pCIDeviceAdapterFault
Object ID	1.3.6.1.4.1.674.10892.1.1100.80.1.11
Description	Defines whether the PCI device in this chassis has detected a fault.
Syntax	DellBoolean
Access	Read-only

## **PCI Device Configuration Space Table**

Name	pCIDeviceConfigurationSpaceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.82
Description	Defines the PCI Device Configuration Table.
Syntax	SEQUENCE OF PCIDeviceConfigurationSpaceTableEntry
Access	Not accessible

### PCI Device Configuration Space Table Entry

Name	pCIDeviceConfigurationSpaceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1
Description	Defines the PCI Device Configuration Table entry.
Syntax	PCIDeviceConfigurationSpaceTableEntry
Access	Not accessible
Index	pCIDeviceConfigurationSpacechassisIndex, pCIDeviceConfigurationSpaceIndex

### **PCI Device Configuration Space Chassis Index**

Name	$\verb pCIDeviceConfigurationSpacechassisIndex  $
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **PCI Device Configuration Space Index**

Name	pCIDeviceConfigurationSpaceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.2
Description	Defines the index (one-based) of the PCI device configuration in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **PCI Device Configuration Space State Capabilities**

Name	pCIDeviceConfigurationSpaceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.3
Description	Defines the capabilities of the PCI device configuration.
Syntax	DellStateCapabilities
Access	Read-only

## **PCI Device Configuration Space State Settings**

Name	pCIDeviceConfigurationSpaceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.4
Description	Defines the state of the PCI device configuration.
Syntax	DellStateSettings
Access	Read-write

## **PCI Device Configuration Space Status**

Name	pCIDeviceConfigurationSpaceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.5
Description	Defines the status of the PCI device configuration.
Syntax	DellStatus
Access	Read-only

### **PCI** Device Index Reference

Name	pCIDeviceIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.6
Description	Defines the index number of PCI device that this configuration applies to.
Syntax	DellObjectRange
Access	Read-only

### PCI Device Configuration Space Bus Number

Name	pCIDeviceConfigurationSpaceBusNumber
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.7
Description	Defines the bus number of the PCI device configuration in this chassis.
Syntax	DellUnsigned32BitRange
Access	Read-only

### PCI Device Configuration Space Device Number

Name	pCIDeviceConfigurationSpaceDeviceNumber
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.8
Description	Defines the device number of the PCI device in this chassis.
Syntax	DellUnsigned32BitRange
Access	Read-only

### PCI Device Configuration Space Function Number

Name	pCIDeviceConfigurationSpaceFunctionNumber
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.9
Description	Defines the function number of the PCI device in this chassis.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### **PCI Device Configuration Space Header**

Name	pCIDeviceConfigurationSpaceHeader
Object ID	1.3.6.1.4.1.674.10892.1.1100.82.1.10
Description	Defines the common configuration space header of the PCI device.
Syntax	OCTET STRING (SIZE(01025))
Access	Read-only

#### **Network Device Table**

Name	networkDeviceTable
Object ID	1.3.6.1.4.1.674.10892.1.1100.90
Description	Defines the Network Device Table.
Syntax	SEQUENCE OF NetworkDeviceTableEntry
Access	Not accessible

#### **Network Device Table Entry**

Name	networkDeviceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1
Description	Defines the Network Device Table Entry.
Syntax	NetworkDeviceTableEntry
Access	Not accessible

#### **Network Device Chassis Index**

Name	networkDeviceChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.1
Description	Defines the index (one-based) of the chassis that contains the network device.
Syntax	DellObjectRange
Access	Read-only

#### **Network Device Index**

Name	networkDeviceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.2
Description	Defines the index (one-based) of the network device.
Syntax	DellObjectRange
Access	Read-only

#### **Network Device Status**

Name	networkDeviceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.3
Description	Defines the status of the network device.
Syntax	DellStatus
Access	Read-only

#### **Network Device Connection Status**

Name	networkDeviceConnectionStatus
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.4
Description	Defines the connection status of the network device.
Syntax	DellNetworkDeviceConnectionStatus (see Table 13-20)
Access	Read-only

#### **Network Device Description Name**

Name	networkDeviceDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.5
Description	Defines the description of the network device.
Syntax	DellString
Access	Read-only

#### **Network Device Product Name**

Name	networkDeviceProductName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.6
Description	Defines the product name of the network device.
Syntax	DellString
Access	Read-only

#### **Network Device Vendor Name**

Name	networkDeviceVendorName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.7
Description	Defines the name of the vendor of the network device.
Syntax	DellString
Access	Read-only

#### **Network Device Service Name**

Name	networkDeviceServiceName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.8
Description	Defines the service name of the network device.
Syntax	DellString
Access	Read-only

#### Network Device Driver Image Path Name

Name	networkDeviceDriverImagePathName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.9
Description	Defines the path to the binary image of the driver for the network device.
Syntax	DellString
Access	Read-only

#### **Network Device Driver Version Name**

Name	networkDeviceDriverVersionName
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.10
Description	Defines the version of the driver for the network device.
Syntax	DellString
Access	Read-only

#### **Network Device IP Address**

Name	networkDeviceIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.11
Description	Defines the IP address of the network device.
Syntax	IpAddress
Access	Read-only

#### **Network Device IP Subnet Mask**

Name	networkDeviceIPSubnetMask
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.12
Description	Defines the IP subnet mask for the IP address currently assigned to the network device.
Syntax	IpAddress
Access	Read-only

#### Network Device Default Gateway IP Address

Name	networkDeviceDefaultGatewayIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.13
Description	Defines the IP address of the default gateway for the network device.
Syntax	IpAddress
Access	Read-only

#### **Network Device DHCP Server IP Address**

Name	networkDeviceDHCPServerIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.14
Description	Defines the IP address of the DHCP server that was used to obtain the IP address of the network device if DHCP was used to configure the network device.
Syntax	IpAddress
Access	Read-only

#### **Network Device Current MAC Address**

Name	networkDeviceCurrentMACAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.15
Description	Defines the current MAC address of the network device.
Syntax	DellMACAddress
Access	Read-only

#### **Network Device Permanent MAC Address**

Name	networkDevicePermanentMACAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.16
Description	Defines the permanent MAC address of the network device.
Syntax	DellMACAddress
Access	Read-only

#### **Network Device PCI Bus Number**

networkDevicePCIBusNumber
1.3.6.1.4.1.674.10892.1.1100.90.1.17
Defines the PCI bus number of the network device.
DellUnsigned8BitRange
Read-only

#### **Network Device PCI Device Number**

Name	networkDevicePCIDeviceNumber
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.18
Description	Defines the PCI device number of the network device.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **Network Device PCI Function Number**

Name	networkDevicePCIFunctionNumber
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.19
Description	Defines the PCI function number of the network device.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **Network Device IRQ**

Name	networkDeviceIRQ
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.20
Description	Defines the interrupt request number of the network device.
Syntax	DellUnsigned16BitRange
Access	Read-only

#### Network Device Base IO Port Address

Name	networkDeviceBaseIOPortAddress
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.21
Description	Defines the base input/outport port address of the network device.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### **Network Device Teaming Flags**

Name	networkDeviceTeamingFlags	
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.22	
Description	Defines the teaming features of the network device.	
Syntax	DellNetworkDeviceTeamingFlags (see Table 13-21)	
Access	Read-only	

#### Network Device TOE Capability Flags

Name	networkDeviceTOECapabilityFlags
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.23
Description	Defines the TCP/IP Offload Engine (TOE) capability flags of the network device.
Syntax	DellNetworkDeviceTOECapabilityFlags (see Table 13-22)
Access	Read-only

#### Network Device TOE Enabled

Name	networkDeviceTOEEnabled	
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.24	
Description	Defines if TOE is enabled for the network device.	
Syntax	DellBoolean	
Access	Read-only	

#### **Network Device RDMA Capability Flags**

Name	networkDeviceRDMACapabilityFlags
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.25
Description	Defines the Remote Direct Memory Access (RDMA) capability flags of the network device.
Syntax	DellNetworkDeviceRDMACapabilityFlags (see Table 13-23)
Access	Read-only

#### **Network Device RDMA Enabled**

Name	networkDeviceRDMAEnabled	
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.26	
Description	Defines if RDMA is enabled for the network device.	
Syntax	DellBoolean	
Access	Read-only	

#### Network Device iSCSI Capability Flags

Name	networkDeviceiSCSICapabilityFlags
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.27
Description	Defines the Internet Small Computer System Interface (iSCSI) capability flags of the network device.
Syntax	DellNetworkDeviceiSCSICapabilityFlags (see Table 13-24)
Access	Read-only

#### **Network Device iSCSI Enabled**

Name	networkDeviceiSCSIEnabled	
Object ID	1.3.6.1.4.1.674.10892.1.1100.90.1.28	
Description	Defines if iSCSI is enabled for the network device.	
Syntax	DellBoolean	
Access	Read-only	

## **Device Group Variable Values**

Variable Name: DellPointingDeviceType

This section includes definitions for server administrator-specific variable values used in this section.

Table 13-1.	Pointing Device Type
-------------	----------------------

Data Type: Integer	
Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	Device type is not one of the following:
deviceTypeIsUnknown(2)	Device type is unknown.
deviceTypeIsAMouse(3)	Device type is a mouse.
<pre>deviceTypeIsATrackBall(4)</pre>	Device type is a track ball.
<pre>deviceTypeIsATrackPoint(5)</pre>	Device type is a track point.
deviceTypeIsAGlidePoint(6)	Device type is a glide point.
deviceTypeIsATouchPad(7)	Device type is a touch pad.

#### Table 13-2. Processor Device Status State

Variable Name: DellProcessorDeviceStatusState

Data Type: Integer	
Possible Data Values	Meaning of Data Value
other(1)	Processor device type is not one of the following:
unknown(2)	Device type is unknown.
enabled(3)	Device is enabled.
userDisabled(4)	Device is disabled by the user.
biosDisabled(5)	Device has its BIOS disabled.
idle(6)	Device is idle.

#### Table 13-3. Processor Device Status Reading

Variable Name: DellProcessorDeviceStatusReading

#### Data Type: Integer

**NOTE:** These values are bit masks, so combination values are possible.

Possible Data Values	Meaning of Data Value
internalError(1)	The processor experienced an internal error
thermalTrip(2)	The processor experienced a thermal trip
configurationError(32)	The processor experienced a configuration error
processorPresent(128)	The processor is present
processorDisabled(256)	The processor is disabled
terminatorPresent(512)	The terminator is Present
processorThrottled(1024)	The processor is throttled

#### Table 13-4. Processor Device Type

Variable Name: DellProcessorDeviceType

Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	The processor device type is not one of the following values:
deviceTypeIsUnknown(2)	The processor device type is unknown.
deviceTypeIsCPU(3)	The processor device type is a central processing unit.
deviceTypeIsMathProcessor(4)	The processor device type is a math processor.
deviceTypeIsDSP(5)	The processor device type is a digital signal processor.
deviceTypeIsAVideoProcessor(6)	The processor device is a video processor.

#### Table 13-5. Processor Upgrade Information

Variable Name: DellProcessorUpgradeInformation

Possible Data Values	Meaning of Data Value
processorUpgradeIsOther(1)	The upgrade device type is not one of the following:
processorUpgradeIsUnknown(2)	Upgrade device type is unknown.
processorUpgradeIsByDaughterBoard(3)	Upgrade device is on a daughter board.
processorUpgradeIsByZIFSocket(4)	Upgrade device is in a zero insertion force (ZIF) socket.
processorUpgradeIsByReplacement(5)	Upgrade device is a replacement.
processorUpgradeIsNone(6)	There is no upgrade device.
processorUpgradeIsByLIFSocket(7)	Upgrade device is in a low insertion force (LIF) socket.
processorUpgradeIsBySlot1(8)	Upgrade device is a SLOT 1 processor.
<pre>processorUpgradeIsBySlot2(9)</pre>	Upgrade device is a SLOT 2 processor.
processorUpgradeIsBy370PinSocket(10)	Upgrade device is a 370 pin socket.
processorUpgradeIsBySlotA(11)	Upgrade is by Slot A.
processorUpgradeIsBySlotM(12)	Upgrade is by Slot M.
processorUpgradeIsByScoket423(13)	Upgrade is by Socket 423.
processorUpgradeIsBySocketA(14)	Upgrade is by Socket A (Socket 462).
processorUpgradeIsBySocket478(15)	Upgrade is by Socket 478.
processorUpgradeIsBySocket754(16)	Upgrade is by Socket 754.
processorUpgradeIsBySocket940(17)	Upgrade is by Socket 940.
processorUpgradeIsBySocket939(18)	Upgrade is by Socket 939.
processorUpgradeIsBySocketmPGA604(19)	Upgrade is by Socket mPGA604.
processorUpgradeIsBySocketLGA771(20)	Upgrade is by Socket LGA771.
processorUpgradeIsBySocketLGA775(21)	Upgrade is by Socket LGA775.

#### Table 13-6. Processor Device Family

Variable Name: DellProcessorDeviceFamily

Possible Data Values	Meaning of Data Value
deviceFamilyIsOther(1)	The processor family is not one of the following values:
deviceFamilyIsUnknown(2)	The processor family is unknown.
deviceFamilyIs8086(3)	The processor family is 8086.
deviceFamilyIs80286(4)	The processor family is 80286.
deviceFamilyIs80386(5)	The processor family is 80386.
deviceFamilyIs80486(6)	The processor family is 80486.
deviceFamilyIS8087(7)	The processor family is 8087.
deviceFamilyIs80287(8)	The processor family is 80287.
deviceFamilyIs80387(9)	The processor family is 80387.
deviceFamilyIs80487(10)	The processor family is 80487.
deviceFamilyIsPentium(11)	The processor family is Intel <sup>®</sup> Pentium <sup>®</sup> .
deviceFamilyIsPentiumPro(12)	The processor family is Pentium Pro.
deviceFamilyIsPentium2(13)	The processor family is Pentium II.
deviceFamilyIsPentiumMMX(14)	The processor family is Pentium MMX <sup>™</sup> .
deviceFamilyIsCeleron(15)	The processor family is Celeron <sup>®</sup> .
deviceFamilyIsXeon(16)	The processor family is Xeon™.
deviceFamilyIsPentium3(17)	The processor family is Pentium III.
deviceFamilyIsPentium3Xeon(18)	The processor family is Pentium III Xeon.
deviceFamilyIsPentium3Step(19)	The processor family is Pentium III Speed Step.
deviceFamilyIsPentiumItanium(20)	The processor family is Itanium <sup>®</sup> .
deviceFamilyIsIntelXeon(21)	The processor family is Intel Xeon.
deviceFamilyIsPentium4(22)	The processor family is Pentium 4.
deviceFamilyIsIntelXeonMP(23)	The processor family is Intel Xeon MP.
<pre>deviceFamilyIsIntelItanium2(24)</pre>	The processor family is Intel Itanium 2.
deviceFamilyIsK5(25)	The processor family is K5.
deviceFamilyIsK6(26)	The processor family is K6.
deviceFamilyIsK6-2(27)	The processor family is K6-2.

#### Table 13-6. Processor Device Family (continued)

Variable Name: DellProcessorDeviceFamily

Meaning of Data Value
The processor family is K6-3.
The processor family is AMD Athlon.
The processor family is AMD2900.
The processor family is K6-2+.
The processor family is Power PC.
The processor family is Power PC 601.
The processor family is Power PC 603
The processor family is Power PC 603+.
The processor family is Power PC 604.
The processor family is Power PC 620.
The processor family is Power PC x704.
The processor family is Power PC 750.
The processor family is Alpha.
The processor family is Alpha 21064.
The processor family is Alpha 21066.
The processor family is Alpha 21164.
The processor family is Alpha 21164PC.
The processor family is Alpha 21164a.
The processor family is Alpha 21264.
The processor family is Alpha 21364.
The processor family is MIPS.
The processor family is MIPS R4000.
The processor family is MIPS R4200.
The processor family is MIPS R4400.
The processor family is MIPS R4600.
The processor family is MIPS R10000.
The processor family is SPARC.
The processor family is SuperSPARC.

#### Table 13-6. Processor Device Family (continued)

Variable Name: DellProcessorDeviceFamily

Possible Data Values	Meaning of Data Value
deviceFamilyIsmicroSPARCII(82)	The processor family is microSPARC II.
deviceFamilyIsmicroSPARCIIep(83)	The processor family is microSPARC IIep.
deviceFamilyIsUltraSPARC(84)	The processor family is UltraSPARC.
deviceFamilyIsUltraSPARCII(85)	The processor family is UltraSPARC II.
deviceFamilyIsUltraSPARCIIi(86)	The processor family is UltraSPARC IIi.
deviceFamilyIsUltraSPARCIII(87)	The processor family is UltraSPARC III.
deviceFamilyIsUltraSPARCIIIi(88)	The processor family is UltraSPARC IIIi.
deviceFamilyIs68040(96)	The processor family is 68040 Family.
deviceFamilyIs68xxx(97)	The processor family is 68xxx.
deviceFamilyIs68000(98)	The processor family is 68000.
deviceFamilyIs68010(99)	The processor family is 68010.
deviceFamilyIs68020(100)	The processor family is 68020.
deviceFamilyIs68030(101)	The processor family is 68030.
deviceFamilyIsHobbit(112)	The processor family is Hobbit.
deviceFamilyIsCrusoeTM5000(120)	The processor family is Crusoe TM5000.
deviceFamilyIsCrusoeTM3000(121)	The processor family is Crusoe TM3000.
<pre>deviceFamilyIsEfficeonTM8000(122)</pre>	The processor family is Efficeon TM8000.
deviceFamilyIsWeitek(128)	The processor family is Weitek.
deviceFamilyIsAMDAthlon64(131)	The processor family is AMD Athlon 64.
deviceFamilyIsAMDOpteron(132)	The processor family is AMD Opteron.
deviceFamilyIsAMDSempron(133)	The processor family is AMD Sempron.
<pre>deviceFamilyIsAMDTurion64Mobile(13 4)</pre>	The processor family is AMD Turion 64 Mobile Technology.
<pre>deviceFamilyIsAMDOpteronDualCore(1 35)</pre>	The processor family is Dual-Core AMD Opteron.
<pre>deviceFamilyIsAMDAthlon64X2DualCor e(136)</pre>	The processor family is AMD Athlon 64 X2 Dual- Core
deviceFamilyIsPA-RISC(144)	The processor family is PA-RISC.
deviceFamilyIsPA-RISC8500(145)	The processor family is PA-RISC 8500.

Variable Name: DellProcessorDeviceFamily	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
deviceFamilyIsPA-RISC8000(146)	The processor family is PA-RISC 8000.
deviceFamilyIsPA-RISC7300LC(147)	The processor family is PA-RISC 7300LC.
deviceFamilyIsPA-RISC7200(148)	The processor family is PA-RISC 7200.
deviceFamilyIsPA-RISC7100LC(149)	The processor family is PA-RISC 7100LC.
deviceFamilyIsPA-RISC7100(150)	The processor family is PA-RISC 7100.
deviceFamilyIsV30(160)	The processor family is V30.
deviceFamilyIsM1(176)	The processor family is M1.
deviceFamilyIsM2(177)	The processor family is M2.
deviceFamilyIsAS400(180)	The processor family is AS400.
deviceFamilyIsAMDAthlonXP(182)	The processor family is AMD Athlon XP.
deviceFamilyIsAMDAthlonMP(183)	The processor family is AMD Athlon MP.
deviceFamilyIsAMDDuron(184)	The processor family is AMD Duron.
deviceFamilyIsIntelPentiumM(185)	The processor family is Intel Pentium M.
<pre>deviceFamilyIsIntelCeleronD(186)</pre>	The processor family is Intel Celeron D.
deviceFamilyIsIntelPentiumD(187)	The processor family is Intel Pentium D.
<pre>deviceFamilyIsIntelPentiumExtreme (188)</pre>	The processor family is Intel Pentium Processor Extreme Edition.
deviceFamilyIsIBM390(200)	The processor family is IBM390.
deviceFamilyIsG4(201)	The processor family is G4.
deviceFamilyIsG5(202)	The processor family is G5.
deviceFamilyIsi860(250)	The processor family is i860.
deviceFamilyIsi960(251)	The processor family is i960.

#### Table 13-6. Processor Device Family (continued)

#### Table 13-7. Cache Device Type

Data Type: Integer	
Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	System cache type is not one of the following:
deviceTypeIsUnknown(2)	System cache type is unknown.
deviceTypeIsInstruction(3)	System cache type is instruction.
deviceTypeIsData(4)	System cache type is data.
deviceTypeIsUnified(5)	System cache type is both instruction and data.

### Variable Name: DellCacheDeviceType

#### Table 13-8. Cache Device Level

Variable Name: DellCacheDeviceLevel
-------------------------------------

Data Type: Integer

Possible Data Values	Meaning of Data Value
deviceLevelIsOther(1)	Device level is not one of the following:
deviceLevelIsUnknown(2)	Device level is unknown.
<pre>deviceLevelIsPrimary(3)</pre>	Device level is primary.
deviceLevelIsSecondary(4)	Device level is secondary.
deviceLevelIsTertiary(5)	Device level is tertiary.

#### Table 13-9. Cache Device Write Policy

Variable Name: DellCacheDeviceWritePolicy

Possible Data Values	Meaning of Data Value
deviceWritePolicyIsOther(1)	Device write policy is not one of the following:
deviceWritePolicyIsUnknown(2)	Device write policy is unknown.
<pre>deviceWritePolicyIsWriteBack(3)</pre>	Device write policy is write back.
<pre>deviceWritePolicyIsWriteThrough(4)</pre>	Device write policy is write through.
deviceWritePolicyIsVariesByAddress(5)	Device write policy varies by address.
deviceWritePolicyIsDeterminedByIO(6)	Device write policy is determined by I/O query.

#### Table 13-10. Cache Device Status State

Variable Name: DellCacheDeviceStatusState

Data Type: Integer

Possible Data Values	Meaning of Data Value
other(1)	Device state is not one of the following:
unknown(2)	Device state is unknown.
enabled(3)	Device is enabled.
userDisabled(4)	Device is disabled by the user.
biosDisabled(5)	Device basic input/output system (BIOS) is disabled.

#### Table 13-11. Cache Device ECC Type

Variable Name: DellPointingDeviceTy	<i>v</i> pe
Data Type: Integer	
Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	Device type is not one of the following:
deviceTypeIsUnknown(2)	Device type is unknown.
deviceTypeIsAMouse(3)	Device type is a mouse.
<pre>deviceTypeIsATrackBall(4)</pre>	Device type is a track ball.
deviceTypeIsATrackPoint(5)	Device type is a track point.
deviceTypeIsAGlidePoint(6)	Device type is a glide point.
deviceTypeIsATouchPad(7)	Device type is a touch pad.

#### Table 13-12. Cache Device Associativity

Variable Name: DellCacheDeviceAssociativity

#### Data Type: Integer

Possible Data Values	Meaning of Data Value
deviceAssociativityIsOther(1)	Device associativity is not one of the following:
deviceAssociativityIsUnknown(2)	Device associativity is unknown.
<pre>deviceAssociativityIsDirectMapped(3)</pre>	Device is direct mapped.
<pre>deviceAssociativityIsTwoWaySetAsso ciative(4)</pre>	Device is two-way set associative.
<pre>deviceAssociativityIsFourWaySetAsso ciative(5)</pre>	Device is four-way set associative.
<pre>deviceAssociativityIsFullyAssociative (6)</pre>	Device is fully associative.
<pre>deviceAssociativityIsEightWaySet Associative(7)</pre>	Device is eight-way set associative.
<pre>deviceAssociativityIsSixteenWaySet Associative(8)</pre>	Device is sixteen-way set associative.

#### Table 13-13. Cache Device Location

deviceLocationIsUnknown(2)Device location is unknown.deviceLocationIsInternal(3)Device location is internal.	Variable Name: DellCacheDeviceLocation	
deviceLocationIsOther(1)Device location is not one of the followideviceLocationIsUnknown(2)Device location is unknown.deviceLocationIsInternal(3)Device location is internal.	Data Type: Integer	
deviceLocationIsUnknown(2)Device location is unknown.deviceLocationIsInternal(3)Device location is internal.	Possible Data Values	Meaning of Data Value
deviceLocationIsInternal(3) Device location is internal.	deviceLocationIsOther(1)	Device location is not one of the following:
	deviceLocationIsUnknown(2)	Device location is unknown.
deviceLocationIsExternal (A) Device location is external	deviceLocationIsInternal(3)	Device location is internal.
device location is external.	deviceLocationIsExternal(4)	Device location is external.

Table 13-14.	<b>Cache Device Static Random-Access Mem</b>	orv (SRAM) Type

Variable Name: DellCacheDeviceSRAMType

Data Type: Integer

Possible Data Values	Meaning of Data Value
deviceSRAMTypeIsOther(1)	Device SRAM type is not one of the following:
deviceSRAMTypeIsUnknown(2)	Device SRAM type is unknown.
deviceSRAMTypeIsNonBurst(3)	Device SRAM type is nonburst.
deviceSRAMTypeIsBurst(4)	Device SRAM type is burst.
deviceSRAMTypeIsPipeBurst(5)	Device SRAM type is pipeburst.
deviceSRAMTypeIsSynchronous(6)	Device SRAM type is synchronous.
deviceSRAMTypeIsAsynchronous(7)	Device SRAM type is asynchronous.

#### Table 13-15. Memory Device Type Form Factor

Variable Name: DellMemoryDeviceFormFactor

Possible Data Values	Meaning of Data Value
deviceFormFactorIsOther(1)	Device form factor is not one of the following:
deviceFormFactorIsUnknown(2)	Device form factor is unknown.
deviceFormFactorIsSIMM(3)	Device form factor is SIMM.
deviceFormFactorIsSIP(4)	Device form factor is SIP.
deviceFormFactorIsAChip(5)	Device form factor is a chip.
deviceFormFactorIsDIP(6)	Device form factor is DIP.
deviceFormFactorIsZIP(7)	Device form factor is ZIP.
deviceFormFactorIsAProprietaryCard(8)	Device form factor is a proprietary card.
deviceFormFactorIsDIMM(9)	Device form factor is DIMM.
deviceFormFactorIsTSOP(10)	Device form factor is TSOP.
deviceFormFactorIsARowOfChips(11)	Device form factor is a row of chips.
deviceFormFactorIsRIMM(12)	Device form factor is RIMM.
deviceFormFactorIsSODIMM(13)	Device form factor is SODIMM.
deviceFormFactorIsSRIMM(14)	Device form factor is SRIMM.
deviceFormFactorIsFBDIMM(15)	Device form factor is FB-DIMM.

#### Table 13-16. Memory Device Type

Variable Name: DellMemoryDeviceType

Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	Device type is not one of the following:
deviceTypeIsUnknown(2)	Device type is unknown.
deviceTypeIsDRAM(3)	Device type is DRAM.
deviceTypeIsEDRAM(4)	Device type is EDRAM.
deviceTypeIsVRAM(5)	Device type is VRAM.
deviceTypeIsSRAM(6)	Device type is SRAM.
deviceTypeIsRAM(7)	Device type is RAM.
deviceTypeIsROM(8)	Device type is ROM.
deviceTypeIsFLASH(9)	Device type is FLASH.
deviceTypeIsEEPROM(10)	Device type is EEPROM.
deviceTypeIsFEPROM(11)	Device type is FEPROM.
deviceTypeIsEPROM(12)	Device type is EPROM.
deviceTypeIsCDRAM(13)	Device type is CDRAM.
deviceTypeIs3DRAM(14)	Device type is 3DRAM.
deviceTypeIsSDRAM(15)	Device type is SDRAM.
deviceTypeIsSGRAM(16)	Device type is SGRAM.
deviceTypeIsRDRAM(17)	Device type is RDRAM.
deviceTypeIsDDR(18)	Device type is DDR.
deviceTypeIsDDR2(19)	Device type is DDR2.
deviceTypeIsDDR2FBDIMM(20)	Device type is DDR2 FB-DIMM.

#### Table 13-17. Memory Device Type Details

Variable Name: DellMemoryDeviceTypeDetails

Data Type: Integer

Possible Data Values	Meaning of Data Value
deviceTypeDeatilIsOther(1)	The detailed device type is not one of the following:
deviceTypeDetailIsUnknown(2)	The detailed device type is unknown.
<pre>deviceTypeDetailIsFastPaged(3)</pre>	The detailed device type is fast paged.
<pre>deviceTypeDetailIsStaticColumn(4)</pre>	The detailed device type is static column.
<pre>deviceTypeDetailIsPseudoStatic(5)</pre>	The detailed device type is pseudo-static.
deviceTypeDetailIsRAMBUS(6)	The detailed device type is RAMBUS.
deviceTypeDetailIsSynchronous(7)	The detailed device type is synchronous.
deviceTypeDetailIsCMOS(8)	The detailed device type is CMOS.
deviceTypeDetailIsEDO(9)	The detailed device type is EDO.
deviceTypeDetailIsWindowDRAM(10)	The detailed device type is "Window" DRAM.
deviceTypeDetailIsCacheDRAM(11)	The detailed device type is Cache DRAM.
deviceTypeDetailIsNonVolatile(12)	The detailed device type is nonvolatile.

#### Table 13-18. Generic Device Type

Variable Name: DellGenericDeviceType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
deviceTypeIsOther(1)	Device type is not one of the following:
deviceTypeIsUnknown(2)	Device type is unknown.
deviceTypeIsAVideoDevice(3)	Device type is a video.
deviceTypeIsASCSIController(4)	Device type is a SCSI controller.
deviceTypeIsAnEthernetDevice(5)	Device type is Ethernet.
deviceTypeIsTokenRingDevice(6)	Device type is token ring.
deviceTypeIsASoundDevice(7)	Device type is sound.

#### Table 13-19. Memory Device Failure Modes

Variable Name: DellMemoryDeviceFailureModes

#### Data Type: Integer

**NOTE:** These values are bit masks, so combination values are possible.

Possible Data Values	Meaning of Data Value
(0)	Memory device has no faults.
eccSingleBitCorrectionWarningRate(1)	Memory device has exceeded the Correctable Memory Event warning rate.
<pre>eccSingleBitCorrectionFailureRate(2)</pre>	Memory device has exceeded the Correctable Memory Event failure rate.
eccMultiBitFault(4)	Memory device has encountered an Uncorrectable Memory Event.
eccSingleBitCorrectionLoggingDis abled(8)	Correctable Memory Event logging for memory device has been disabled.
deviceDisabledBySpareActivation(16)	Memory device is disabled because of spare memory activation.

Variable Name: DellNetworkDeviceConnectionStatus	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(0)	Unable to determine connection status.
connected(1)	Media reports that device is connected.
disconnected(2)	Media reports that device is disconnected.
driverBad(3)	Driver cannot be opened to determine status.
driverDisabled(4)	Driver is disabled.
hardwareInitalizing(10)	Hardware is initializing.
hardwareResetting(11)	Hardware is resetting.
hardwareClosing(12)	Hardware is closing down.
hardwareNotReady(13)	Hardware is not ready.

#### Table 13-21. Network Device Teaming Flags

Variable Name: DellNetworkDeviceTeamingFlags

Data Type: IntegerNOTE: These values are bit fields, so combination values are possible.Possible Data ValuesMeaning of Data Valueundefined(0)Teaming flags are undefined.noTeam(1)Device is not part of any team.teamingEnabled(2)Teaming is enabled.adapterFaultToleranceMode(4)Adapter fault tolerance teaming mode.loadBalancingMode(8)Load balancing teaming mode.

#### Table 13-22. Network Device TOE Capability Flags

#### Variable Name: DellNetworkDeviceTOECapabilityFlags

Data Type: Integer

**NOTE:** These values are bit fields, so combination values are possible.

Possible Data Values	Meaning of Data Value
none(0)	Querying for TOE capability is not supported.
unknown(1)	Querying for TOE capability is supported but query returned an error.
available(2)	Device has TOE capability.
notAvailable(4)	Device does not have TOE capability.
cannotBeDetermined(8)	Querying for TOE capability is supported but an error prevented querying.
driverNotResponding(16)	Querying for TOE capability is supported but driver did not respond to query.

#### Table 13-23. Network Device RDMA Capability Flags

#### Variable Name: DellNetworkDeviceRDMACapabilityFlags

#### Data Type: Integer

**NOTE:** These values are bit fields, so combination values are possible.

Possible Data Values	Meaning of Data Value
none(0)	Querying for RDMA capability is not supported.
unknown(1)	Querying for RDMA capability is supported but query returned an error.
available(2)	Device has RDMA capability.
notAvailable(4)	Device does not have RDMA capability.
cannotBeDetermined(8)	Querying for RDMA capability is supported but an error prevented querying.
driverNotResponding(16)	Querying for RDMA capability is supported but driver did not respond to query.

#### Table 13-24. Network Device iSCSI Capability Flags

Variable Name: DellNetworkDeviceiSCSICapabilityFlags

#### Data Type: Integer

**NOTE:** These values are bit fields, so combination values are possible.

Possible Data Values	Meaning of Data Value
none(0)	Querying for iSCSI capability is not supported.
unknown(1)	Querying for iSCSI capability is supported but query returned an error.
available(2)	Device has iSCSI capability.
notAvailable(4)	Device does not have iSCSI capability.
cannotBeDetermined(8)	Querying for iSCSI capability is supported but an error prevented querying.
driverNotResponding(16)	Querying for iSCSI capability is supported but driver did not respond to query.

# 14

# Slot Group

The Slot Group provides information about the types of slots that your system supports. This management information base (MIB) group also provides information about the voltages, capabilities, states, and settings that are possible for these slots.

# System Slot Group Table

The System Slot Group defines objects in the System Slot MIB table.

#### **System Slot Table**

The following object sets up the System Slot Table:

Name	systemSlotTable
Object ID	1.3.6.1.4.1.674.10892.1.1200.10
Description	Defines the System Slot Table.
Syntax	IntegerSystemStateTableEntry
Access	Not accessible

#### System Slot Table Entry

Name	systemSlotTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1
Description	Defines the System Slot Table entry.
Syntax	IntegerSystemSlotTableEntry
Access	Not accessible
Index	systemSlotchassisIndex, systemSlotIndex

#### System Slot Chassis Index

Name	systemSlotchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Slot Index

Name	systemSlotIndex
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.2
Description	Defines the index (one-based) of the system slot in this chassis.
Syntax	DellObjectRange
Access	Read-only

#### System Slot State Capabilities Unique

Name	systemSlotStateCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.3
Description	Defines the capabilities of the system slot.
Syntax	DellSystemSlotStateCapabilities (See Table 14-1.)
Access	Read-only

#### System Slot State Settings Unique

Name	systemSlotStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.4
Description	Defines the state of the system slot.
Syntax	DellSystemSlotStateSettings (See Table 14-2.)
Access	Read-only

#### System Slot Status

Name	systemSlotStatus
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.5
Description	Defines the status of the system slot.
Syntax	DellStatus
Access	Read-only

#### System Slot Current Usage

Name	systemSlotCurrentUsage
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.6
Description	Defines the current usage of the system slot.
Syntax	DellStatus
Access	Read-only

#### System Slot Type

Name	systemSlotType
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.7
Description	Defines the type of the system slot.
Syntax	DellSystemSlotType (See Table 14-3.)
Access	Read-only

#### System Slot External Slot Name

Name	systemSlotSlotExternalSlotName
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.8
Description	Defines the external connector name of the system slot.
Syntax	DellString
Access	Read-only

#### System Slot Length

Name	systemSlotLength
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.9
Description	Defines the length of the system slot.
Syntax	DellSystemSlotLength (See Table 14-5.)
Access	Read-only

#### System Slot Slot ID

Name	systemSlotSlotID
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.10
Description	Defines the slot identification number of the system slot. A zero (0) indicates that the slot is embedded on the motherboard.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### System Slot Category

Name	systemSlotCategory	
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.11	
Description	Defines the system slot category.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

#### System Slot Hot-Plug Bus Width

Name	systemSlotHotPlugBusWidth
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.12
Description	Defines the bus width of the hot-plug system slot.
Syntax	DellSystemSlotHotPlugBusWidth (See Table 14-7.)
Access	Read-only

#### System Slot Hot-Plug Slot Speed

Name	systemSlotHotPlugSlotSpeed	
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.13	
Description	Defines the slot speed in megahertz of the hot-plug system slot. A zero (0) indicates that the slot speed is unknown.	
Syntax	DellUnsigned32BitRange	
Access	Read-only	

#### System Slot Hot-Plug Adapter Speed

Name	systemSlotHotPlugAdapterSpeed
Object ID	1.3.6.1.4.1.674.10892.1.1200.10.1.14
Description	Defines the adapter speed in megahertz of the hot-plug system slot. A zero (0) indicates that the slot speed is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

# **System Slot Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Variable Name: DellSystemSlotStateCapabilities		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
systemSlotHotPlugIsUnknown(1)	The system slot's capabilities are unknown.	
<pre>systemSlotHotPlugIsHotPluggableCapable(2)</pre>	The system slot supports hot-plug.	
<pre>systemSlotHotPlugCanBePoweredOn(4)</pre>	The system slot power (and corresponding light-emitting diode [LED]) can be powered on.	
systemSlotHotPlugCanSignalAttention(8)	The system slot attention state (and corresponding LED) can be set.	
<pre>systemSlotHotPlugCanSignalPowerFault(16)</pre>	Power on fault (and corresponding LED) can be detected due to a short or overcurrent.	
systemSlotHotPlugCanSignalAdapterPresent(32)	Adapter (card) present in slot (may not be powered) can be detected.	

#### Table 14-1. System Slot State Capabilities

#### Table 14-1. System Slot State Capabilities (continued)

Variable Name: DellSystemSlotStateCapabilities

Possible Data Values	Meaning of Data Value
systemSlotHotPlugCanSignalPowerButtonPressed(64)	The system slot power button can be pressed to signal a toggle of the power state.
canSupportAllHotPlugCapabilities(126)	The system slot can support all hot-plug capabilities.
systemSlotHotPlugIsUnknown(1)	The system slot's capabilities are unknown.
<pre>systemSlotCanProvide5Volts(128)</pre>	The system slot can provide a 5-volt (V) supply.
<pre>systemSlotCanProvide3Point3Volts(256)</pre>	The system slot can provide a 3.3-V supply.
systemSlotCanSignalIfShared(512)	The system slot's opening, if shared with another slot, can be detected.
<pre>systemSlotCanSupportCard16(1024)</pre>	The system slot can support PC Card-16.
<pre>systemSlotCanSupportCardBus(2048)</pre>	The system slot can support CardBus.
systemSlotCanSupportZoomVideo(4096)	The system slot can support Zoom Video.
<pre>systemSlotCanSupportModemRingResume(8192)</pre>	The system slot can support modem ring resume.
<pre>systemSlotCanSupportPMESignal(16384)</pre>	The system slot can support Power Management Enable (PME#) signal.
canSupportAllSlotCapabilities(32640)	The system slot can support all slot capabilities.

#### Table 14-2. System Slot State Settings

Variable Name: DellSystemSlotStateSettings Data Type: Integer **Possible Data Values** Meaning of Data Value systemSlotHotPlugIsUnknown(1) The system slot's capabilities are unknown. systemSlotHotPlugIsHotPluggable(2) The system slot supports hot-plug. The system slot power (and corresponding systemSlotHotPlugIsPoweredOn(4) LED) can be powered on. systemSlotHotPlugIsAtAttention(8) The system slot attention state (and corresponding LED) can be set. The system slot supports hot-plug. systemSlotHotPlugIsHotPluggable(2) The system slot power (and corresponding systemSlotHotPlugIsPoweredOn(4) LED) is on. The system slot attention state (and systemSlotHotPlugIsAtAttention(8) corresponding LED) is on. Power on fault (and corresponding LED) systemSlotHotPlugHasPowerFaulted(16) was detected due to a short or overcurrent. systemSlotHotPlugAdapterIsPresent(32) Adapter (card) present in slot (may not be powered). systemSlotHotPlugAdapterPresentAndPoweredOn (36) Adapter (card) present in slot and powered. The system slot power button pressed to systemSlotHotPlugPowerButtonPressed(64) signal a toggle of the power state. systemSlotProvides5Volts(128) The system slot provides a 5-V supply. systemSlotProvides3Point3Volts(256) The system slot provides a 3.3-V supply. systemSlotIsShared(512) The slot's opening is shared with another slot. The system slot supports PC Card-16. systemSlotSupportsCard16(1024) systemSlotSupportsCardBus(2048) The system slot supports CardBus. systemSlotSupportsZoomVideo(4096) The system slot supports zoom video. The system slot supports modem systemSlotSupportsModemRingResume(8192) ring resume. systemSlotSupportsPMESignal(16384) The system slot supports power management enable (PME#) signal.

#### Table 14-2. System Slot State Settings (continued)

Variable Name: DellSystemSlotStateSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
supportsPMEand3P3Vand5VandHotPluggable(16770)	The system slot supports power management enable.
<pre>supportsPMEand3P3Vand5VhasAdapterOn(16804)</pre>	The system slot supports power management event (PME), supplies 3.3 V, and supplies 5 V. The adapter is on.
<pre>supportsPMEand3P3Vand5VhasAdapterOnandisHotPlug gable(16806)</pre>	The system slot supports PME, supplies 3.3 V, and supplies 5 V. The adapter is on and the system slot is hot pluggable.
supportsPMEand3P3VIsSharedand5VhasAdapterOnandi sHotPluggable(17316)	The system slot supports PME, supplies 3.3 V, supplies 5 V, and shares a slot opening. The adapter is on and the system slot is hot pluggable.

#### Table 14-3. System Slot Type

Variable Name: DellSystemSlotType

Data Type: Integer	
Possible Data Values	Meaning of Data Value
systemSlotIsOther(1)	The system slot type is not one of following:
systemSlotIsUnknown(2)	The system slot type is unknown.
systemSlotIsISA(3)	The system slot is Industry Standard Architecture (ISA).
systemSlotIsMCA(4)	The system slot is Micro Channel Architecture (MCA).
systemSlotIsEISA(5)	The system slot is Extended Industry Standard Architecture (EISA).
systemSlotIsPCI(6)	The system slot is Peripheral Component Interconnect (PCI).
systemSlotIsPCMCIA(7)	The system slot is compliant with the Personal Computer Memory Card International Association (PCMCIA) standards.

#### Table 14-3. System Slot Type (continued)

Variable Name: DellSystemSlotType

Data Type: Integer

#### **Possible Data Values**

systemSlotIsVLVESA(8)	The system slot is Very Low Voltage Enterprise System Architecture (VLVESA).
<pre>systemSlotIsProprietary(9)</pre>	The system slot is proprietary.
systemSlotIsProcessorCard(10)	The system slot is a processor card.
<pre>systemSlotIsProprietaryMemory(11)</pre>	The system slot is proprietary memory.
<pre>systemSlotIsIORiserCard(12)</pre>	The system slot is an I/O riser card.
systemSlotIsNuBUS(13)	The system slot is a NuBus.
systemSlotIsPCI66MHz(14)	The system slot is a PCI66MHz.
systemSlotIsAGP(15)	The system slot is an Advanced Graphics Port (AGP).
systemSlotIsAGP2X(16)	The system slot is an AGP 2x card.
systemSlotIsAGP4X(17)	The system slot is an AGP 4x card.
systemSlotIsPC98C20(18)	The system slot is a PC-98/C20.
systemSlotIsPC98C24(19)	The system slot is a PC-98/C24.
systemSlotIsPC98E(20)	The system slot type is PC-98/E.
systemSlotIsPC98LocalBus(21)	The system slot type is a PC-98 local bus.
systemSlotIsPC98Card(22)	The system slot type is a PC-98 card.
systemSlotIsPCIX(23)	The system slot type is a PCIX card.
systemSlotIsPCIExpress(24)	The system slot type is a PCI Express card.
systemSlotIsAGP8X(25)	The system slot type is an AGP 8x card.

**Meaning of Data Value** 

#### Table 14-4. System Slot Usage

Variable Name: DellSystemSlotUsage
Data Type: Integer
Possible Data Values
Meaning of Data Value

<pre>systemSlotUsageIsOther(1)</pre>	The system slot usage is not one of following:
systemSlotUsageIsUnknown(2)	The system slot usage is unknown.
<pre>systemSlotUsageIsAvailable(3)</pre>	The system slot is available.
<pre>systemSlotUsageIsInUse(4)</pre>	The system slot is in use.

#### Table 14-5. System Slot Length

Variable Name: DellSystemSlotLength		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
systemSlotLengthIsOther(1)	The system slot length is not one of following:	
<pre>systemSlotLengthIsUnknown(2)</pre>	The system slot length is unknown.	
<pre>systemSlotLengthIsShort(3)</pre>	The system slot length is short.	
systemSlotLengthIsLong(4)	The system slot length is long.	

#### Table 14-6. System Slot Category

Variable Name: DellSystemSlotCategory
---------------------------------------

Possible Data Values	Meaning of Data Value
<pre>systemSlotCategoryIsOther(1)</pre>	The system slot category is not one of following:
<pre>systemSlotCategoryIsUnknown(2)</pre>	The system slot category is unknown.
<pre>systemSlotCategoryIsBusConnector(3)</pre>	The system slot is a bus connector.
<pre>systemSlotCategoryIsPCMCIA(4)</pre>	The system slot category is PCMCIA.
<pre>systemSlotCategoryIsMotherboard(5)</pre>	The system slot is a motherboard.

#### Table 14-7. Hot-Plug Bus Width

Variable Name: DellSystemSlotHotPlugBusWidth

Data Type: Integer

Possible Data Values	Meaning of Data Value
busWidthIsOther(1)	The system slot bus width is not one of following:
busWidthIsUnknown(2)	The system slot bus width is unknown.
busWidthIs8bits(3)	The system slot bus width is 8 bits.
busWidthIs16bits(4)	The system slot bus width is 16 bits.
busWidthIs32bits(5)	The system slot bus width is 32 bits.
busWidthIs64bits(6)	The system slot bus width is 64 bits.
busWidthIs128bits(7)	The system slot bus width is 128 bits.
busWidthIs1xOrx1(8)	The system slot bus width is 1x or x1.
busWidthIs2xOrx2(9)	The system slot bus width is 2x or x2.
busWidthIs4xOrx4(10)	The system slot bus width is 4x or x4.
busWidthIs8xOrx8(11)	The system slot bus width is 8x or x8.
busWidthIs12xOrx12(12)	The system slot bus width is 12x or x12.
busWidthIs16xOrx16(13)	The system slot bus width is 16x or x16.
busWidthIs32xOrx32(14)	The system slot bus width is 32x or x32.

**NOTE:** System slot bus width meanings of type "n bits" are for parallel bus such as PCI.

**NOTE:** System slot bus width meanings of type "nx or xn" are for serial bus such as PCI Express.

# 15

# **Memory Group**

The Memory Group provides information about the physical memory in your system. Variables in this group include error correction type, location, and different types of memory use, such as cache, flash, system, video, and nonvolatile memory.

# **Physical Memory Tables**

The following management information base (MIB) tables define the objects in the Memory Group:

- Physical Memory Array Table
- Physical Memory Array Mapped Table
- Physical Memory Configuration Table
- Physical Memory Logging Table
- Redundant Memory Unit Table
- Physical Memory Card Table

## **Physical Memory Array Table**

The physical memory array is the entire physical memory of a system. The example that follows shows variable values for a system that has one 128-megabyte (MB) dual in-line memory module (DIMM):

- physicalMemoryArrayMaximumSize = 2,097,152 kilobytes (KB) or 2 gigabytes (GB)
- physicalMemoryArrayTotalNumberSockets = 4 (the example system has four DIMM slots on the motherboard)
- physicalMemoryArrayInUseNumberSockets = 1 (there is only one DIMM installed)

The following object sets up the Physical Memory Array Table:

Name	physicalMemoryArrayTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.10
Description	Defines the Physical Memory Array Table.
Syntax	PhysicalMemoryArrayTableEntry
Access	Not accessible

## **Physical Memory Array Table Entry**

Name	physicalMemoryArrayTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1
Description	Defines the Physical Memory Array Table entry.
Syntax	PhysicalMemoryArrayTableEntry
Access	Not accessible
Index	physical Memory Array chassis Index, physical Memory Array Index

## Physical Memory Array Chassis Index

Name	physicalMemoryArraychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array Index**

Name	physicalMemoryArrayIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.2
Description	Defines the index (one-based) of the physical memory array in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array State Capabilities**

Name	physicalMemoryArrayStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.3
Description	Defines the capabilities of the physical memory array.
Syntax	DellStateCapabilities
Access	Read-only

## **Physical Memory Array State Settings**

Name	physicalMemoryArrayStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.4
Description	Defines the state of the physical memory array.
Syntax	DellStateSettings
Access	read-write

## **Physical Memory Array Status**

Name	physicalMemoryArrayStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.5
Description	Defines the status of the physical memory array.
Syntax	DellStatus
Access	Read-only

## **Physical Memory Array Use**

Name	physicalMemoryArrayUse
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.6
Description	Defines the use of the physical memory array.
Syntax	DellPhysicalMemoryArrayUse (See Table 15-2.)
Access	Read-only

## Physical Memory Array Error Checking and Correcting (ECC) Type

Name	physicalMemoryArrayECCType
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.7
Description	Defines the ECC type used by the physical memory array.
Syntax	DellPhysicalMemoryArrayECCType (See Table 15-2.)
Access	Read-only

## **Physical Memory Array Location**

Name	physicalMemoryArrayLocation
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.8
Description	Defines the location of the physical memory array.
Syntax	DellPhysicalMemoryArrayLocation (See Table 15-1.)
Access	Read-only

## **Physical Memory Array Maximum Size**

Name	physicalMemoryArrayMaximumSize
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.9
Description	Defines the size in KB of the physical memory array.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Physical Memory Array Total Number Sockets**

Name	physicalMemoryArrayTotalNumberSockets
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.10
Description	Defines the total number of memory sockets available for the physical memory array.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Physical Memory Array In Use Number Sockets**

Name	physicalMemoryArrayInUseNumberSockets
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.11
Description	Defines the total number of memory sockets in use by the physical memory array.
Syntax	DellUnsigned32BitRange
Access	Read-only

## Physical Memory Array ECC Error Nonrecoverable Threshold

Name	${\tt physicalMemoryArray} {\tt ECCErrorNonRecoverbeThreshold}$
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.12
Description	Defines the value of the physical memory array Error Checking and Correction (ECC) error nonrecoverable threshold.
Syntax	DellSigned32BitRange
Access	Read-only

## **Physical Memory Array ECC Error Critical Threshold**

Name	physicalMemoryArrayECCErrorCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.13
Description	Defines the value of the physical memory array ECC error critical threshold.
Syntax	DellSigned32BitRange
Access	Read-only

## **Physical Memory Array ECC Error Noncritical Threshold**

Name	physicalMemoryArrayECCErrorNonCriticalThreshold
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.14
Description	Defines the value of the physical memory array ECC error noncritical threshold.
Syntax	DellSigned32BitRange
Access	read-write

## Physical Memory Array Redundant Memory Unit Index Reference

Name	physicalMemoryArrayRedundantMemoryUnitIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1300.10.1.15
Description	Defines the index to the associated Redundant Memory Unit in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array Mapped Table**

The physical memory array is divided into memory array mapped addresses. The following object sets up the Physical Memory Array Mapped Table:

Name	physicalMemoryArrayMappedTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.20
Description	Defines the Physical Memory Array Mapped Table.
Syntax	PhysicalMemoryArrayMappedTableEntry
Access	Not accessible

## **Physical Memory Array Mapped Table Entry**

Name	PhysicalMemoryArrayMappedTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1
Description	Defines the Physical Memory Array Mapped Table entry.
Syntax	PhysicalMemoryArrayMappedTableEntry
Access	Not accessible
Index	physicalMemoryArrayMappedchassisIndex, physicalMemoryArrayMappedIndex

## **Physical Memory Array Mapped Chassis Index**

Name	physicalMemoryArrayMappedchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array Mapped Index**

Name	physicalMemoryArrayMappedIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.2
Description	Defines the index (one-based) of the memory array mapped address in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array Mapped State Capabilities**

Name	physicalMemoryArrayMappedStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.3
Description	Defines the capabilities of the memory array mapped address.
Syntax	DellStateCapabilities
Access	Read-only

## **Physical Memory Array Mapped State Settings**

Name	physicalMemoryArrayMappedStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.4
Description	Defines the state of the memory array mapped address.
Syntax	DellStateSettings
Access	Read-write

## **Physical Memory Array Mapped Status**

Name	physicalMemoryArrayMappedStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.5
Description	Defines the status of the memory array mapped address.
Syntax	DellStatus
Access	Read-only

## **Physical Memory Array Index Reference**

Name	physicalMemoryArrayIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.6
Description	Defines the index to the associated physical memory array in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Array Mapped Starting Address**

Name	physicalMemoryArrayMappedStartingAddress
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.7
Description	Defines the physical starting address in KB of the memory array mapped address.
Syntax	DellUnsigned64BitRange
Access	Read-only

## **Physical Memory Array Mapped Ending Address**

Name	physicalMemoryArrayMappedEndingAddress
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.8
Description	Defines the physical ending address in KB of the memory array mapped address.
Syntax	DellUnsigned64BitRange
Access	Read-only

## **Physical Memory Array Mapped Partition Width**

Name	physicalMemoryArrayMappedPartitionWidth
Object ID	1.3.6.1.4.1.674.10892.1.1300.20.1.9
Description	Defines the number of memory devices that form a single row in the memory array mapped address. A zero (0) indicates that the number is unknown.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Physical Memory Configuration Table**

This table defines how the physical memory of a system chassis is set up, for example, which redundant memory types are supported and whether redundant memory is active.

The following object sets up the Physical Memory Configuration Table:

Name	physicalMemoryConfigTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.30
Description	Defines the Physical Memory Configuration Table.
Syntax	SEQUENCE OF PhysicalMemoryConfigTableEntry
Access	Not accessible

## **Physical Memory Configuration Table Entry**

Name	physicalMemoryConfigTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1
Description	Defines the Physical Memory Configuration Table entry.
Syntax	PhysicalMemoryConfigTableEntry
Access	Not accessible
Index	physicalMemoryConfigChassisIndex, physicalMemoryConfigIndex

## **Physical Memory Configuration Chassis Index**

Name	physicalMemoryConfigChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.1
Description	Defines the index (one-based) of the chassis associated with the physical memory configuration.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Configuration Index**

Name	physicalMemoryConfigIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.2
Description	Defines the index (one-based) of the physical memory configuration.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Configuration State Capabilities**

Name	physicalMemoryConfigStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.3
Description	Defines the state capabilities of the physical memory configuration.
Syntax	DellPhysicalMemoryConfigStateCapabilities
Access	Read-only

## **Physical Memory Configuration State Settings**

Name	physicalMemoryConfigStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.4
Description	Defines the state settings of the physical memory configuration.
Syntax	DellPhysicalMemoryConfigStateSettings
Access	Read-write

## **Physical Memory Configuration Status**

Name	physicalMemoryConfigStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.5
Description	Defines the status of the physical memory configuration.
Syntax	DellStatus
Access	Read-only

## **Physical Memory Configuration Redundant Capabilities**

Name	${\tt physical} {\tt MemoryConfigRedundantCapabilities}$
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.6
Description	Defines the redundant capabilities of the physical memory.
Syntax	$\label{eq:config} DellPhysical Memory Config Redundant Capabilities$
Access	Read-only

## **Physical Memory Configuration Redundant Settings**

Name	physicalMemoryConfigRedundantSettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.30.1.7
Description	Defines the redundant settings of the physical memory.
Syntax	DellPhysicalMemoryConfigRedundantSettings
Access	Read-write

## **Physical Memory Logging Table**

This table defines the conditions for logging system memory events. The following object sets up the Physical Memory Logging Table:

Name	physicalMemoryLoggingTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.40
Description	Defines the Physical Memory Logging Table.
Syntax	SEQUENCE OF PhysicalMemoryLoggingTableEntry
Access	Not accessible

## **Physical Memory Logging Table Entry**

Name	physicalMemoryLoggingTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1
Description	Defines the Physical Memory Logging Table entry.
Syntax	PhysicalMemoryLoggingTableEntry
Access	Not accessible
Index	physicalMemoryLoggingChassisIndex, physicalMemoryLoggingIndex

## **Physical Memory Logging Chassis Index**

Name	physicalMemoryLoggingChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1.1
Description	Defines the index (one-based) of the chassis associated with the physical memory logging.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Logging Index**

Name	physicalMemoryLoggingIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1.2
Description	Defines the index (one-based) of the physical memory logging.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Logging Capabilities**

Name	physicalMemoryLoggingCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1.3
Description	Defines the capabilities of the physical memory logging.
Syntax	DellPhysicalMemoryLoggingCapabilities
Access	Read-only

## **Physical Memory Logging Settings**

Name	physicalMemoryLoggingSettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1.4
Description	Defines the settings of the physical memory logging.
Syntax	DellPhysicalMemoryLoggingSettings
Access	Read-write

## **Physical Memory Logging Status**

Name	physicalMemoryLoggingStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.40.1.5
Description	Defines the status of the physical memory logging.
Syntax	DellStatus
Access	Read-only

## **Redundant Memory Unit Table**

This table reports the status of redundant memory within a particular system chassis. The following object sets up the Redundant Memory Unit Table:

Name	redundantMemoryUnitTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.50
Description	Defines the Redundant Memory Unit Table.
Syntax	SEQUENCE OF RedundantMemoryUnitTableEntry
Access	Not accessible

## **Redundant Memory Unit Table Entry**

Name	redundantMemoryUnitTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1
Description	Defines the Redundant Memory Unit Table entry.
Syntax	RedundantMemoryUnitTableEntry
Access	Not accessible
Index	red und ant Memory Unit Chassis Index, red und ant Memory Unit Index

## **Redundant Memory Unit Chassis Index**

Name	redundantMemoryUnitChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.1
Description	Defines the index (one-based) of the chassis associated with the redundant memory unit.
Syntax	DellObjectRange
Access	Read-only

## **Redundant Memory Unit Index**

Name	redundantMemoryUnitIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.2
Description	Defines the index (one-based) of the redundant memory unit.
Syntax	DellObjectRange
Access	Read-only

## **Redundant Memory Unit State Capabilities**

Name	redundantMemoryUnitStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.3
Description	Defines the state capabilities of the redundant memory unit.
Syntax	DellStateCapabilities
Access	Read-only

## **Redundant Memory Unit State Settings**

Name	redundantMemoryUnitStatesettings
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.4
Description	Defines the state settings of the redundant memory unit.
Syntax	DellStateSettings
Access	Read-write

## **Redundant Memory Unit Redundancy Status**

Name	redundantMemoryUnitRedundancyStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.5
Description	Defines the redundancy status of the redundant memory unit.
Syntax	DellStatusRedundancy
Access	Read-only

## **Redundant Memory Unit Name**

Name	redundantMemoryUnitName
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.6
Description	Defines the name of the redundant memory unit.
Syntax	DellString
Access	Read-only

## **Redundant Memory Unit Status**

Name	redundantMemoryUnitStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.50.1.7
Description	Defines the status of the redundant memory unit.
Syntax	DellStatus
Access	Read-only

## **Physical Memory Card Table**

This table defines the name of the memory card, the total number of device slots present on the memory card, and the number of memory device slots in use on the memory card.

The following objects set up the Physical Memory Card Table:

## **Physical Memory Card Table**

Name	physicalMemoryCardTable
Object ID	1.3.6.1.4.1.674.10892.1.1300.60
Description	Defines the Physical Memory Card Table.
Syntax	SEQUENCE OF PhysicalMemoryCardTableEntry
Access	Not accessible

## **Physical Memory Card Table Entry**

Name	physicalMemoryCardTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1
Description	Defines the Physical Memory Card Table Entry.
Syntax	PhysicalMemoryCardTableEntry
Access	Not accessible
Index	$physical Memory Card Chassis Index, \ physical Memory Card Index$

## **Physical Memory Card Chassis Index**

Name	physicalMemoryCardChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Card Index**

Name	physicalMemoryCardIndex
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.2
Description	Defines the index (one-based) of the Physical Memory Card.
Syntax	DellObjectRange
Access	Read-only

## **Physical Memory Card State Capabilities**

Name	physicalMemoryCardStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.3
Description	Defines the state capabilities of the Physical Memory Card.
Syntax	DellStateCapabilities
Access	Read-only

## **Physical Memory Card State Settings**

physicalMemoryCardStateSettings
1.3.6.1.4.1.674.10892.1.1300.60.1.4
Defines the state settings of the Physical Memory Card.
DellStateSettings
Read-write

## **Physical Memory Card Status**

Name	physicalMemoryCardStatus
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.5
Description	Defines the status of the Physical Memory Card.
Syntax	DellStatus
Access	Read-only

## **Physical Memory Card Name**

Name	physicalMemoryCardName	
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.6	
Description	Defines the name of the Physical Memory Card.	
Syntax	DellString	
Access	Read-only	

## **Physical Memory Card Total Number Sockets**

Name	physicalMemoryCardTotalNumberSockets
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.7
Description	Defines the total number of memory sockets available on the Physical Memory Card. 2,147,483,647 indicates an unknown number of sockets.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Physical Memory Card In Use Number Sockets**

Name	physicalMemoryCardInUseNumberSockets
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.8
Description	Defines the number of memory sockets in use on the Physical Memory Card. Zero indicates that the Physical Memory Card is not installed or has a configuration error.
Syntax	DellUnsigned32BitRange
Access	Read-only

## Physical Memory Card Physical Memory Array Index Reference

Name	physicalMemoryCardPhyMemArrayIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1300.60.1.9
Description	Defines the index (one-based) of the Physical Memory Array Table entry for the physical memory array with the same chassis index that this physical memory card is associated with.
Syntax	DellObjectRange
Access	Read-only

## **Memory Group Variable Values**

Variable Name: DellPhysicalMemoryArrayLocation

This section includes definitions for server administrator-specific variable values used in this section.

Data Type: Integer	
Possible Data Values	Meaning of Data Value
memoryArrayLocationIsOther(1)	The memory array location is not one of the following:
<pre>memoryArrayUseIsUnknown(2)</pre>	The memory array use is unknown.
<pre>memoryArrayUseIsSystemMemory(3)</pre>	The memory array is system memory.
<pre>memoryArrayUseIsVideoMemory(4)</pre>	The memory array is video memory.
<pre>memoryArrayUseIsFLASHMemory(5)</pre>	The memory array is FLASH memory.
memoryArrayUseIsNonVolatileRAMMemory(6)	The memory array is nonvolatile RAM.
<pre>memoryArrayUseIsCacheMemory(7)</pre>	The memory array is cache memory.
memoryArrayLocationIsPCMCIA(8)	The memory array location is a Personal Computer Memory Card International Association (PCMCIA) option card.
<pre>memoryArrayLocationIsProprietary(9)</pre>	The memory array location is a proprietary option card.
memoryArrayLocationIsNUBUS(10)	The memory array location is a NuBus bus.
memoryArrayLocationIsPC98C20(11)	The memory array location is a PC-98/C20 option card.
memoryArrayLocationIsPC98C24(12)	The memory array location is a PC-98/C24 option card.
<pre>memoryArrayLocationIsPC98E(13)</pre>	The memory array location is a PC-98/E option card.
memoryArrayLocationIsPC98LocalBus(14)	The memory array location is a PC-98/Local bus option card.
memoryArrayLocationIsPC98Card(15)	The memory array location is a PC-98/Card slot option card.

## Table 15-1. Physical Memory Array Location

## Table 15-2. Physical Memory Array ECC Type Definitions

Variable Name: DellPhysicalMemoryArrayECCType

Data Type: Integer

Possible Data Values	Meaning of Data Value
memoryArrayECCTypeIsOther(1)	There is not one of the following:
<pre>memoryArrayECCTypeIsUnknown(2)</pre>	The memory array ECC type is unknown.
<pre>memoryArrayECCTypeIsNone(3)</pre>	The memory array ECC type is none.
<pre>memoryArrayECCTypeIsParity(4)</pre>	The memory array ECC type is parity.
<pre>memoryArrayECCTypeIsSingleBitECC(5)</pre>	The memory array ECC type is Correctable Memory Event ECC.
<pre>memoryArrayECCTypeIsMultiBitECC(6)</pre>	The memory array ECC type is Uncorrectable Memory Event ECC.
<pre>memoryArrayECCTypeIsCRC(7)</pre>	The memory array ECC type is CRC.

## Table 15-3. Physical Memory Configuration State Capabilities

Variable Name: DellPhysicalMemoryConfigStateCapabilities	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
If set to 0 (zero)	There are no state capabilities.
unknownCapabilities(1)	State capabilities are unknown.
enableCapable(2)	Object enable/disable is supported.
notReadyCapable(4)	Object "not ready" is supported.

#### Table 15-4. Physical Memory Configuration State Settings

Data Type: IntegerPossible Data ValuesMeaning of Data ValueIf set to 0 (zero)There are no state settings.unknown(1)State settings are unknown.enabled(2)Object is disabled (offline) 0, or enabled (online) 1.notReady(4)Object "not ready."redundantMemoryIsActive(8)Redundant memory is active (in use)enabledAndRedundantMemoryIsActive(10)Redundant memory is enabled and in use.

Variable Name: DellPhysicalMemoryConfigStateSettings

Table 15-5. Physical Memory Configuration Redundant Capabilities

Variable Name: DellPhysicalMemoryConfigRedundantCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
If set to 0 (zero)	There are no redundant memory capabilities.
unknownCapabilities(1)	Redundant capabilities are unknown.
The redundant capabilities are:	
<pre>spareCapable(2)</pre>	Spare redundant memory feature is supported.
mirrorCapable(4)	Mirror redundant memory feature is supported.
<pre>spareAndMirrorCapable(6)</pre>	Spare and mirror redundant memory features are supported.
raidCapable(8)	Redundant Array of Independent disks (RAID) redundant memory feature is supported.

## Table 15-6. Physical Memory Configuration Redundant Settings

Variable Name: DellPhysicalMemoryConfigRedundantSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
If set to 0 (zero)	There are no redundant memory settings enabled.
unknown(1)	Redundant settings are unknown.
The following redundant settings are mutually exclusive	:
spareEnabled(2)	Spare redundant memory feature is enabled.
mirrorEnabled(4)	Mirror redundant memory feature is enabled.
raidEnabled(8)	RAID redundant memory feature is enabled.

## Table 15-7. Physical Memory Logging Capabilities

Variable Name: DellPhysicalMemoryLoggingCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
If set to 0 (zero)	There are no logging capabilities.
unknown Capabilities(1)	Logging capabilities are unknown.
The logging capabilities are:	
enableCapable(2)	Logging enable/disable using Simple Network Management Protocol (SNMP) is supported.

## Table 15-8. Physical Memory Logging Settings

Variable Name: DellPhysicalMemoryLoggingSettings	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
If set to 0 (zero)	There are no logging settings enabled.
unknown Capabilities(1)	Logging capabilities are unknown.
The logging settings are:	
enabled(2)	Logging is disabled (0), or enabled (1).

# 16

# **BIOS Setup Control Group**

Basic Input/Output System (BIOS) Setup Control Group variables provide information about the functions that the BIOS performs in your system. This management information base (MIB) group includes variables for the boot sequence, speakers, diskettes, ports, network interface controllers (NICs), and the Wakeup on local area network (LAN) feature.

## **BIOS Group Tables**

The objects in this group define the BIOS control of devices and controller cards that are typically present in a system. The following MIB tables define the BIOS Setup Control Group:

- BIOS Setup Control Table
- SCSI Control Table
- Parallel Port Control Table
- Serial Port Control Table
- USB Control Table
- IDE Control Table
- Diskette Control Table
- Network Interface Control Table

## **BIOS Setup Control Table**

Name	biosSetUpControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.10
Description	Defines the set of single devices in a chassis controlled by the BIOS.
Syntax	BiosSetUpControlTableEntry
Access	Not accessible

## **BIOS Setup Control Table Entry**

Name	biosSetUpControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1
Description	Defines the BIOS Control Device Table entry.
Syntax	BiosSetUpControlTableEntry
Access	Not accessible
Index	biosSetUpControlchassisIndex

## **BIOS Setup Control Chassis Index**

Name	biosSetUpControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **BIOS Setup Control (BSUC) Pointing Device Control Capabilities**

Name	bSUCpointingDeviceControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.2
Description	Defines the capabilities of the pointing device.
Syntax	DellStateCapabilities
Access	Read-only

## **BIOS Setup Control Pointing Device Control Settings**

Name	${\tt bSUCpointingDeviceControlSettings}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.3
Description	Defines the state of the pointing device.
Syntax	DellStateSettings
Access	Read-write

## **BIOS Setup Control Pointing Device Control Status**

Name	bSUCpointingDeviceControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.4
Description	Defines the status of the pointing device.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Pointing Device Control Name**

Name	bSUCpointingDeviceControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.5
Description	Defines the setup BIOS name of the pointing device.
Syntax	DellString
Access	Read-only

## **BIOS Setup Control Numeric Lock Control Capabilities**

Name	bSUCnumLockControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.6
Description	Defines the capabilities of the numeric lock.
Syntax	DellStateCapabilities
Access	Read-only

## **BIOS Setup Control Numeric Lock Control Settings**

Name	bSUCnumLockControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.7
Description	Defines the state of the numeric lock.
Syntax	DellStateSettings
Access	Read-only

## **BIOS Setup Control Numeric Lock Control Status**

Name	bSUCnumLockControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.8
Description	Defines the status of the numeric lock.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Numeric Lock Control Name**

Name	bSUCnumLockControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.9
Description	Defines the setup BIOS name of the numeric lock.
Syntax	DellString
Access	Read-only

## **BIOS Setup Control Processor Serial Number Control Capabilities**

Name	${\tt bSUCprocessorSerialNumberControlCapabilities}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.10
Description	Defines if the processor serial number can be returned.
Syntax	DellStateCapabilities
Access	Read-only

## **BIOS Setup Control Processor Serial Number Control Settings**

Name	${\tt bSUC processor Serial Number Control Settings}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.11
Description	Defines the state of the processor serial number.
Syntax	DellStateSettings
Access	Read-only

## **BIOS Setup Control Processor Serial Number Control Status**

Name	bSUCprocessorSerialNumberControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.12
Description	Defines the status of the processor serial number.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Processor Serial Number Control Name**

Name	bSUCprocessorSerialNumberControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.13
Description	Defines the setup BIOS name of the processor serial number.
Syntax	DellString
Access	Read-write

## **BIOS Setup Control Speaker Control Capabilities Unique**

Name	bSUCspeakerControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.14
Description	Defines the capabilities of the speaker control.
Syntax	DellSpeakerControlCapabilitiesUnique (See Table 16-1.)
Access	Read-only

## **BIOS Setup Control Speaker Control Settings Unique**

Name	bSUCspeakerControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.15
Description	Defines the settings available for speaker control.
Syntax	DellSpeakerControlSettingsUnique (See Table 16-2.)
Access	Read-only

## **BIOS Setup Control Speaker Control Status**

Name	bSUCspeakerControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.16
Description	Defines the status of speaker control.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Speaker Control Name**

Name	bSUCspeakerControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.17
Description	Defines the setup BIOS name of the speaker control.
Syntax	DellString
Access	Read-only

## **BIOS Setup Control NIF Wakeup on LAN Control Capabilities Unique**

Name	bSUCnIFwakeonLanControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.18
Description	Defines the defines the capabilities of the network interface function (NIF) Wakeup on LAN.
Syntax	DellNIFwakeonLanControlCapabilitiesUnique (SeeTable 16-4.)
Access	Read-only

## **BIOS Setup Control NIF Wakeup on LAN Control Settings Unique**

Name	bSUCnIFwakeonLanControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.19
Description	Defines the state of the NIF Wakeup on LAN.
Syntax	DellNIFwakeonLanControlSettingsUnique (See Table 16-4.)
Access	Read-only

## **BIOS Setup Control NIF Wakeup on LAN Control Status**

Name	bSUCnIFwakeonLanControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.20
Description	Defines the status of the NIF Wakeup on LAN.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control NIF Wakeup on LAN Control Name**

Name	bSUCnIFwakeonLanControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.21
Description	Defines the setup BIOS name of the NIF Wakeup on LAN.
Syntax	DellString
Access	Read-only

## **BIOS Setup Control Boot Sequence Control Capabilities Unique**

Name	bSUCbootSequenceControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.22
Description	Defines the capabilities of the boot sequence.
Syntax	DellBootSequenceControlCapabilitiesUnique (SeeTable 16-5.)
Access	Read-only

## **BIOS Setup Control Boot Sequence Control Settings Unique**

Name	DellBootSequenceControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.23
Description	Defines the state of the boot sequence.
Syntax	DellBootSequenceControlSettingsUnique (SeeTable 16-6.)
Access	Read-only

## **BIOS Setup Control Boot Sequence Control Status**

Name	bSUCbootSequenceControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.24
Description	Defines the status of the boot sequence.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Boot Sequence Control Name**

Name	bSUCbootSequenceControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.25
Description	Defines the control name of the boot sequence.
Syntax	DellString
Access	Read-only

## **BIOS Setup Control Administrator Password Control Capabilities Unique**

Name	${\tt bSUCadministrator} {\tt PasswordControlCapabilities} {\tt Unique}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.26
Description	Defines the capabilities of the administrator password control.
Syntax	DellBIOSPasswordControlCapabilitiesUnique
Access	Read-only

## **BIOS Setup Control Administrator Password Control Settings Unique**

Name	${\tt bSUCadministrator} {\tt PasswordControlSettingsUnique}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.27
Description	Defines the settings for administrator password control.
Syntax	DellBIOSPasswordControlSettingsUnique (See Table 16-9.)
Access	Read-write

## **BIOS Setup Control Administrator Password Control Status**

Name	${\tt bSUCadministrator} {\tt PasswordControlStatus}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.28
Description	Defines the status for administrator password control.
Syntax	DellStatus
Access	Read-only

## **BIOS Setup Control Administrator Password Verify Name**

Name	bSUCadministratorPasswordVerifyName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.29
Description	Defines the setup BIOS name for the current administrator password.
Syntax	DellString
Access	Read-write

## **BIOS Setup Control Administrator Password New Password Name**

Name	bSUCadministratorPasswordNewPasswordName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.30
Description	Defines the setup BIOS name of the new administrator password. To set a new administrator password, you must have successfully set the current administrator password immediately preceding this password change.
Syntax	DellString
Access	Read-write

## **BIOS Control Setup User Password Control Capabilities Unique**

Name	${\tt bSUC} user {\tt PasswordControlCapabilitiesUnique}$
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.31
Description	Defines the capabilities of user password control.
Syntax	DellBIOSPasswordControlCapabilitiesUnique
Access	Read-only

## **BIOS Control Setup User Password Control Settings Unique**

Name	bSUCuserPasswordControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.32
Description	Defines the control settings for user password control.
Syntax	DellBIOSPasswordControlSettingsUnique (See Table 16-9.)
Access	Read-write

## **BIOS Control Setup User Password Control Status**

Name	bSUCuserPasswordControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.33
Description	Defines the status of the user password control.
Syntax	DellStatus
Access	Read-only

## **BIOS Control Setup User Password Verify Name**

Name	bSUCuserPasswordVerifyName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.34
Description	Defines the setup BIOS name of the current user password.
Syntax	DellString
Access	Read-write

## **BIOS Control Setup User Password New Password Name**

Name	bSUCuserPasswordNewPasswordName
Object ID	1.3.6.1.4.1.674.10892.1.1400.10.1.35
Description	Defines the setup BIOS name of the new user password. To set a new user password, a you must have successfully set the current user password immediately preceding this password change.
Syntax	DellString
Access	Read-write

## **SCSI Control Table**

Name	sCSIControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.20
Description	Defines the Small Computer System Interface (SCSI) Control Table.
Syntax	SCSIControlTableEntry
Access	Not accessible

## **SCSI Control Table Entry**

Name	sCSIControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1
Description	Defines the SCSI Control Table entry.
Syntax	SCSIControlTableEntry
Access	Not accessible
Index	sCSIControlchassisIndex, sCSIControlIndex

## **SCSI Control Chassis Index**

Name	sCSIControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **SCSI Control Index**

Name	sCSIControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.2
Description	Defines the index (one-based) of the SCSI controller in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **SCSI Control Capabilities**

Name	sCSIControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.3
Description	Defines the capabilities of the SCSI controller.
Syntax	DellStateCapabilities
Access	Read-only

## **SCSI Control Settings**

Name	sCSIControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.4
Description	Defines the state of the SCSI controller.
Syntax	DellStateSettings
Access	Read-only

## **SCSI Control Status**

Name	sCSIControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.5
Description	Defines the status of the SCSI controller.
Syntax	DellStatus
Access	Read-only

## **SCSI Control Name**

Name	sCSIControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.20.1.6
Description	Defines the setup BIOS name of the SCSI controller.
Syntax	DellString
Access	Read-only

## **Parallel Port Control Table**

Name	parallelPortControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.30
Description	Defines the Parallel Port Control Table.
Syntax	ParallelPortControlTableEntry
Access	Not accessible

## Parallel Port Control Table Entry

Name	parallelPortControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1
Description	Defines the Parallel Port Control Table entry.
Syntax	ParallelPortControlTableEntry
Access	Not accessible
Index	parallel PortControl chassis Index, parallel PortControl Index

## **Parallel Port Control Chassis Index**

Name	parallelPortControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Parallel Port Control Index**

Name	parallelPortControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.2
Description	Defines the index (one-based) of the parallel port in this chassis.
Syntax	DellObjectRange
Access	Read-only

## **Parallel Port Control Capabilities Unique**

Name	parallelPortControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.3
Description	Defines the capabilities of the parallel port.
Syntax	DellParallelPortControlCapabilitiesUnique (See Table 16-10.)
Access	Read-only

## **Parallel Port Control Settings Unique**

Name	parallelPortControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.4
Description	Defines the state of the parallel port.
Syntax	DellParallelPortControlSettingsUnique (See Table 16-11.)
Access	Read-only

## **Parallel Port Control Status**

Name	parallelPortControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.5
Description	Defines the status of the parallel port.
Syntax	DellStatus
Access	Read-only

## **Parallel Port Control Name**

Name	parallelPortControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.6
Description	Defines the setup BIOS name of the parallel port.
Syntax	DellString
Access	Read-only

### Parallel Port Control Mode Capabilities Unique

Name	parallelPortControlModeCapabilitiesUnique	
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.7	
Description	Defines the mode capabilities of the parallel port.	
Syntax	DellParallelPortControlModeCapabilitiesUnique (See Table 16-12.)	
Access	Read-only	

### Parallel Port Control Mode Settings Unique

Name	parallelPortControlModeSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.30.1.8
Description	Defines the mode settings of the parallel port.
Syntax	DellParallelPortControlModeSettingsUnique (See Table 16-12.)
Access	Read-write

### **Serial Port Control Table**

Name	serialPortControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.40
Description	Defines the Serial Port Control Table.
Syntax	SerialPortControlTableEntry
Access	Not accessible

### Serial Port Control Table Entry

Name	serialPortControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1
Description	Defines the Serial Port Control Table entry.
Syntax	SerialPortControlTableEntry
Access	Not accessible
Index	serial Port Control chassis Index, serial Port Control Index

### **Serial Port Control Chassis Index**

Name	serialPortControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.1
Description	Defines index (one-based) of this chassis.
Syntax	DellObjectRange
Access	read-only

### **Serial Port Control Index**

Name	serialPortControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.2
Description	Defines the index (one-based) of the serial port in this chassis.
Syntax	DellObjectRange
Access	read-only

### **Serial Port Control Capabilities Unique**

Name	serialPortControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.3
Description	Defines the capabilities of the serial port.
Syntax	DellSerialPortControlCapabilitiesUnique (See Table 16-13.)
Access	Read-only

### **Serial Port Control Settings Unique**

Name	serialPortControlSettingsUnique	
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.4	
Description	Defines the settings of the serial port.	
Syntax	DellSerialPortControlSettingsUnique (See Table 16-14.)	
Access	Read-only	

### **Serial Port Control Status**

Name	serialPortControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.5
Description	Defines the status of the serial port.
Syntax	DellStatus
Access	Read-only

### **Serial Port Control Name**

Name	serialPortControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.40.1.6
Description	Defines the setup BIOS name of the serial port.
Syntax	DellString
Access	Read-only

### **USB Control Table**

These objects enable you to track the attributes of your Universal Serial Bus (USB).

Name	usbControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.50
Description	Defines the USB Table.
Syntax	UsbControlTableEntry
Access	Not accessible

### **USB Control Table Entry**

Name	usbControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1
Description	Defines the USB Table entry.
Syntax	UsbControlTableEntry
Access	Not accessible
Index	usbControlchassisIndex, usbControlIndex

### **USB Control Chassis Index**

Name	usbControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.1
Description	Defines index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### **USB** Control Index

Name	usbControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.2
Description	Defines the index (one-based) of the USB in this chassis.
Syntax	DellObjectRange
Access	Read-only

### **USB Control Capabilities**

Name	usbControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.3
Description	Defines the capabilities of the USB.
Syntax	DellStateCapabilities
Access	Read-only

### **USB Control Settings**

Name	usbControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.4
Description	Defines the control settings for the USB.
Syntax	DellStateSettings
Access	Read-only

### **USB Control Status**

Name	usbControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.5
Description	Defines the status of the USB.
Syntax	DellStatus
Access	Read-only

### **USB Control Name**

Name	usbControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.50.1.6
Description	Defines the setup BIOS name of the USB.
Syntax	DellString
Access	Read-only

### **IDE Control Table**

These objects enable you to track the attributes of Integrated Device Electronics (IDE) controller cards in your system.

Name	ideControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.60
Description	Defines the IDE Control Table.
Syntax	IdeControlTableEntry
Access	Not accessible

### **IDE Control Table Entry**

Name	ideControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1
Description	Defines the IDE Control Table entry.
Syntax	IdeControlTableEntry
Access	Not accessible
Index	ide Control chassis Index, ide Control Index

### **IDE Control Chassis Index**

Name	ideControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### **IDE Control Index**

Name	ideControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.2
Description	Defines the index (one-based) of the IDE controller in this chassis.
Syntax	DellObjectRange
Access	Read-only

### **IDE Control Capabilities Unique**

Name	ideControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.3
Description	Defines the capabilities of the IDE controller.
Syntax	DellideControlCapabilitiesUnique (See Table 16-15.)
Access	Read-only

### **IDE Control Settings Unique**

Name	ideControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.4
Description	Defines the settings for the IDE controller.
Syntax	DellideControlCapabilitiesUnique (See Table 16-15.)
Access	Read-only

### **IDE Control Status**

Name	ideControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.5
Description	Defines the status for the IDE controller.
Syntax	DellStatus
Access	Read-only

### **IDE Control Name**

Name	ideControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.60.1.6
Description	Defines the setup BIOS name for the IDE controller.
Syntax	DellStatus
Access	Read-only

### Diskette Control Table

Name	disketteControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.70
Description	Defines the Diskette Control Table.
Syntax	DisketteControlTableEntry
Access	Not accessible

### **Diskette Control Table Entry**

Name	disketteControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1
Description	Defines the Diskette Control Table entry.
Syntax	DellStatus
Access	Not accessible
Index	diskette Control chassis Index, diskette Control Index

### **Diskette Control Chassis Index**

Name	disketteControlchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### **Diskette Control Index**

Name	disketteControlIndex
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.2
Description	Defines the index of the diskette controllers in this chassis.
Syntax	DellObjectRange
Access	Read-only

### **Diskette Control Capabilities Unique**

Name	disketteControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.3
Description	Defines the capabilities of the diskette controller.
Syntax	DellDisketteControlCapabilitiesUnique (See Table 16-17.)
Access	Read-only

### **Diskette Control Settings Unique**

Name	disketteControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.4
Description	Defines the control settings for the diskette controller.
Syntax	DellDisketteControlSettingsUnique
Access	Read-only

### **Diskette Control Status**

Name	disketteControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.5
Description	Defines the status of the diskette controller.
Syntax	DellStatus
Access	Read-only

### **Diskette Control Name**

Name	disketteControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.70.1.6
Description	Defines the setup BIOS name of the diskette controller.
Syntax	DellString
Access	Read-only

### **Network Interface Control Table**

These MIB objects enable you to track the attributes of the NIC card for your system.

Name	networkInterfaceControlTable
Object ID	1.3.6.1.4.1.674.10892.1.1400.80
Description	Defines the Network Interface Control Table.
Syntax	NetworkInterfaceControlTableEntry
Access	Not accessible

### Network Interface Control Table Entry

Name	networkInterfaceControlTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1
Description	Defines the Network Interface Control Table entry.
Syntax	NetworkInterfaceControlTableEntry
Access	Not accessible
Index	network Interface Control chassis Index, network Interface Control Index

### **Network Interface Control Chassis Index**

Name	networkInterfaceControlchassisIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.1	
Description	Defines the index (one-based) of this chassis.	
Syntax	DellObjectRange	
Access	Read-only	

### **Network Interface Control Index**

Name	networkInterfaceControlIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.2	
Description	Defines the index (one-based) of the network interface controller in this chassis.	
Syntax	DellObjectRange	
Access	Read-only	

### **Network Interface Control Capabilities Unique**

Name	networkInterfaceControlCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.3
Description	Defines the capabilities of the NIC.
Syntax	DellNetworkInterfaceControlCapabilitiesUnique (See Table 16-17.)
Access	Read-only

### Network Interface Control Settings Unique

Name	networkInterfaceControlSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.4
Description	Defines the control settings for the NIC.
Syntax	DellNetworkInterfaceControlSettingsUnique (See Table 16-18.)
Access	Read-write

### **Network Interface Control Status**

Name	networkInterfaceControlStatus
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.5
Description	Defines the status of the NIC.
Syntax	DellStatus
Access	Read-only

### **Network Interface Control Name**

Name	networkInterfaceControlName
Object ID	1.3.6.1.4.1.674.10892.1.1400.80.1.6
Description	Defines the setup BIOS name of the NIC.
Syntax	DellString
Access	Read-only

### **BIOS Group Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Table 10-1. Speaker Control Capabilities Unique	Table 16-1.	Speaker Control Capabilities Unique
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Variable Name: DellSpeakerControlCapabilitiesUnique		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
unknown(1)	Speaker control capabilities are unknown.	
enableCapable(2)	Setup BIOS can enable speaker control.	
lowCapable(4)	Setup BIOS can set the speaker volume to low.	
<pre>mediumCapable(8)</pre>	Setup BIOS can set the speaker volume to medium.	
highCapable(16)	Setup BIOS can set the speaker volume to high.	
allVolumeCapable(30)	Setup BIOS can set the speaker volume to any of the three settings.	

### Table 16-2. Speaker Control Settings Unique

Variable Name: DellSpeakerControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Speaker control state is unknown.
enabled(2)	Speaker control is enabled.
low(4)	Speaker control volume is low.
medium(8)	Speaker control volume is medium.
high(16)	Speaker control volume is high.

Table 16-3.	Network Interface	(NIF) Wakeup	on LAN	Capabilities	Unique
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Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	Setup BIOS Wakeup on LAN capabilities are unknown.
enableCapable(2)	Setup BIOS is capable of enabling the NIF Wakeup on LAN.
addInCardCapable(4)	Setup BIOS is capable of enabling Wakeup on LAN by option card.
onBoardCapable(8)	Setup BIOS is capable of enabling Wakeup on LAN by integrated NIF.
bothCapable(14)	Setup BIOS is capable of enabling Wakeup on LAN by either option card or integrated NIF.

Variable Name: DellNIFwakeonLanControlCapabilitiesUnique

### Table 16-4. NIF Wakeup on LAN Control Settings Unique

Variable Name: DellNIFwakeonLanControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	NIF Wakeup on LAN state is unknown.
enabled(2)	NIF Wakeup on LAN is enabled.
addInCard(4)	NIF Wakeup on LAN is by option card.
onBoard(8)	NIF Wakeup on LAN is by integrated NIF.
addInCardOrOnBoard(12)	NIF Wakeup on LAN is by option card or integrated NIF.

### Table 16-5. Boot Sequence Control Capabilities Unique

Data Type: Integer	
Possible Data Values	Meaning of Data Value
bootSequenceUnknown(1)	Boot sequence capabilities are unknown.
<pre>bootFromDisketteFirstCapable(2)</pre>	Setup BIOS can boot from a diskette first.
<pre>bootFromhardDriveFirstCapable(4)</pre>	Setup BIOS can boot from an IDE hard drive first.
bootFromDisketteORHardDriveFirst Capable(6)	Setup BIOS can boot from a diskette or an IDE hard drive first.
<pre>bootFromDeviceListCapable(8)</pre>	Setup BIOS can boot from a device list.
<pre>bootFromCDROMFirstCapable(16)</pre>	Setup BIOS can boot from a CD first.
allFirstCapable(30)	Setup BIOS can boot by any of the preceding methods first.

Variable Name: DellBootSequenceControlCapabilitiesUnique

### Table 16-6. Boot Sequence Control Settings Unique

Data Type: Integer	
Possible Data Values	Meaning of Data Value
bootSequenceUnknown(1)	Boot sequence state is unknown.
<pre>bootFromDisketteFirst(2)</pre>	Setup BIOS is set to boot by diskette first.
<pre>bootFromHardDriveFirst(4)</pre>	Setup BIOS is set to boot by IDE hard drive first.
bootFromDeviceList(8)	Setup BIOS is set to boot by a device list.
bootFromCDROMFirst(16)	Setup BIOS is set to boot by CD first.

Variable Name: DellBootSequenceControlSettingsUnique

### Table 16-7. BIOS Password Control Capabilities

### Variable Name: DellBIOSPasswordControlCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
passwordControlCapabilitiesUnknown(1)	BIOS password capabilities are unknown.
<pre>passwordControlEnableCapable(2)</pre>	Setup BIOS is capable of enabling password changes.
passwordControlJumperDisableCapable(4)	Setup BIOS is capable of determining if password control can be jumper disabled.
passwordControlEnableANDJumperDisable Capable(6)	Setup BIOS is capable of enabling password changes and of determining if password control can be jumper disabled.

### Table 16-8. BIOS Password Control Settings Unique

Variable Name: DellBIOSPasswordControlSettingsUnique
--

Data Type: Integer

Possible Data Values	Meaning of Data Value
passwordControlSettingsUnknown(1)	Setup BIOS password state is unknown.
passwordControlEnabled(2)	Setup BIOS has password changes enabled.
passwordControlJumperDisabled(4)	Setup BIOS has determined that password control has been disabled by a jumper.

### Table 16-9. BIOS Password Control Settings

Variable Name: DellBIOSPasswordControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
passwordControlSettingsUnknown(1)	Setup BIOS password state is unknown.
passwordControlEnabled(2)	Setup BIOS has password changes enabled.
passwordControlJumperDisabled(4)	Setup BIOS has determined that password control has been disabled by a jumper.

Table 16-10.	Parallel Port Control Capabiliti	es
	i aranor i ore condici capabilita	

Variable Name: DellParallelPortControlCapabilitiesUnique	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	Setup BIOS parallel port capabilities are unknown.
enableCapable(2)	Setup BIOS can enable the parallel port.
lpt1Capable(4)	Setup BIOS can support parallel port 1.
lpt1andEnableCapable(6)	Setup BIOS has enabled parallel port 1.
lpt2Capable(8)	Setup BIOS can support parallel port 2.
lpt2andEnableCapable(10)	Setup BIOS has enabled parallel port 2.
lpt3Capable(16)	Setup BIOS can support parallel port 3.
lpt3andEnableCapable(18)	Setup BIOS has enabled parallel port 3.
allParallelPortCapable(30)	Setup BIOS can support any of the three parallel ports.

### Table 16-11. Parallel Port Control Settings

Variable Name: DellParallelPortControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Parallel port state is unknown.
enabled(2)	Setup BIOS has enabled the parallel port.
lpt1(4)	Setup BIOS supports parallel port 1.
lpt1Enabled(6)	Setup BIOS has enabled parallel port 1.
lpt2(8)	Setup BIOS supports parallel port 2.
lpt2Enabled(10)	Setup BIOS has enabled parallel port 2.
lpt3(16)	Setup BIOS supports parallel port 3.

### Table 16-12. Parallel Port Control Mode Settings

Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	Parallel port mode is unknown.
atModeEnabled(2)	Setup BIOS has set the parallel port to AT mode.
ps2ModeEnabled(4)	Setup BIOS has set the parallel port to Personal Systems/2 (PS/2) mode.
ecpModeEnabled(8)	Setup BIOS has set the parallel port to Extended Capabilities Port (ECP) mode.
eppModeEnabled(16)	Setup BIOS has set the parallel port to Enhanced Parallel Port (EPP) mode.

Variable Name: DellParallelPortControlModeSettingsUnique

### Table 16-13. Serial Port Control Capabilities

Data Type: Integer **Possible Data Values Meaning of Data Value** unknown(1) Setup BIOS serial port capabilities are unknown. enableCapable(2) Setup BIOS can enable the serial port. Setup BIOS can support serial port 1. com1Capable(4) enableAndCom1Capable(6) Setup BIOS can enable serial port 1. Setup BIOS can support serial port 2. com2Capable(8) Setup BIOS is capable of enabling serial port 2. enableAndCom2Capable(10) com3Capable(16) Setup BIOS can support serial port 3. Setup BIOS is capable of enabling serial port 3. enableAndCom3Capable(18) Setup BIOS can support serial port 4. com4Capable(32) enableAndCom4Capable(34) Setup BIOS is capable of enabling serial port 4. autoConfigCapable(64) Setup BIOS is capable of autoconfiguring all serial ports. com10rCom3CapableAndAutoConfigCap Setup BIOS has enabled autoconfiguration of able(86) COM1 and COM3 serial ports. com2OrCom4CapableAndAutoConfigCap Setup BIOS has enabled autoconfiguration of COM2 and COM4 serial ports. able(106) Setup BIOS is capable of enabling or allcomCapable(126) autoconfiguring all serial ports.

Variable Name: DellSerialPortControlCapabilitiesUnique

### Table 16-14. Serial Port Control Settings

Variable Name: DellSerialPortControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Serial port state is unknown.
enabled(2)	Setup BIOS has enabled the serial port.
com1(4)	Setup BIOS has selected serial port 1.
comlEnabled(6)	Setup BIOS has enabled serial port 1.
com2(8)	Setup BIOS has selected serial port 2.
com2Enabled(10)	Setup BIOS has enabled serial port 2.
com3(16)	Setup BIOS has selected serial port 3.
com3Enabled(18)	Setup BIOS has enabled serial port 3.
com4(32)	Setup BIOS has selected serial port 4.
com4Enabled(34)	Setup BIOS has enabled serial port 4.
comPortsAutoConfig(64)	Setup BIOS has selected autoconfiguration of serial ports.
enabledAndAutoConfig(66)	Setup BIOS has enabled autoconfiguration of serial ports.

### Table 16-15. IDE Control Capabilities

Variable Name: DellideControlCapabilitiesUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	IDE control capabilities are unknown.
ideControlAutoConfigOrEnableCapable(2)	IDE controller is autoconfigurable or enable capable.

### Table 16-16. Diskette Control Settings

Variable Name: DellDisketteControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Diskette control state is unknown.
<pre>disketteControlAutoConfigEnabledOrEnabled (2)</pre>	Diskette control is set as autoconfigurable or enabled.

### Table 16-17. Network Interface Control Capabilities

Variable Name: DellNetworkInterfaceControlCapabilitiesUnique

Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	Unknown setup BIOS network interface capabilities.
enableCapable(2)	Setup BIOS is capable of enabling the network interface.
enableWithoutPXECapable(4)	Setup BIOS is capable of enabling the NIF without Pre-boot eXecution Environment (PXE).

### Table 16-18. Network Interface Control Settings

Variable Name: DellNetworkInterfaceControlSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Network interface state is unknown.
enabled(2)	Network interface is enabled.
enabledWithoutPXE(4)	Network interface is enabled without PXE.

# **Local Response Agent Group**

The Local Response Agent Group provides information about various attributes of your system's local response agent (LRA). The LRA allows systems managers to predetermine how a system running the server administrator will respond to a particular event type, such as the loss of redundancy in a specific component or the elevation of temperature in a chassis. Systems managers can configure the LRA to respond to an event type with a specific action. When the condition of the critical component worsens, the systems manager can escalate the response to make it more obvious to the operator.

For example, when a voltage probe on a monitored machine reaches a warning condition, the systems manager may want to notify the operator by causing the machine to beep. When the voltage probe reaches failure, the systems manager might want to have the system that has a failing component send a broadcast message to the management system and power off the troubled system.

# **LRA Group Tables**

The following management information base (MIB) tables define LRA variable attributes:

- LRA Global Settings Table
- LRA Action Table

### LRA Global Settings

The global settings table allows the systems manager to determine what LRA capabilities exist for a specific system that is running Server Administrator. Some machines may support all or some of the capabilities described in DellLocalResponseAgentCapabilitiesUnique. The LRA Global Settings Table also defines thermal shutdown capabilities and settings. In the event that a temperature probe determines the temperature is at or over the failure limit, the systems manager can set an action to be taken automatically.

### LRA Global Settings Table

Name	lRAGlobalSettingsTable
Object ID	1.3.6.1.4.1.674.10892.1.1500.10
Description	Defines the LRA Global Settings Table.
Syntax	SEQUENCE OF LRAGlobalSettingsTableEntry
Access	Not accessible

### LRA Global Settings Table Entry

Name	lRAGlobalSettingsTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1
Description	Defines the LRA Global Settings Table entry.
Syntax	LRAGlobalSettingsTableEntry
Access	Not accessible
Index	lRAGlobalchassisIndex

### LRA Global Chassis Index

Name	lRAGlobalchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### LRA Global State

Name	lRAGlobalState
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.2
Description	Defines the state of the LRA global settings.
Syntax	DellStateSettings
Access	Read-only

### LRA Global Settings Disable Time-out Value

Name	lRAGlobalSettingsDisableTimeoutValue
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.3
Description	Defines the time-out duration countdown, in seconds, that the LRA global settings will be disabled after a system shutdown and reboot.
Syntax	DellUnsigned32BitRange
Access	Read-only
LRA Global Settin	gs Capabilities Unique
Name	lRAGlobalSettingsCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.4
Description	Defines the set of global capabilities that all local response agents may or may not allow to be set or reset.
Syntax	DellLocalResponseAgentCapabilitiesUnique (See Table 17-1.)
Access	Read-only

### LRA Global Thermal Shutdown Capabilities Unique

Name	lRAGlobalThermalShutdownCapabilitiesUnique
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.5
Description	Defines the set of thermal shutdown capabilities that are supported by the LRA.
Syntax	DellLRAThermalShutdownCapabilitiesUnique
Access	Read-only

### LRA Global Thermal Shutdown State Settings Unique

Name	lRAGlobalThermalShutdownStateSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1500.10.1.6
Description	Defines the set of thermal shutdown state and settings that the local response agent supports.
Syntax	DellLRAThermalShutdownStateSettingsUnique
Access	Read-write

### **LRA Action Table**

The DellLocalResponseAgentCapabilitiesUnique variable in the global action table defines the capabilities that are allowed for a particular system. The LRA Action Table that follows selects which of the system's capabilities (global actions) are to be enabled.

Name	lRAActionTableTable
Object ID	1.3.6.1.4.1.674.10892.1.1500.20
Description	Defines the LRA Action Table.
Syntax	SEQUENCE OF LRAActionTableTableEntry
Access	Not accessible

### **LRA Action Table Entry**

Name	lRAActionTableTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1500.20.1
Description	Defines the LRA Action Table entry.
Syntax	LRAActionTableTableEntry
Access	Not accessible
Index	lRAAction Table chassis Index, lRAAction Table Action Number Index

### **LRA Action Table Chassis Index**

Name	lRAActionTablechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1500.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

### LRA Action Table Action Number Index

Name	lRAActionTableActionNumberIndex
Object ID	1.3.6.1.4.1.674.10892.1.1500.20.1.2
Object ID Description	<ul> <li>1.3.6.1.4.1.674.10892.1.1500.20.1.2</li> <li>Defines the LRA action number index. The action number indexes are as follows:</li> <li>160 — temperature failure action definition</li> <li>168 — cooling device failure action definition</li> <li>172 — voltage failure action definition</li> <li>200 — temperature warning action definition</li> <li>201 — tooling device warning action definition</li> <li>202 — voltage warning action definition</li> <li>204 — cooling device warning action definition</li> <li>206 — amperage failure action definition</li> <li>208 — amperage tailure action definition</li> <li>210 — a power or cooling unit redundancy lost action definition</li> <li>212 — a power or cooling unit redundancy degraded action definition</li> <li>214 — power supply failed action definition</li> <li>228 — memory device warning action definition</li> <li>213 — nemory device failure action definition</li> <li>153 — log near full action definition</li> <li>1554 — log full action definition</li> <li>1603 — processor warning action definition</li> <li>1604 — processor failure action definition</li> <li>1753 — log near full action definition</li> <li>1603 — processor failure action definition</li> <li>1604 — processor failure action definition</li> <li>1753 — log full action definition</li> </ul>
<b>0</b> .	1704 — battery failure action definition
Syntax	DellUnsigned16BitRange
Access	Read-only
LRA Action Table	User Application Name
Name	lRAActionTableUserApplicationName
Object ID	1.3.6.1.4.1.674.10892.1.1500.20.1.3

- **Description** When the "execute application value" is set, provides the following user-assignable LRA information:
  - Name of the user application executable path
  - File name to execute

Name	lRAActionTableUserApplicationName
Syntax	DisplayString (SIZE (0256))
Access	Read-write

### LRA Action Table Settings Unique

Name	lRAActionTableSettingsUnique
Object ID	1.3.6.1.4.1.674.10892.1.1500.20.1.4
Description	Defines the LRA settings.
Syntax	DellLocalResponseAgentSettingsUnique (See Table 17-3.)
Access	Read-write

### **Local Response Agent Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

### Table 17-1. LRA Capabilities Definitions

```
Variable Name: DellLocalResponseAgentCapabilitiesUnique
```

Data Type: Integer

Possible Data Values	Meaning of Data Value
<pre>speakerControlCapable(1)</pre>	The LRA can issue a speaker beep.
<pre>consoleAlertCapable(2)</pre>	The LRA can alert the console.
<pre>broadcastMessageCapable(4)</pre>	The LRA can broadcast a message.
osShutDownCapable(8)	The LRA can shut down the operating system.
rebootCapable(16)	The LRA can reboot the system.
<pre>powerCycleCapable(32)</pre>	The LRA is capable of a system power cycle.
powerOFFCapable(64)	The LRA can shut the system power off.
executeApplicationCapable(256)	The LRA can execute a user mode application.
lraFullyCapable(383)	The LRA has all of the preceding capabilities.

### Table 17-2. LRA Thermal Shutdown Capabilities Unique

Data Type: Integer **Possible Data Values Meaning of Data Value** none(0) The LRA has no thermal shutdown capabilities. The LRA's thermal shutdown capabilities are unknown. Unknown capabilities(1) The LRA can be disabled (offline, a binary 0 value) or enabled enableCapable(2) (online, a binary 1 value). The LRA can carry out chassis-determined action(s) when a warningCapable(4) warning condition is detected. The LRA enables activation of chassis-determined action(s) enableOnWarningCapable(6) when a warning condition is detected. The LRA can carry out chassis-determined action(s) when a failureCapable(8) failure condition is detected. The LRA enables activation of chassis-determined action(s) enableOnFailureCapable(10) when a failure condition is detected. enableOnWarningOrFailureCapable(14) The LRA enables activation of chassis-determined action(s) when either a failure or a warning condition is detected.

Variable Name: DellLRAThermalShutdownCapabilitiesUnique

#### Table 17-3. Local Response Agent Settings Unique

Variable Name: DellLocalResponseAgentSettingsUnique

Data Type: Integer

Possible Data Values	Meaning of Data Value
speakerControl(1)	LRA is set to issue a speaker beep.
consoleAlert(2)	LRA is set to issue a console alert.
broadcastMessage(4)	LRA is set to issue a broadcast message.
osShutDown(8)	LRA is set to issue an operating system shutdown.
reboot(16)	LRA is set to issue a system reboot.
powerCycle(32)	LRA is set to issue a system power cycle.
powerOFF(64)	LRA is set to issue a system power off.
executeApplication(256)	LRA is set to start a user mode application.
allLRASettingsUnique(383)	LRA is set to all LRA settings combinations.

# 18

# **Cost of Ownership Group**

The Cost of Ownership (COO) Group provides a full set of cost-tracking objects, including fields for the computer's manufacturer, insurer, lessor, warranty, user, trouble tickets, and many others. You can use these management information base (MIB) objects to obtain accurate and complete measurements of the cost of each computer asset in your organization.

## **Cost of Ownership Group Tables**

The Cost of Ownership Group defines objects in the following MIB tables:

- Cost of Ownership Table
- COO Service Contract Table
- COO Cost Event Log Table
- COO Warranty Table
- COO Lease Information Table
- COO Schedule Number Table
- COO Options Table
- COO Maintenance Table
- COO Repair Table
- COO Support Information Table
- COO Trouble Ticket Table

### **Cost of Ownership Table**

The following MIB object sets up the Cost of Ownership Table.

Name	cooTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.10
Description	Defines the Cost of Ownership Table.
Syntax	SEQUENCE OF CooTableEntry
Access	Not accessible

### Cost of Ownership Table Entry

Name	cooTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1
Description	Defines the Cost of Ownership Table entry.
Syntax	CooTableEntry
Access	Not accessible
Index	coochassisIndex

### **COO Chassis Index**

Name	coochassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	CooTableEntry
Access	Read-only
COO State	
Name	cooState
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.2
Description	Defines the acquisition state of the system.
Syntax	DellStateSettings
Access	Read-only

### **COO Acquisition Purchase Cost**

Name	cooAquisitionPurchaseCost
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.3
Description	Defines the purchase cost of the system.
Syntax	DellUnsigned32BitRange
Access	Read-write

### **COO Acquisition Waybill Number**

Name	cooAquisitionWayBillNumber
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.4
Description	Defines the waybill number of the system.
Syntax	DellUnsigned32BitRange
Access	Read-write

### **COO Acquisition Install Date Name**

Name	cooAquisitionInstallDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.5
Description	Defines the installation date and time for the system.
Syntax	DellDateName
Access	Read-write

### **COO Acquisition Purchase Order**

cooAquisitionPurchaseOrder
1.3.6.1.4.1.674.10892.1.1600.10.1.6
Defines the purchase order number of the system.
DellUnsigned32BitRange
Read-write

### **COO Acquisition Purchase Date Name**

Name	cooAquisitionPurchaseDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.7
Description	Defines the purchase date and time of the system.
Syntax	DellDateName
Access	Read-write

### **COO Acquisition Signing Authority Name**

Name	cooAquisitionSigningAuthorityName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.8
Description	Defines the name of the authorized person who signs for the system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Original Machine Configuration Expensed**

Name	$\verb cooOriginalMachineConfigurationExpensed  $
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.9
Description	Specifies whether the purchase of this system was expensed.
Syntax	DellBoolean
Access	Read-write

### **COO Original Machine Configuration Vendor Name**

Name	$\verb cooOriginalMachineConfigurationVendorName  $
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.10
Description	Defines the vendor name of the system.
Syntax	DellCostofOwnershipString
Access	Read-only

### **COO Cost Center Information Vendor Name**

Name	$\verb cooCostCenterInformationVendorName   \\$
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.11
Description	Defines the cost center name of the system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO User Information User Name**

Name	cooUserInformationUserName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.12
Description	Defines the name of the user for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Extended Warranty Start Date Name**

Name	cooExtendedWarrantyStartDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.13
Description	Defines the extended warranty start date for this system.
Syntax	DellDateName
Access	Read-write

### **COO Extended Warranty End Date Name**

Name	cooExtendedWarrantyEndDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.14
Description	Defines the extended warranty end date for this system.
Syntax	DellDateName
Access	Read-write

### **COO Extended Warranty Cost**

Name	cooExtendedWarrantyCost
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.15
Description	Defines the extended warranty cost date for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

### **COO Extended Warranty Provider Name**

Name	cooExtendedWarrantyProviderName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.16
Description	Defines the name of the extended warranty provider for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

### COO Ownership Code

Name	cooOwnershipCode
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.17
Description	Defines the ownership code for this system.
Syntax	DellCooOwnershipCodes (See Table 18-1.)
Access	Read-write

### **COO Corporate Owner Name**

Name	cooCorporateOwnerName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.18
Description	Defines the name of the corporation that owns this system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Hazardous Waste Code Name**

Name	cooHazardousWasteCodeName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.19
Description	Defines the hazardous waste code for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Deployment Date Length**

Name	cooDeploymentDateLength
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.20
Description	Defines the deployment time for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

### **COO** Deployment Duration Type

Name	cooDeploymentDurationType
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.21
Description	Defines the deployment time units for this system.
Syntax	DellCooHourDayDurationType (See Table 18-2.)
Access	Read-write

### **COO Training Name**

Name	cooTrainingName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.22
Description	Defines the training that the user has for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Outsourcing Problem Description Name**

Name	cooOutsourcingProblemDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.23
Description	Defines a problem encountered with the outsourcing service provider.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Outsourcing Service Fee Name**

Name	cooOutsourcingServiceFeeName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.24
Description	Defines amount that the outsourcing vendor charges for service.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Outsourcing Signing Authority Name**

Name	cooOutsourcingSigningAuthorityName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.25
Description	Defines the name of the person who can sign the authorization for service.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Outsourcing Provider Fee Name**

Name	cooOutsourcingProviderFeeName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.26
Description	Defines any additional outsourcing charge for service.
Syntax	DellCostofOwnershipString
Access	Read-write

### **COO Outsourcing Provider Service Level Name**

Name	$\verb cooOutsourcingProviderServiceLevelName  $
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.27
Description	Defines the service level agreement for the system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Insurance Company Name**

Name	cooInsuranceCompanyName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.28
Description	Defines the name of the company that insures this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Box Asset Tag Name**

Name	cooBoxAssetTagName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.29
Description	Defines the name of the asset tag.
Syntax	DellCostofOwnershipString
Access	Read-write

#### COO Box System Name

Name	cooBoxSystemName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.30
Description	Defines the name of the system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### COO Box Central Processing Unit (CPU) Serial Number Name

Name	cooBoxCPUSerialNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.31
Description	Defines the name of the CPU serial number for the system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### COO Operating System Upgrade Type Name

Name	cooOperatingSystemUpgradeTypeName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.32
Description	Defines the name of the operating system on this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### COO Operating System Upgrade Patch Level Name

Name	cooOperatingSystemUpgradePatchLevelName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.33
Description	Defines the name of the operating system patch level for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Operating System Upgrade Date**

Name	cooOperatingSystemUpgradeDate
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.34
Description	Defines the upgrade file date for this operating system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Depreciation Duration**

Name	cooDepreciationDuration
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.35
Description	Defines the length of depreciation for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO** Depreciation Duration Type

Name	cooDepreciationDurationType
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.36
Description	Defines the unit of time for the depreciation of this system.
Syntax	DellCooMonthYearDurationType
Access	Read-write

#### **COO Depreciation Percentage**

Name	cooDepreciationPercentage
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.37
Description	Defines the percentage of depreciation for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO** Depreciation Method Name

Name	cooDepreciationMethodName
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.38
Description	Defines the name of the depreciation method for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO** Registration Is Registered

Name	cooRegistrationIsRegistered
Object ID	1.3.6.1.4.1.674.10892.1.1600.10.1.39
Description	Specifies whether this system is registered or not.
Syntax	DellBoolean
Access	Read-write

#### **COO Service Contract Table**

The service contract table provides MIB objects that help you track the name, vendor, and type of service contract you have for your system.

Name	cooServiceContractTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.20
Description	Defines the COO Service Contract Table.
Syntax	SEQUENCE OF CooServiceContractTableEntry
Access	Not accessible

#### **COO Service Contract Table Entry**

Name	cooServiceContractTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1
Description	Defines the COO Service Contract Table entry.
Syntax	CooServiceContractTableEntry
Access	Not accessible
Index	cooServiceContractchassisIndex, cooServiceContractIndex

#### **COO Service Contract Chassis Index**

Name	cooServiceContractchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Service Contract Index**

Name	cooServiceContractIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.2
Description	Defines the index (one-based) of this service contract.
Syntax	DellObjectRange
Access	Read-only

#### **COO Service Contract State**

Name	cooServiceContractState
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.3
Description	Defines the status of the service contract for this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Service Contract Was Renewed**

Name	cooServiceContractWasRenewed
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.4
Description	Specifies whether the service contract for this system was renewed.
Syntax	DellBoolean
Access	Read-write

#### **COO Service Contract Type Name**

Name	cooServiceContractTypeName
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.5
Description	Defines the name of the service contract type for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Service Contract Vendor Name**

Name	cooServiceContractVendorName
Object ID	1.3.6.1.4.1.674.10892.1.1600.20.1.6
Description	Defines the name of the service contract provider for this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Cost Event Log Table**

The COO Cost Event Log Table provides MIB objects that allow you to track the duration and type of events that are logged for a particular system.

Name	cooCostEventLogTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.30
Description	Defines the COO Cost Event Log Table.
Syntax	SEQUENCE OF COO CostEventLogTableEntry
Access	Not accessible

#### COO Cost Event Log Table Entry

Name	cooCostEventLogTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1
Description	Defines the COO Cost Event Log Table entry.
Syntax	cooCostEventLogTableEntry
Access	Not accessible
Index	cooCostEventLogchassisIndex, cooCostEventLogIndex

#### **COO Cost Event Log Chassis Index**

Name	cooCostEventLogchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Cost Event Log Index**

Name	cooCostEventLogIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.2
Description	Defines the index (one-based) of the cost event log.
Syntax	DellObjectRange
Access	Read-only

#### **COO Cost Event Log State**

Name	cooCostEventLogState
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.3
Description	Defines the cost event log state of this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Cost Event Log Duration**

Name	cooCostEventLogDuration
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.4
Description	Defines the duration of the event for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### COO Cost Event Log Duration Type

Name	cooCostEventLogDurationType
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.5
Description	Defines the duration type of the event for this system.
Syntax	DellCOOHourDayDurationType (See Table 18-2.)
Access	Read-write

#### **COO Cost Event Log Description Name**

Name	cooCostEventLogDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1600.30.1.6
Description	Defines the name of the event description.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Warranty Table**

The COO Warranty Table objects enable you to track facts about the type and duration of the warranty for a particular system.

Name	cooWarrantyTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.40
Description	Defines the COO Warranty Table.
Syntax	SEQUENCE OF CooWarrantyTableEntry
Access	Not accessible

#### **COO Warranty Table Entry**

Name	cooWarrantyTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1
Description	Defines the COO Warranty Table entry.
Syntax	CooWarrantyTableEntry
Access	Not accessible
Index	cooW arranty chassis Index, cooW arranty Index

#### **COO Warranty Chassis Index**

Name	cooWarrantychassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-write

#### **COO Warranty Index**

Name	cooWarrantyIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.2
Description	Defines the index of the warranty for this system.
Syntax	DellObjectRange
Access	Read-only

#### **COO Warranty State**

Name	cooWarrantyState
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.3
Description	Defines the state of the warranty for this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Warranty Duration**

Name	cooWarrantyDuration
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.4
Description	Defines the duration of the warranty.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Warranty Duration Type**

Name	cooWarrantyDurationType
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.5
Description	Defines the warranty duration type for the system.
Syntax	DellCOODayMonthDurationType
Access	Read-write

#### **COO Warranty End Date Name**

Name	cooWarrantyEndDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.6
Description	Defines the warranty end date for this system.
Syntax	DellDateName
Access	Read-write

#### **COO Warranty Cost**

Name	cooWarrantyCost
Object ID	1.3.6.1.4.1.674.10892.1.1600.40.1.7
Description	Defines the cost of the warranty for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Lease Information Table**

The COO lease information MIB objects enable you to track information about your lessor, lease duration, and lease type for each system.

Name	cooLeaseInformationTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.50
Description	Defines the COO Lease Information Table.
Syntax	SEQUENCE OF CooLeaseInformationTableEntry
Access	Not accessible

#### **COO Lease Information Table Entry**

Name	cooLeaseInformationTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1
Description	Defines the COO Lease Information Table entry.
Syntax	CooLeaseInformationTableEntry
Access	Not accessible
Index	cooLeaseInformationchassisIndex, cooLeaseInformationIndex

#### **COO Lease Information Chassis Index**

Name	cooLeaseInformationchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Lease Information Index**

Name	cooLeaseInformationIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.2
Description	Defines the index of the lease information for this system.
Syntax	DellObjectRange
Access	Read-only

#### **COO Lease Information State**

Name	cooLeaseInformationState
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.3
Description	Defines the lease information state for this system.
Syntax	DellStateSettings
Access	Read-write

#### **COO Lease Information Multiple Schedules**

Name	cooLeaseInformationMultipleSchedules
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.4
Description	Defines whether there are multiple schedules for this lease.
Syntax	DellBoolean
Access	Read-only

#### **COO Lease Information Buyout Amount**

Name	cooLeaseInformationBuyOutAmount
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.5
Description	Defines the balance purchase price for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Lease Information Lease Rate Factor**

Name	cooLeaseInformationLeaseRateFactor
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.6
Description	Defines the rate factor for the lease on this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Lease Information End Date Name**

Name	cooLeaseInformationEndDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.7
Description	Defines the end date for the lease on this system.
Syntax	DellDateName
Access	Read-write

#### **COO Lease Information Fair Market Value**

Name	$\verb cooLeaseInformationFairMarketValue  $
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.8
Description	Defines the fair market value of this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Lease Information Lessor Name**

Name	cooLeaseInformationLessorName
Object ID	1.3.6.1.4.1.674.10892.1.1600.50.1.9
Description	Defines the name of the lessor of this system.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Schedule Number Table**

Name	cooScheduleNumberTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.60
Description	Defines the COO Schedule Number Information Table.
Syntax	SEQUENCE OF CooScheduleNumberTableEntry
Access	Not accessible

#### **COO Schedule Number Table Entry**

Name	cooScheduleNumberTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1
Description	Defines the COO Schedule Number Information Table entry.
Syntax	CooScheduleNumberTableEntry
Access	Not accessible
Index	cooSchedule Number chassis Index, cooSchedule Number Index

#### **COO Schedule Number Chassis Index**

Name	cooScheduleNumberchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Schedule Number Index**

Name	cooScheduleNumberIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1.2
Description	Defines the index of the schedule number information.
Syntax	DellObjectRange
Access	Read-only

#### **COO Schedule Number State**

Name	cooScheduleNumberState
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1.3
Description	Defines the schedule number information state of this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Schedule Number Lease Information Index Reference**

Name	cooScheduleNumberLeaseInformationIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1.4
Description	Defines the lease information index number to reference the schedule number.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Schedule Number Description Name**

Name	cooScheduleNumberDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1600.60.1.5
Description	Describes the schedule number information.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Options Table**

Name	cooOptionsTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.70
Description	Defines the COO Options Table.
Syntax	SEQUENCE OF CooOptionsTableEntry
Access	Not accessible

#### **COO Options Table Entry**

Name	cooOptionsTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1
Description	Defines the COO Options Table entry.
Syntax	CooOptionsTableEntry
Access	Not accessible
Index	cooOptionschassisIndex

#### **COO Options Chassis Index**

Name	cooOptionschassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Options Index**

Name	cooOptionsIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1.2
Description	Defines the index (one-based) of the option information for this system.
Syntax	DellObjectRange
Access	Read-only

#### **COO Options State**

Name	cooOptionsState
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1.3
Description	Defines the option information state for this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Options Lease Information Index Reference**

Name	cooOptionsLeaseInformationIndexReference
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1.4
Description	Defines the lease information index of the option information for this system.
Syntax	DellUnsigned32BitRange
Access	Read-write

#### **COO Options Description Name**

Name	cooOptionsDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1600.70.1.5
Description	Defines the option information description name.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Maintenance Table**

Name	cooMaintenanceTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.80
Description	Defines the COO Maintenance Table.
Syntax	SEQUENCE OF CooMaintenanceTableEntry
Access	Not accessible

#### **COO Maintenance Table Entry**

Name	cooMaintenanceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1
Description	Defines the COO Maintenance Table entry.
Syntax	CooMaintenanceTableEntry
Access	Not accessible
Index	CooMaintenance chassis Index, CooMaintenance Index

#### **COO Maintenance Chassis Index**

Name	cooMaintenancechassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Maintenance Index**

Name	cooMaintenanceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.2
Description	Defines the index of this system's maintenance information.
Syntax	DellObjectRange
Access	Read-only

#### **COO Maintenance State**

Name	cooMaintenanceState
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.3
Description	Defines the state of this system's maintenance information.
Syntax	DellStateSettings
Access	Read-only

#### **COO Maintenance Start Date Name**

Name	cooMaintenanceStartDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.4
Description	Defines the start date for maintenance on this system.
Syntax	DellDateName
Access	Read-write

#### **COO Maintenance End Date Name**

Name	cooMaintenanceEndDateName
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.5
Description	Defines the end date for maintenance on this system.
Syntax	DellDateName
Access	Read-write

#### **COO Maintenance Provider Name**

Name	cooMaintenanceProviderName
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.6
Description	Defines the maintenance provider's name.
Syntax	DellStateSettings
Access	Read-write

#### **COO Maintenance Restrictions Name**

Name	cooMaintenanceRestrictionsName
Object ID	1.3.6.1.4.1.674.10892.1.1600.80.1.7
Description	Defines the maintenance agreement restrictions.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Repair Table**

Name	cooRepairTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.90
Description	Defines the COO Repair Table.
Syntax	SEQUENCE OF CooRepairTableEntry
Access	Not accessible

#### **COO Repair Table Entry**

Name	cooRepairTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1
Description	Defines the COO Repair Table entry.
Syntax	CooRepairTableEntry
Access	Not accessible
Index	cooRepairchassisIndex, cooRepairIndex

#### **COO Repair Chassis Index**

Name	cooRepairchassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Repair Index**

Name	cooRepairIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1.2
Description	Defines the index (one-based) of the repair information for this system.
Syntax	DellObjectRange
Access	Read-only

#### **COO Repair State**

Name	cooRepairState
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1.3
Description	Defines the state of the repair information for this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Repair Counter**

Name	cooRepairCounter
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1.4
Description	Defines the number of repairs that this system has undergone.
Syntax	DellCostofOwnershipString
Access	Read-write

#### **COO Repair Vendor Name**

Name	cooRepairVendorName
Object ID	1.3.6.1.4.1.674.10892.1.1600.90.1.5
Description	Defines the name of the vendor that repairs this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Support Information Table**

Name	cooSupportInformationTable
Object ID	1.3.6.1.4.1.674.10892.1.1600.100
Description	Defines the COO Support Information Table.
Syntax	SEQUENCE OF cooSupportInformationTableEntry
Access	Not accessible

#### **COO Support Information Table Entry**

Name	cooSupportInformationTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1
Description	Defines the COO Support Information Table entry.
Syntax	cooSupportInformationTableEntry
Access	Not accessible
Index	$cooSupportInformation chassisIndex\ cooSupportInformationIndex$

#### **COO Support Information Chassis Index**

Name	$\verb cooSupportInformationchassisIndex  $
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **COO Support Information Index**

Name	cooSupportInformationIndex
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.2
Description	Defines the index (one-based) for this system's support information.
Syntax	DellObjectRange
Access	Read-only

#### **COO Support Information State**

Name	cooSupportInformationState
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.3
Description	Defines the support information state for this system.
Syntax	DellStateSettings
Access	Read-only

#### **COO Support Information Is Outsourced**

Name	cooSupportInformationIsOutsourced
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.4
Description	Specifies whether the support for this system is outsourced or not.
Syntax	DellBoolean
Access	Read-write

#### **COO Support Information Type**

Name	cooSupportInformationType	
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.5	
Description	Defines the type of component, system, or network problem that occurred.	
Syntax	DellUnsigned32BitRange	
Access	Read-write	

#### **COO Support Information Help Desk Name**

Name	cooSupportInformationHelpDeskName	
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.6	
Description	Defines the help desk information provided.	
Syntax	DellCostofOwnershipString	
Access	Read-write	

#### **COO Support Information Fix Type Name**

Name	cooSupportInformationFixTypeName	
Object ID	1.3.6.1.4.1.674.10892.1.1600.100.1.7	
Description	Defines the method used to fix the problem.	
Syntax	DellCostofOwnershipString	
Access	Read-write	

#### **COO Trouble Ticket Table**

The MIB objects in the Trouble Ticket Table enable you to track details of any trouble tickets that you open for your system.

Name	cooTroubleTicketTable	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110	
Description	Defines the COO Trouble Ticket Table.	
Syntax	SEQUENCE OF cooTroubleTicketTableEntry	
Access	Not accessible	

#### **COO Trouble Ticket Table Entry**

Name	cooTroubleTicketTableEntry	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1	
Description	Defines the COO Trouble Ticket Table entry.	
Syntax	cooTroubleTicketTableEntry	
Access	Not accessible	
Index	cooTroubleTicketchassisIndex, cooTroubleTicketIndex	

#### **COO Trouble Ticket Chassis Index**

Name	cooTroubleTicketchassisIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1.1	
Description	Defines the index (one-based) of this chassis.	
Syntax	DellObjectRange	
Access	Read-only	

#### **COO Trouble Ticket Index**

Name	cooTroubleTicketIndex	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1.2	
Description	Defines the index (one-based) of the system's trouble ticket information.	
Syntax	DellObjectRange	
Access	Read-only	

#### **COO Trouble Ticket State**

Name	cooTroubleTicketState	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1.3	
Description	Defines the trouble ticket information state for this system.	
Syntax	DellStateSettings	
Access	Read-only	

#### **COO Trouble Ticket Support Information Index Reference**

Name	cooTroubleTicketSupportInformationIndexReference	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1.4	
Description	Defines the support information index that references the trouble ticket.	
Syntax	DellUnsigned32BitRange	
Access	Read-write	

#### **COO Trouble Ticket Number Name**

Name	cooTroubleTicketNumberName	
Object ID	1.3.6.1.4.1.674.10892.1.1600.110.1.5	
Description	Defines the trouble ticket number for this system.	
Syntax	DellCostofOwnershipString	
Access	Read-write	

# **Cost of Ownership Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Variable Name: DellCooOwnershipCodes	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
other(1)	The ownership code is not one of following:
unknown(2)	The ownership code is unknown.
owned(3)	The ownership code is owned.
leased(4)	The ownership code is leased.
rented(5)	The ownership code is rented.
offOfLease(6)	The ownership code is off of lease.
transfer(7)	The ownership code is transfer.

#### Table 18-1. COO Ownership Codes

#### Table 18-2. COO Hour Day Duration Type

Variable Name: DellCooHourDayDurationType		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
unknown(1)	Duration time type is unknown.	
hours(2)	Duration time type is in hours.	
days(3)	Duration time type is in days.	

#### Table 18-3. COO Day Month Duration Type

Variable Name: DellCooDayMonthDurationType

Data Type: Integer

Possible Data Values	Meaning of Data Value
unknown(1)	Duration time type is unknown.
days(3)	Duration time type is in days.
months(4)	Duration time type is in months.

#### Table 18-4. COO Month Year Duration Type

Variable Name: DellCooMonthYearDurationType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	Duration time type is unknown.
months(4)	Duration time type is in months.
years(5)	Duration time type is in years.

# 19

# **Remote Access Group**

The Remote Access Group provides information about the remote access hardware that may be present in your system. In addition to providing general information about the capabilities and settings of the remote access hardware, this group provides information about administrative users, SNMP trap destinations, modem configuration for dial-up networking, dial-in configuration, and dial-out destinations.

# **DRAC** 4

The Remote Access Group defines Dell<sup>™</sup> Remote Access Controller (DRAC) 4 objects in the Remote Access Table.

#### **Remote Access Table**

The following MIB object sets up the Remote Access Table.

Name	remoteAccessTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.10
Description	Defines the Remote Access Table.
Syntax	SEQUENCE OF RemoteAccessTableEntry
Access	Not accessible

#### **Remote Access Table Entry**

Name	remoteAccessTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1
Description	Defines the Remote Access Table entry.
Syntax	RemoteAccessTableEntry
Access	Not accessible
Index	remote Access Chassis Index, remote Access Adapter Index

#### **Remote Access Chassis Index**

Name	remoteAccessChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Access Adapter Index**

Name	remoteAccessAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.2
Description	Defines the index (one-based) of the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Access Type**

Name	remoteAccessType
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.3
Description	Defines the type of remote access hardware.
Syntax	DellRemoteAccessType (See Table 19-1.)
Access	Read-only

#### **Remote Access State Capabilities**

Name	remoteAccessStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.4
Description	Defines the state capabilities of the remote access hardware.
Syntax	DellStateCapabilities
Access	Read-only

#### **Remote Access State Settings**

Name	remoteAccessStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.5
Description	Defines the state setting of the remote access hardware.
Syntax	DellStateSettings
Access	Read-write

#### **Remote Access Status**

Name	remoteAccessStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.6
Description	Defines the status of the remote access hardware.
Syntax	DellStatus
Access	Read-only

#### **Remote Access Product Info Name**

Name	remoteAccessProductInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.7
Description	Defines the name of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Description Info Name**

Name	remoteAccessDescriptionInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.8
Description	Defines the description of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (0255))
Access	Read-only

#### **Remote Access Version Info Name**

Name	remoteAccessVersionInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.9
Description	Defines the version of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Local Area Network (LAN) Capabilities**

Name	remoteAccessLANCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.14
Description	Defines the LAN capabilities of the remote access hardware.
Syntax	DellRemoteAccessLANCapabilities (See Table 19-6.)
Access	Read-only

#### **Remote Access LAN Settings**

Name	remoteAccessLANSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.15
Description	Defines the LAN settings of the remote access hardware.
Syntax	DellRemoteAccessLANSettings (See Table 19-7.)
Access	Read-write

#### Remote Access Network Interface Controller (NIC) Static IP Address

Name	remoteAccessNICStaticIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.25
Description	Defines the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

#### **Remote Access NIC Static Netmask Address**

Name	remoteAccessNICStaticNetmaskAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.26
Description	Defines the netmask for the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

#### **Remote Access NIC Static Gateway Address**

Name	remoteAccessNICStaticGatewayAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.27
Description	Defines the IP address for the gateway associated with the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

#### Remote Access Personal Computer Memory Card International Association (PCMCIA) Info Name

Name	remoteAccessPCMCIAInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.28
Description	Defines the information for the PCMCIA device used by the remote access hardware.
Syntax	DisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Miscellaneous Information Name**

Name	remoteAccessMiscInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.29
Description	Defines the miscellaneous information for the remote access hardware.
Syntax	DisplayString (SIZE (063))
Access	Read-write

#### **Remote Access NIC Current IP Address**

Name	remoteAccessNICCurrentIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.30
Description	Defines the IP address currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

#### **Remote Access NIC Current Netmask Address**

Name	remoteAccessNICCurrentNetmaskAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.31
Description	Defines the netmask currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

#### **Remote Access NIC Current Gateway Address**

Name	remoteAccessNICCurrentGatewayAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.32
Description	Defines the IP address for the gateway currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

#### **Remote Access NIC Current Information From Dynamic Host Configuration Protocol (DHCP)**

Name	remoteAccessNICCurrentInfoFromDHCP
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.33
Description	Defines whether DHCP was used to obtain the NIC information currently being used by the integrated NIC provided by the remote access hardware.
Syntax	DellBoolean
Access	Read-only

#### **Remote Access Remote Connect URL**

Name	remoteAccessRemoteConnectURL
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.34
Description	Defines the URL for launching the Remote Access Remote Connect Interface.
Syntax	DisplayString (SIZE (063))
Access	Mandatory

### **DRAC III**

The Remote Access Group defines DRAC III objects in the following MIB tables:

- Remote Access Table
- Remote User Administration Table
- Remote SNMP Trap Table
- Remote Dial-Up Table
- Remote User Dial-In Configuration Table
- Remote Dial-Out Table

#### **Remote Access Table**

The following MIB object sets up the Remote Access Table.

Name	remoteAccessTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.10
Description	Defines the Remote Access Table.
Syntax	SEQUENCE OF RemoteAccessTableEntry
Access	Not accessible

#### **Remote Access Table Entry**

Name	remoteAccessTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1
Description	Defines the Remote Access Table entry.
Syntax	RemoteAccessTableEntry
Access	Not accessible
Index	remoteAccessChassisIndex, remoteAccessAdapterIndex

#### **Remote Access Chassis Index**

Name	remoteAccessChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Access Adapter Index**

Name	remoteAccessAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.2
Description	Defines the index (one-based) of the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

#### **Remote Access Type**

Name	remoteAccessType
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.3
Description	Defines the type of remote access hardware.
Syntax	DellRemoteAccessType (See Table 19-1.)
Access	Read-only

#### **Remote Access State Capabilities**

Name	remoteAccessStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.4
Description	Defines the state capabilities of the remote access hardware.
Syntax	DellStateCapabilities
Access	Read-only

#### **Remote Access State Settings**

Name	remoteAccessStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.5
Description	Defines the state setting of the remote access hardware.
Syntax	DellStateSettings
Access	Read-write

#### **Remote Access Status**

Name	remoteAccessStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.6
Description	Defines the status of the remote access hardware.
Syntax	DellStatus
Access	Read-only

#### **Remote Access Product Info Name**

Name	remoteAccessProductInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.7
Description	Defines the name of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Description Info Name**

Name	remoteAccessDescriptionInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.8
Description	Defines the description of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (0255))
Access	Read-only

#### **Remote Access Version Info Name**

Name	remoteAccessVersionInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.9
Description	Defines the version of the product providing the remote access functionality.
Syntax	DellDisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Control Capabilities**

Name	remoteAccessControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.10
Description	Defines the control capabilities of the remote access hardware.
Syntax	DellRemoteAccessControlCapabilities (See Table 19-2.)
Access	Read-only

#### **Remote Access Control Settings**

Name	remoteAccessControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.11
Description	Defines the control settings of the remote access hardware.
Syntax	DellRemoteAccessControlSettings (See Table 19-3.)
Access	Read-write

#### **Remote Access Monitor Capabilities**

Name	remoteAccessMonitorCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.12
Description	Defines the monitor capabilities of the remote access hardware.
Syntax	DellRemoteAccessMonitorCapabilities (See Table 19-4.)
Access	Read-only

## **Remote Access Monitor Settings**

Name	remoteAccessMonitorSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.13
Description	Defines the monitor settings of the remote access hardware.
Syntax	DellRemoteAccessMonitorSettings (See Table 19-5)
Access	Read-write

## **Remote Access Local Area Network (LAN) Capabilities**

Name	remoteAccessLANCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.14
Description	Defines the LAN capabilities of the remote access hardware.
Syntax	DellRemoteAccessLANCapabilities (See Table 19-6.)
Access	Read-only

## **Remote Access LAN Settings**

Name	remoteAccessLANSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.15
Description	Defines the LAN settings of the remote access hardware.
Syntax	DellRemoteAccessLANSettings (See Table 19-7.)
Access	Read-write

## **Remote Access Host Capabilities**

Name	remoteAccessHostCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.16
Description	Defines the host capabilities of the remote access hardware.
Syntax	DellRemoteAccessHostCapabilities (See Table 19-8.)
Access	Read-only

## **Remote Access Host Settings**

Name	remoteAccessHostSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.17
Description	Defines the host settings of the remote access hardware.
Syntax	DellRemoteAccessHostSettings (See Table 19-9.)
Access	Read-write

#### **Remote Access Out-of-Band Simple Network Management Protocol (SNMP) Capabilities**

Name	remoteAccessOutOfBandSNMPCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.18
Description	Defines the out-of-band SNMP capabilities of the remote access hardware.
Syntax	DellRemoteAccessOutOfBandSNMPCapabilities (See Table 19-10.)
Access	Read-only

#### **Remote Access Out-of-Band SNMP Settings**

Name	remoteAccessOutOfBandSNMPSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.19
Description	Defines the out-of-band SNMP settings of the remote access hardware.
Syntax	DellRemoteAccessOutOfBandSNMPSettings (See Table 19-11.)
Access	Read-write

## Remote Access Simple Mail Transfer Protocol (SMTP) Server Internet Protocol (IP) Address

Name	remoteAccessSMTPServerIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.20
Description	Defines the IP address for the SMTP server used by the remote access hardware.
Syntax	IpAddress
Access	Read-write

## **Remote Access Floppy Trivial File Transfer Protocol (TFTP) IP Address**

Name	remoteAccessFloppyTFTPIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.21
Description	Defines the IP address of the TFTP server providing the operating system image used by the remote access hardware.
Syntax	IpAddress
Access	Read-write

## **Remote Access Floppy TFTP Path Name**

Name	remoteAccessFloppyTFTPPathName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.22
Description	Defines the file name of the operating system image obtained from the TFTP server used by the remote access hardware.
Syntax	DisplayString (SIZE (0255))
Access	Read-write

## **Remote Access Firmware Update IP Address**

Name	remoteAccessFirmwareUpdateIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.23
Description	Defines the IP address of the update server providing the firmware image used by the remote access hardware.
Syntax	IpAddress
Access	Read-write

## **Remote Access Firmware Update Path Name**

Name	remoteAccessFirmwareUpdatePathName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.24
Description	Defines the file name of the firmware image obtained from the update server used by the remote access hardware.
Syntax	DisplayString (SIZE (0255))
Access	Read-write

### **Remote Access Network Interface Controller (NIC) Static IP Address**

Name	remoteAccessNICStaticIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.25
Description	Defines the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

### **Remote Access NIC Static Netmask Address**

Name	remoteAccessNICStaticNetmaskAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.26
Description	Defines the netmask for the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

#### **Remote Access NIC Static Gateway Address**

Name	remoteAccessNICStaticGatewayAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.27
Description	Defines the IP address for the gateway associated with the static IP address to be used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-write

## Remote Access Personal Computer Memory Card International Association (PCMCIA) Info Name

Name	remoteAccessPCMCIAInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.28
Description	Defines the information for the PCMCIA device used by the remote access hardware.
Syntax	DisplayString (SIZE (063))
Access	Read-only

#### **Remote Access Miscellaneous Information Name**

Name	remoteAccessMiscInfoName
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.29
Description	Defines the miscellaneous information for the remote access hardware.
Syntax	DisplayString (SIZE (063))
Access	Read-write

## **Remote Access NIC Current IP Address**

Name	remoteAccessNICCurrentIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.30
Description	Defines the IP address currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

## **Remote Access NIC Current Netmask Address**

Name	remoteAccessNICCurrentNetmaskAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.31
Description	Defines the netmask currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

## **Remote Access NIC Current Gateway Address**

Name	remoteAccessNICCurrentGatewayAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.32
Description	Defines the IP address for the gateway currently being used by the integrated NIC provided by the remote access hardware.
Syntax	IpAddress
Access	Read-only

## **Remote Access NIC Current Information From Dynamic Host Configuration Protocol (DHCP)**

Name	remoteAccessNICCurrentInfoFromDHCP
Object ID	1.3.6.1.4.1.674.10892.1.1700.10.1.33
Description	Defines whether DHCP was used to obtain the NIC information currently being used by the integrated NIC provided by the remote access hardware.
Syntax	DellBoolean
Access	Read-only

## **Remote User Administration Table**

Name	remoteUserAdminTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.20
Description	Defines the Remote Access User Administration Table.
Syntax	SEQUENCE OF RemoteUserAdminTableEntry
Access	Not accessible

## **Remote User Admin Table Entry**

Name	remoteUserAdminTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1
Description	Defines the Remote Access User Administration Table entry.
Syntax	RemoteUserAdminTableEntry
Access	Not accessible
Index	remoteUserAdminChassisIndex, remoteUserAdminAdapterIndex, remoteUserAdminUserIndex

## **Remote User Admin Chassis Index**

Name	remoteUserAdminChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

## **Remote User Admin Adapter Index**

Name	remoteUserAdminAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.2
Description	Defines the index (one-based) of the remote access hardware used by this remote access user.
Syntax	DellObjectRange
Access	Read-only

## **Remote User Admin User Index**

Name	remoteUserAdminUserIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.3
Description	Defines the index (one-based) of this remote access user.
Syntax	DellObjectRange
Access	Read-only

## **Remote User Admin State Capabilities**

Name	remoteUserAdminStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.4
Description	Defines the state capabilities for this remote access user.
Syntax	DellRemoteUserAdminStateCapabilities (See Table 19-12.)
Access	Read-only

## **Remote User Admin State Settings**

Name	remoteUserAdminStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.5
Description	Defines the state settings for this remote access user.
Syntax	DellRemoteUserAdminStateSettings (See Table 19-13.)
Access	Read-write

### **Remote User Admin Status**

Name	remoteUserAdminStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.6
Description	Defines the status for this remote access user.
Syntax	DellStatus
Access	Read-only

## **Remote User Admin User Name**

Name	remoteUserAdminUserName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.7
Description	Defines the user name for this remote access user.
Syntax	DisplayString (SIZE (019))
Access	Read-write

## **Remote User Admin User Password Name**

Name	remoteUserAdminUserPasswordName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.8
Description	Defines the password for this remote access user.
Syntax	DisplayString (SIZE (0255))
Access	Read-write

## **Remote User Admin User Privilege**

Name	remoteUserAdminUserPrivilege
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.9
Description	Defines the privileges for this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote User Admin User Privilege Capabilities

Name	remoteUserAdminUserPrivilegeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.10
Description	Defines the privilege capabilities for this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-only

#### **Remote User Admin Alert Filter DRS Events Mask**

Name	${\tt remoteUserAdminAlertFilterDrsEventsMask}$
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.11
Description	Defines the DRS events filter mask for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote User Admin Alert Filter System Events Mask

Name	${\tt remoteUserAdminAlertFilterSysEventsMask}$
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.12
Description	Defines the system events filter mask for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-write

## **Remote User Admin Alert Filter DRS Capabilities**

Name	remoteUserAdminAlertFilterDrsCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.13
Description	Defines the DRS events filter capabilities for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Remote User Admin Alert Filter System Capabilities**

Name	remoteUserAdminAlertFilterSysCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.14
Description	Defines the system events filter capabilities for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-only

#### **Remote User Admin Pager Numeric Number Name**

Name	remoteUserAdminPagerNumericNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.15
Description	Defines the numeric pager number for this remote access user.
Syntax	DisplayString (SIZE (095))
Access	Read-write

#### Remote User Admin Pager Numeric Message Name

Name	remoteUserAdminPagerNumericMessageName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.16
Description	Defines the message to send to the numeric pager for this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote User Admin Pager Numeric Hang-up Delay

Name	remoteUserAdminPagerNumericHangupDelay
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.17
Description	Defines the numeric pager hang-up delay for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote User Admin Pager Alpha Phone Number Name

Name	remoteUserAdminPagerAlphaPhoneNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.18
Description	Defines the alphanumeric pager phone number for this remote access user.
Syntax	DisplayString (SIZE (095))
Access	Read-write

## Remote User Admin Pager Alpha Protocol

Name	remoteUserAdminPagerAlphaProtocol
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.19
Description	Defines the protocol used by the alphanumeric pager provider for this remote access user.
Syntax	DellRemoteUserAdminAlphaProtocolType (See Table 19-16.)
Access	Read-write

## Remote User Admin Pager Alpha Baud Rate

Name	remoteUserAdminPagerAlphaBaudRate
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.20
Description	Defines the baud rate used by the alphanumeric pager provider for this remote access user.
Syntax	DellRemoteUserAdminAlphaBaudType (See Table 19-17.)
Access	Read-write

## Remote User Admin Pager Alpha Custom Message Name

Name	${\tt remoteUserAdminPagerAlphaCustomMessageName}$
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.21
Description	Defines the message to be sent to the alphanumeric pager to inform the user of a call by this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote User Admin Pager Alpha Modem Connect Time-out

Name	$\verb remoteUserAdminPagerAlphaModemConnectTimeout  $
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.22
Description	Defines the modem connection time-out for the alphanumeric pager for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote User Admin Pager Alpha Pager ID Name

Name	remoteUserAdminPagerAlphaPagerIdName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.23
Description	Defines the ID to be sent to the alphanumeric pager to inform the user of a call by this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

#### **Remote User Admin Pager Alpha Password Name**

Name	remoteUserAdminPagerAlphaPasswordName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.24
Description	Defines the password for the alphanumeric pager for this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote User Admin Pager Modem Init String Name

Name	remoteUserAdminPagerModemInitStringName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.25
Description	Defines the initialization string to be sent to the pager modem for this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote User Admin Pager Modem Port

Name	remoteUserAdminPagerModemPort
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.26
Description	Defines the port for the pager modem for this remote access user.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote User Admin E-Mail Address Name

Name	remoteUserAdminEmailAddressName
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.27
Description	Defines the e-mail address for this remote access user.
Syntax	DisplayString (SIZE (063))
Access	Read-write

## Remote User Admin E-Mail Custom Message Name

Name	${\tt remoteUserAdminEmailCustomMessageName}$
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.28
Description	Defines the e-mail message to send to this remote access user.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## **Remote User Admin Control Capabilities**

Name	remoteUserAdminControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.29
Description	Defines the control capabilities for this remote access user.
Syntax	DellRemoteUserAdminControlCapabilities (See Table 19-14.)
Access	Read-only

## **Remote User Admin Control Settings**

Name	remoteUserAdminControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.30
Description	Defines the control settings for this remote access user.
Syntax	DellRemoteUserAdminControlSettings (See Table 19-15.)
Access	Read-write

## Remote User Admin User Type

Name	remoteUserAdminUserType
Object ID	1.3.6.1.4.1.674.10892.1.1700.20.1.31
Description	Defines the type of user for this remote access user.
Syntax	DellUnsigned8BitRange
Access	Read-write

## **Remote SNMP Trap Table**

Name	remoteSNMPTrapTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.30
Description	Defines the Remote Access SNMP Trap Destination Table.
Syntax	SEQUENCE OF RemoteSNMPTrapTableEntry
Access	Not accessible

## Remote SNMP Trap Table Entry

Name	remoteSNMPTrapTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1
Description	Defines the Remote Access SNMP Trap Destination Table entry.
Syntax	RemoteSNMPTrapTableEntry
Access	Not accessible
Index	remoteSNMPTrapChassisIndex, remoteSNMPTrapAdapterIndex, remoteSNMPTrapIndex

## Remote SNMP Trap Chassis Index

Name	remoteSNMPTrapChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

## Remote SNMP Trap Adapter Index

Name	remoteSNMPTrapAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.2
Description	Defines the index (one-based) of the remote access hardware that uses this SNMP trap destination.
Syntax	DellObjectRange
Access	Read-only

## **Remote SNMP Trap Index**

Name	remoteSNMPTrapIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.3
Description	Defines the index (one-based) of this remote access SNMP trap destination.
Syntax	DellObjectRange
Access	Read-only

## **Remote SNMP Trap State Capabilities**

Name	remoteSNMPTrapStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.4
Description	Defines the state capabilities of this remote access SNMP trap destination.
Syntax	DellRemoteSNMPTrapStateCapabilities (See Table 19-18.)
Access	Read-only

## **Remote SNMP Trap State Settings**

Name	remoteSNMPTrapStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.5
Description	Defines the state settings of this remote access SNMP trap destination.
Syntax	DellRemoteSNMPTrapStateSettings (See Table 19-19.)
Access	Read-write

## **Remote SNMP Trap Status**

Name	remoteSNMPTrapStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.6
Description	Defines the status of this remote access SNMP trap destination.
Syntax	DellStatus
Access	Read-only

## **Remote SNMP Trap Destination IP Address**

Name	remoteSNMPTrapDestinationIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.7
Description	Defines the IP address of this remote access SNMP trap destination.
Syntax	IpAddress
Access	Read-write

## Remote SNMP Trap SNMP Community Name

Name	remoteSNMPTrapSNMPCommunityName
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.8
Description	Defines the community for traps sent to this remote access SNMP trap destination.
Syntax	DisplayString (SIZE (031))
Access	Read-write

## Remote SNMP Trap Filter DRS Events Mask

Name	remoteSNMPTrapFilterDrsEventsMask
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.9
Description	Defines the DRS events filter mask for this remote access SNMP trap destination.
Syntax	DellUnsigned32BitRange
Access	Read-write

## **Remote SNMP Trap Filter System Events Mask**

Name	remoteSNMPTrapFilterSysEventsMask
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.10
Description	Defines the system events filter mask for this remote access SNMP trap destination.
Syntax	DellUnsigned32BitRange
Access	Read-write

## **Remote SNMP Trap Filter DRS Capabilities**

Name	remoteSNMPTrapFilterDrsCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.11
Description	Defines the DRS events filter capabilities for this remote access SNMP trap destination.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Remote SNMP Trap Filter System Capabilities**

Name	remoteSNMPTrapFilterSysCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.12
Description	Defines the system events filter capabilities of this remote access SNMP trap destination.
Syntax	DellUnsigned32BitRange
Access	Read-only

## **Remote SNMP Trap Control Capabilities**

Name	remoteSNMPTrapControlCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.13
Description	Defines the control capabilities of this remote access SNMP trap destination.
Syntax	DellRemoteSNMPTrapControlCapabilities (See Table 19-20.)
Access	Read-only

## **Remote SNMP Trap Control Settings**

Name	remoteSNMPTrapControlSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.30.1.14
Description	Defines the control settings of this remote access SNMP trap destination.
Syntax	DellRemoteSNMPTrapControlSettings (See Table 19-21.)
Access	Read-write

## **Remote Dial-Up Table**

Name	remoteDialUpTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.40
Description	Defines the Remote Access Dial-Up Table.
Syntax	SEQUENCE OF RemoteDialUpTableEntry
Access	Not accessible

## **Remote Dial-Up Table Entry**

Name	remoteDialUpTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1
Description	Defines the Remote Access Dial-Up Table entry.
Syntax	RemoteDialUpTableEntry
Access	Not accessible
Index	remoteDialUpChassisIndex, remoteDialUpAdapterIndex, remoteDialUpIndex

## **Remote Dial-Up Chassis Index**

Name	remoteDialUpChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Up Adapter Index**

Name	remoteDialUpAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.2
Description	Defines the index (one-based) of the remote access hardware that supports this remote access dial-up functionality.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Up Index**

Name	remoteDialUpIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.3
Description	Defines the index (one-based) of this remote access dial-up functionality.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Up State Capabilities**

Name	remoteDialUpStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.4
Description	Defines the state capabilities of this remote access dial-up functionality.
Syntax	DellRemoteDialUpStateCapabilities (See Table 19-22.)
Access	Read-only

## **Remote Dial-Up State Settings**

Name	remoteDialUpStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.5
Description	Defines the state settings of this remote access dial-up functionality.
Syntax	DellRemoteDialUpStateSettings (See Table 19-23.)
Access	Read-write

## **Remote Dial-Up Status**

Name	remoteDialUpStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.6
Description	Defines the status of this remote access dial-up functionality.
Syntax	DellStatus
Access	Read-only

## Remote Dial-Up PPP Dial-In Base IP Address

Name	remoteDialUpPPPDialInBaseIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.7
Description	Defines the base IP address of the PPP server for this remote access dial-up functionality.
Syntax	IpAddress
Access	Read-write

## Remote Dial-Up PPP Dial-In Idle Time-out

Name	remoteDialUpPPPDialInIdleTimeout
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.8
Description	Defines the PPP idle time-out value in seconds for this remote access dial-up functionality.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote Dial-Up PPP Dial-In Maximum Connection Time-out

Name	remoteDialUpPPPDialInMaxConnectTimeout
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.9
Description	Defines the PPP connect time-out value in seconds for this remote access dial-up functionality.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote Dial-Up Dial-Out Modem Connect Time-out

Name	remoteDialUpDialOutModemConnectTimeout
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.10
Description	Defines the modem dial-out time-out value in seconds for this remote access dial-up functionality.
Syntax	DellUnsigned32BitRange
Access	Read-write

## **Remote Dial-Up Modem Dial Type**

Name	remoteDialUpModemDialType
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.11
Description	Defines the dial type for the modem used by this remote access dial-up functionality.
Syntax	DellRemoteDialUpModemDialType (SeeTable 19-24.)
Access	Read-write

## **Remote Dial-Up Modem Init String Name**

Name	remoteDialUpModemInitStringName
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.12
Description	Defines the initialization string to be sent to the modem for this remote access dial-up functionality.
Syntax	DisplayString (SIZE (063))
Access	Read-write

## Remote Dial-Up Modem Baud Rate

Name	remoteDialUpModemBaudRate
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.13
Description	Defines the baud rate for the modem used by this remote access dial-up functionality.
Syntax	DellUnsigned32BitRange
Access	Read-write

## Remote Dial-Up Modem Port

Name	remoteDialUpModemPort
Object ID	1.3.6.1.4.1.674.10892.1.1700.40.1.14
Description	Defines the port for the modem used by this remote access dial-up functionality.
Syntax	DellUnsigned32BitRange
Access	Read-write

## **Remote User Dial-In Configuration Table**

Name	remoteUserDialInCfgTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.50
Description	Defines the Remote Access User Dial-In Configuration Table.
Syntax	SEQUENCE OF RemoteUserDialInCfgTableEntry
Access	Not accessible

## **Remote User Dial-In Configuration Table Entry**

Name	remoteUserDialInCfgTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1
Description	Defines the Remote Access User Dial-In Configuration Table entry.
Syntax	RemoteUserDialInCfgTableEntry
Access	Not accessible
Index	remoteUserDialInCfgChassisIndex, remoteUserDialInCfgAdapterIndex, remoteUserDialInCfgUserIndex

## **Remote User Dial-In Configuration Chassis Index**

Name	remoteUserDialInCfgChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

## **Remote User Dial-In Configuration Adapter Index**

Name	remoteUserDialInCfgAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.2
Description	Defines the index (one-based) of the remote access hardware that supports this remote access dial-in user.
Syntax	DellObjectRange
Access	Read-only

#### **Remote User Dial-In Configuration User Index**

Name	remoteUserDialInCfgUserIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.3
Description	Defines the index (one-based) of this remote access dial-in user.
Syntax	DellObjectRange
Access	Read-only

## **Remote User Dial-In Configuration State Capabilities**

remoteUserDialInCfgStateCapabilities
1.3.6.1.4.1.674.10892.1.1700.50.1.4
Defines the state capabilities of this remote access dial-in user.
DellRemoteUserDialInStateCapabilities (See Table 19-25.)
Read-only

## **Remote User Dial-In Configuration State Settings**

Name	remoteUserDialInCfgStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.5
Description	Defines the state settings of this remote access dial-in user.
Syntax	DellRemoteUserDialInStateSettings (See Table 19-26.)
Access	Read-write

#### **Remote User Dial-In Configuration Status**

Name	remoteUserDialInCfgStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.6
Description	Defines the status of this remote access dial-in user.
Syntax	DellStatus
Access	Read-only

## **Remote User Dial-In Configuration PPP Username**

Name	remoteUserDialInCfgPPPUserName
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.7
Description	Defines the PPP user name of this remote access dial-in user.
Syntax	DisplayString (SIZE (015))
Access	Read-write

## **Remote User Dial-In Configuration PPP User Password Name**

Name	${\tt remoteUserDialInCfgPPPUserPasswordName}$
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.8
Description	Defines the PPP password of this remote access dial-in user.
Syntax	DisplayString (SIZE (015))
Access	Read-write

## Remote User Dial-In Configuration Callback Phone Number Name

Name	remoteUserDialInCfgCallbackPhoneNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1700.50.1.9
Description	Defines the callback phone number for this remote access dial-in user.
Syntax	DisplayString (SIZE (095))
Access	Read-write

## **Remote Dial-Out Table**

Name	remoteDialOutTable
Object ID	1.3.6.1.4.1.674.10892.1.1700.60
Description	Defines the Remote Access Dial-Out Table.
Syntax	SEQUENCE of RemoteDialOutTableEntry
Access	Not accessible

## **Remote Dial-Out Table Entry**

Name	remoteDialOutTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1
Description	Defines the Remote Access Dial-Out Table entry.
Syntax	RemoteDialOutTableEntry
Access	Not accessible
Index	remoteDialOutChassisIndex, remoteDialOutAdapterIndex, remoteDialOutDialOutIndex

## **Remote Dial-Out Chassis Index**

Name	remoteDialOutChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.1
Description	Defines the index (one-based) of the chassis containing the remote access hardware.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Out Adapter Index**

Name	remoteDialOutAdapterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.2
Description	Defines the index (one-based) of the remote access hardware that supports this remote access dial-out functionality.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Out Dial-Out Index**

Name	remoteDialOutDialOutIndex
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.3
Description	Defines the index (one-based) of this remote access dial-out functionality.
Syntax	DellObjectRange
Access	Read-only

## **Remote Dial-Out State Capabilities**

Name	remoteDialOutStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.4
Description	Defines the state capabilities of this remote access dial-out functionality.
Syntax	DellRemoteDialOutStateCapabilities (See Table 19-27.)
Access	Read-only

## **Remote Dial-Out State Settings**

Name	remoteDialOutStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.5
Description	Defines the state settings of this remote access dial-out functionality.
Syntax	DellRemoteDialOutStateSettings (See Table 19-28.)
Access	Read-write

### **Remote Dial-Out Status**

Name	remoteDialOutStatus
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.6
Description	Defines the status of this remote access dial-out functionality.
Syntax	DellStatus
Access	Read-only

## **Remote Dial-Out IP Address**

Name	remoteDialOutIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.7
Description	Defines the IP address for this remote access dial-out destination.
Syntax	IpAddress
Access	Read-write

## **Remote Dial-Out Phone Number Name**

Name	remoteDialOutPhoneNumberName
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.8
Description	Defines the phone number for this remote access dial-out destination.
Syntax	DisplayString (SIZE (095))
Access	Read-write

## **Remote Dial-Out PPP Username**

Name	remoteDialOutPPPUserName
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.9
Description	Defines the PPP username for this remote access dial-out destination.
Syntax	DisplayString (SIZE (031))
Access	Read-write

### **Remote Dial-Out PPP Password Name**

Name	remoteDialOutPPPPasswordName
Object ID	1.3.6.1.4.1.674.10892.1.1700.60.1.10
Description	Defines the PPP password for this remote access dial-out destination.
Syntax	DisplayString (SIZE (031))
Access	Read-write

# **Remote Access Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Table 19-1. Remote Access Type

Variable Name: DellRemoteAccessType		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
remoteAccessTypeIsOther(1)	The remote access type is not one of the following:	
remoteAccessTypeIsUnknown(2)	The remote access type is unknown.	
remoteAccessTypeIsDRACIII(3)	The remote access type is DRAC III.	
remoteAccessTypeIsERA(4)	The remote access type is ERA.	

#### Table 19-2. Remote Access Control Capabilities

Variable Name: DellRemoteAccessControlCapabilities

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no control capabilities.
unknownCapabilities(1)	The remote access hardware control capabilities are unknown.
logResetCapable(2)	The remote access hardware can reset its integrated logs.
hardResetCapable(4)	The remote access hardware can perform a hard reset.
softResetCapable(8)	The remote access hardware can perform a soft reset.
gracefulResetCapable(16)	The remote access hardware can gracefully shut down and perform a soft reset.
<pre>defaultConfigResetCapable(32)</pre>	The remote access hardware can reset to its default settings.
shutdownCapable(64)	The remote access hardware can shut down.

#### Table 19-3. Remote Access Control Settings

Variable Name: DellRemoteAccessControlSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no control settings.
unknown(1)	The remote access hardware control settings are unknown.
logReset(2)	The remote access hardware will reset its integrated logs.
hardReset(4)	The remote access hardware will perform a hard reset.
softReset(8)	The remote access hardware will perform a soft reset.
gracefulReset(16)	The remote access hardware will gracefully shut down and perform a soft reset.
defaultConfigReset(32)	The remote access hardware will reset to its default settings.
shutdown(64)	The remote access hardware will shut down.

#### Table 19-4. Remote Access Monitor Capabilities

Variable Name: DellRemoteAccessMonitorCapabilities

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no monitor capabilities.
unknownCapabilities(1)	The remote access hardware monitor capabilities are unknown.
<pre>extPwrSupplyMonitorIfConnectedCap able(2)</pre>	The remote access hardware can be set to monitor the external power supply, if connected.
<pre>extPwrSupplyMonitorAlwaysEnabledCap able(4)</pre>	The remote access hardware can be set to always monitor the external power supply.

#### Table 19-5. Remote Access Monitor Settings

Variable Name: DellRemoteAccessMonitorSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no monitor settings.
unknown(1)	The remote access hardware monitor settings are unknown.
<pre>extPwrSupplyMonitorIfConnectedEn abled(2)</pre>	The remote access hardware will monitor the external power supply, if connected.
extPwrSupplyMonitorAlwaysEnabledEn abled(4)	The remote access hardware will always monitor the external power supply.

#### Table 19-6. Remote Access Local Area Network (LAN) Capabilities

Variable Name: DellRemoteAccessLANCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no LAN capabilities.
unknownCapabilities(1)	The remote access hardware LAN capabilities are unknown.
nicCapable(2)	The remote access hardware has a network interface controller (NIC).
nicDHCPCapable(4)	The remote access hardware NIC can use DHCP to obtain an IP address.

#### Table 19-7. Remote Access LAN Settings

Variable Name: DellRemoteAccessLANSettings

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no LAN settings.
unknown(1)	The remote access hardware LAN settings are unknown.
nicEnabled(2)	The remote access hardware NIC is enabled.
nicDHCPEnabled(4)	The remote access hardware NIC will use DHCP to obtain an IP address.

#### Table 19-8. Remote Access Host Capabilities

#### Variable Name: DellRemoteAccessHostCapabilities

## Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no host capabilities.
unknownCapabilities(1)	The remote access hardware host capabilities are unknown.
<pre>smtpEmailCapable(2)</pre>	The remote access hardware supports sending e-mail using SMTP.
tftpRemoteFloppyCapable(4)	The remote access hardware supports remote floppy boot using a TFTP server.
tftpRemoteFwUpdateCapable(8)	The remote access hardware supports remote firmware update using a TFTP server.

#### Table 19-9. Remote Access Host Settings

### Variable Name: DellRemoteAccessHostSettings

Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no host settings.
unknown(1)	The remote access hardware host settings are unknown.
<pre>smtpEmailEnabled(2)</pre>	The remote access hardware SMTP client is enabled for sending e-mail.
tftpRemoteFloppyEnabled(4)	The remote access hardware TFTP client is enabled for remote floppy boot.
tftpRemoteFwUpdateEnabled(8)	The remote access hardware TFTP client is enabled for remote firmware update.

#### Table 19-10. Remote Access Out-Of-Band Simple Network Management Protocol (SNMP) Capabilities

Data Type: Integer	
Possible Data Values	Meaning of Data Value
none(0)	The remote access hardware has no out-of-band SNMP capabilities.
unknownCapabilities(1)	The remote access hardware out-of-band SNMP capabilities are unknown.
<pre>oobSNMPAgentCapable(2)</pre>	The remote access hardware has an out-of-band SNMP agent.
oobSNMPTrapsCapable(4)	The remote access hardware can send out-of-band SNMP traps.

Variable Name: DellRemoteAccessOutOfBandSNMPCapabilities

#### Table 19-11. Remote Access Out-Of-Band Simple Network Management Protocol (SNMP) Settings

Variable Name: DellRemoteAccessOutOfBandSNMPSettings		
Data Type: Integer		
Possible Data Values	Meaning of Data Value	
none(0)	The remote access hardware has no out-of-band SNMP settings.	
unknown(1)	The remote access hardware out-of-band SNMP settings are unknown.	
oobSNMPAgentEnabled(2)	The remote access hardware out-of-band SNMP agent is enabled.	
oobSNMPTrapsEnabled(4)	The remote access hardware will send out-of-band SNMP traps.	

#### Table 19-12. Remote User Admin State Capabilities

Variable Name: DellRemoteUserAdminStateCapabilities

Possible Data Values	Meaning of Data Value	
none(0)	The admin user has no state capabilities.	
unknownCapabilities(1)	The admin user state capabilities are unknown.	
enableCapable(2)	The admin user can be disabled or enabled.	
notReadyCapable(4)	The admin user can be in the "not ready" state.	
numericPagerCapable(8)	The admin user supports numeric paging.	
alphaPagerCapable(16)	The admin user supports alphanumeric paging.	
emailCapable(32)	The admin user supports e-mail.	
privilegeCapable(64)	The admin user supports user privileges configuration.	

#### Table 19-13. Remote User Admin State Settings

#### Variable Name: DellRemoteUserAdminStateSettings

#### Data Type: Integer

Possible Data Values	Meaning of Data Value	
none(0)	The admin user has no state settings.	
unknown(1)	The admin user state settings are unknown.	
enabled(2)	The admin user is enabled.	
notReady(4)	The admin user is in the "not ready" state.	
numericPagerEnabled(8)	Numeric paging is enabled for the admin user.	
alphaPagerEnabled(16)	Alphanumeric paging is enabled for the admin user.	
emailEnabled(32)	E-mail is enabled for the admin user.	

#### Table 19-14. Remote User Admin Control Capabilities

## Variable Name: DellRemoteUserAdminControlCapabilities

#### Data Type: Integer

Possible Data Values	Meaning of Data Value	
none(0)	The admin user has no control capabilities.	
unknownCapabilities(1)	The admin user control capabilities are unknown.	
<pre>numericPagerTestCapable(2)</pre>	) The admin user can support sending a test numeric page.	
alphaPagerTestCapable(4)	The admin user can support sending a test alphanumeric page.	
<pre>emailTestCapable(8)</pre>	The admin user can support sending a test e-mail.	

#### Table 19-15. Remote User Admin Control Settings

Variable Name: DellRemoteUserAdminControlSettings
---

Possible Data Values	Meaning of Data Value	
none(0)	The admin user has no control settings.	
unknown(1)	The admin user control settings are unknown.	
numericPagerTest(2)	A numeric pager test will be performed for the admin user.	
alphaPagerTest(4)	An alphanumeric pager test will be performed for the admin user.	
emailTest(8)	An e-mail test will be performed for the admin user.	

#### Table 19-16. Remote User Admin Alpha Protocol Type

Data Type: IntegerPossible Data ValuesMeaning of Data Valueother (1)The remote user admin alpha protocol type is not one of the following:unknown (2)The remote user admin alpha protocol type is unknown.alpha7E0 (3)The remote user admin alpha protocol type is 7E0.alpha8N1 (4)The remote user admin alpha protocol type is 8N1.

Variable Name: DellRemoteUserAdminAlphaProtocolType

#### Table 19-17. Remote User Admin Alpha Baud Type

Variable Name: DellRemoteUserAdminAlphaBaudType		
Data Type: Integer		
Possible Data Values Meaning of Data Value		
other(1)	The remote user alphanumeric baud rate is not one of the following:	
unknown(2)	The remote user alphanumeric baud rate is unknown.	
alphaBaud300(3)	The remote user alphanumeric baud rate is 300.	
alphaBaud1200(4)	The remote user alphanumeric baud rate is 1200.	

#### Table 19-18. Remote SNMP Trap State Capabilities

Variable Name: DellRemoteSNMPTrapStateCapabilities

Possible Data Values	Meaning of Data Value	
none(0)	The SNMP trap destination has no state capabilities.	
unknownCapabilities(1)	The SNMP trap destination state capabilities are unknown.	
enableCapable(2)	The SNMP trap destination can be disabled or enabled.	
notReadyCapable(4)	The SNMP trap destination can be in the "not ready" state.	

#### Table 19-19. Remote SNMP Trap State Settings

Variable Name: DellRemoteSNMPTrapStateSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value	
none(0)	The SNMP trap destination has no state settings.	
unknown(1)	The SNMP trap destination state settings are unknown.	
enabled(2)	The SNMP trap destination is enabled.	
notReady(4)	The SNMP trap destination is in the "not ready" state.	

Variable Name: DellRemoteSNMPTrapControlCapabilities		
Data Type: Integer		
Possible Data Values Meaning of Data Value		
none(0)	The SNMP trap destination has no control capabilities.	
unknownCapabilities(1)	The SNMP trap destination control capabilities are unknown.	
<pre>trapTestCapable(2)</pre>	A SNMP trap test can be performed for the SNMP trap destination.	

#### Table 19-21. Remote SNMP Trap Control Settings

Variable Name: DellRemoteSNMPTrapControlSettings		
Data Type: Integer		
Possible Data Values Meaning of Data Value		
none(0)	The SNMP trap destination has no control settings.	
unknown(1)	The SNMP trap destination control settings are unknown.	
<pre>trapTestCapable(2)</pre>	A SNMP trap test will be performed for the SNMP trap destination.	

#### Table 19-22. Remote Dial-Up State Capabilities

Variable Name: DellRemoteDialUpStateCapabilities

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The dial-up functionality has no state capabilities.
unknownCapabilities(1)	The dial-up functionality state capabilities are unknown.
enableCapable(2)	The dial-up functionality can be disabled or enabled.
notReadyCapable(4)	The dial-up functionality can be in the "not ready" state.
dialInCapable(8)	The dial-up functionality can support the dial-in feature.
dialOutCapable(16)	The dial-up functionality can support the dial-out feature.
dialInDHCPCapable(32)	The dial-up functionality can support using DHCP to obtain an IP address for the dial-in feature.
dialInAuthAnyCapable(64)	The dial-up functionality can support any authentication type (including clear text) for the dial-in feature.
dialInAuthEncryptedCapable(128)	The dial-up functionality can support encrypted passwords (CHAP) authentication for the dial-in feature.
dialInAuthMschapCapable(256)	The dial-up functionality can support MSCHAP authentication type for the dial-in feature.

#### Table 19-23. Remote Dial-Up State Settings

Variable Name: DellRemoteDialUpStateSettings

Possible Data Values	Meaning of Data Value
none(0)	The dial-up functionality has no state settings.
unknown(1)	The dial-up functionality state settings are unknown.
enabled(2)	The dial-up functionality is enabled.
notReadyCapable(4)	The dial-up functionality is in the "not ready" state.
dialInEnabled(8)	The dial-up functionality dial-in feature is enabled.
dialOutEnabled(16)	The dial-up functionality dial-out feature is enabled.

#### Table 19-23. Remote Dial-Up State Settings (continued)

Variable Name: DellRemoteDialUpStateSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
dialInDHCPEnabled(32)	The dial-up functionality uses DHCP to obtain an IP address for the dial-in feature.
dialInAuthAnyEnabled(64)	The dial-up functionality accepts any authentication type (including clear text) for the dial-in feature.
dialInAuthEncryptedEnabled(128)	The dial-up functionality uses only encrypted passwords (CHAP) authentication type for the dial-in feature.
dialInAuthMschapEnabled(256)	The dial-up functionality uses only MSCHAP authentication type for the dial-in feature.

#### Table 19-24. Remote Dial-Up Modem Dial Type

Variable Name: DellRemoteDialUpModemDialType

Data Type: Integer

Possible Data Values	Meaning of Data Value
remoteDialUpIsOther(1)	The remote dial type is not one of the following:
remoteDialUpIsUnknown(2)	The remote dial type is unknown.
remoteDialUpIsTone(3)	The remote dial type is tone.
remoteDialUpIsPulse(4)	The remote dial type is pulse.

#### Table 19-25. Remote User Dial-In State Capabilities

Variable Name: DellRemoteUserDialInStateCapabilities

Possible Data Values	Meaning of Data Value
none(0)	The dial-in user has no state capabilities.
unknownCapabilities(1)	The dial-in user state capabilities are unknown.
enableCapable(2)	The dial-in user can be disabled or enabled.
notReadyCapable(4)	The dial-in user can be in the "not ready" state.
dialInCallbackPresetNumberCapable(8)	The dial-in user can support callback using a preset number.
dialInCallbackUserSpecifiedCapable(16)	The dial-in user can support callback using a user-specified number.

#### Table 19-26. Remote User Dial-In State Settings

#### Variable Name: DellRemoteUserDialInStateSettings

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	The dial-in user has no state settings.
unknown(1)	The dial-in user state settings are unknown.
enabled(2)	The dial-in user is enabled.
notReady(4)	The dial-in user is in the "not ready" state.
dialInCallbackPresetNumberEnabled(8)	Callback using a preset number is enabled for the dial-in user.
dialInCallbackUserSpecifiedEnabled(16)	Callback using a user-specified number is enabled for the dial-in user.

#### Table 19-27. Remote Dial-Out State Capabilities

#### Variable Name: DellRemoteDialOutStateCapabilities

Possible Data Values	Meaning of Data Value
none(0)	The dial-out destination has no state capabilities.
unknownCapabilities(1)	The dial-out destination state capabilities are unknown.
enableCapable(2)	The dial-out destination can be disabled or enabled.
notReadyCapable(4)	The dial-out destination can be in the "not ready" state.
dialOutPPPAuthAnyCapable(8)	The dial-out destination can support any authentication type (including clear text) for PPP.
dialOutPPPAuthEncryptedCapable(16)	The dial-out destination can support encrypted passwords authentication type for PPP.
dialOutPPPAuthMschapCapable(32)	The dial-out destination can support MSCHAP authentication type for PPP.

#### Table 19-28. Remote Dial-Out State Settings

Variable Name: DellRemoteDialOutStateSettings

Possible Data Values	Meaning of Data Value
none(0)	The dial-out destination has no state settings.
unknown(1)	The dial-out destination state settings are unknown.
enabled(2)	The dial-out destination is disabled or enabled.
notReady(4)	The dial-out destination is in the "not ready" state.
dialOutPPPAuthAnyEnabled(8)	The dial-out destination accepts any authentication type (including clear text) for PPP.
dialOutPPPAuthEncryptedEnabled(16)	The dial-out destination uses only encrypted passwords authentication type for PPP.
dialOutPPPAuthMschapEnabled(32)	The dial-out destination uses only MSCHAP authentication type for PPP.

# 20

# **Cluster Group**

Clustering combines multiple systems in such a way that they provide services a single system could not. Clustering enhances higher availability, scalability, and management. Higher availability is achieved by using "failover" clusters, in which resources can automatically move between two or more systems in the event of a failure. Scalability is achieved by balancing the load of an application across several computer systems. Simpler management is achieved by using virtual servers, as opposed to managing each individual computer system.

## **Cluster Group**

The Cluster Group defines attributes such as the number of systems in the cluster, capabilities of the cluster, type of cluster, and name of the cluster.

#### **Cluster Table**

The following table defines the attributes of the cluster.

clusterTable
1.3.6.1.4.1.674.10892.1.1800.10
Defines the Cluster Table.
SEQUENCE OF ClusterTableEntry
Not accessible

#### **Cluster Table Entry**

Name	clusterTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1
Description	Defines the Cluster Table entry.
Syntax	ClusterTableEntry
Access	Not accessible
Index	clusterChassisIndex, clusterIndex

#### **Cluster Chassis Index**

Name	clusterChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.1
Description	Defines the index (one-based) of this chassis.
Syntax	DellObjectRange
Access	Read-only

#### **Cluster Index**

Name	clusterIndex
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.2
Description	Defines the index (one-based) of the cluster.
Syntax	DellObjectRange
Access	Read-only

#### **Cluster State Capabilities**

Name	clusterStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.3
Description	Defines the state capabilities of the cluster.
Syntax	DellStateCapabilities
Access	Read-only

#### **Cluster State Settings**

Name	clusterStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.4
Description	Defines the state settings of the cluster.
Syntax	DellStateSettings
Access	Read-write

#### **Cluster Status**

Name	clusterStatus
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.5
Description	Defines the status of the cluster.
Syntax	DellStatus
Access	Read-only

#### **Cluster Type**

Name	clusterType
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.6
Description	Defines the type of the cluster.
Syntax	DellClusterType
Access	Read-only

#### **Cluster Type Description Name**

Name	clusterTypeDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.7
Description	Defines the description name for the type of the cluster.
Syntax	DellString
Access	Read-only

#### **Cluster Name**

Name	clusterName
Object ID	1.3.6.1.4.1.674.10892.1.1800.10.1.8
Description	Defines the name of the cluster.
Syntax	DellString
Access	Read-only

## **Cluster Group Variable Values**

This section includes definitions for Server Administrator-specific variable values used in this section.

#### Table 20-1. Cluster Type

Variable Name: DellClusterType	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
unknown(1)	The cluster type is unknown.
highAvailabilityCluster(2)	The cluster type is a high-availability cluster.

## **Baseboard Management Controller Group**

The Baseboard Management Controller (BMC) monitors the system for critical events by communicating with various sensors on the system board and sends alerts and log events when certain parameters exceed their preset thresholds. The BMC Group provides information about the BMC that may be present in your system. In addition to providing general information about the BMC, this group provides information about the serial and local area network (LAN) interfaces of the BMC.

## **Baseboard Management Controller Group Tables**

The objects in the BMC group define information about the BMC and the serial and LAN interfaces that can be used to access the BMC remotely to perform management activities. Objects for the serial interface define the serial connection mode, flow control type and bit rate. Objects for the LAN interface define the media access control (MAC) address, internet protocol (IP) address, subnet mask and default gateway.

The following MIB tables define the BMC group:

- Baseboard Management Controller Table
- Baseboard Management Controller Serial Interface Table
- Baseboard Management Controller LAN Interface Table

#### **Baseboard Management Controller Table**

Name	bmcTable
Object ID	1.3.6.1.4.1.674.10892.1.1900.10
Description	Defines the Baseboard Management Controller Table.
Syntax	SEQUENCE OF BmcTableEntry
Access	Not accessible

#### **BMC** Table Entry

Name	bmcTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1
Description	Defines the Baseboard Management Controller (BMC) Table Entry.
Syntax	BmcTableEntry
Access	Not accessible
Index	bmcChassisIndex, bmcIndex

#### **BMC Chassis Index**

Name	bmcChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

#### **BMC** Index

Name	bmcIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.2
Description	Defines the index (one-based) of the BMC.
Syntax	DellObjectRange
Access	Read-only

#### **BMC State Capabilities**

Name	bmcStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.3
Description	Defines the state capabilities of the BMC.
Syntax	DellStateCapabilities
Access	Read-only

#### **BMC State Settings**

Name	bmcStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.4
Description	Defines the state settings of the BMC.
Syntax	DellStateSettings
Access	Read-write

#### **BMC Status**

Name	bmcStatus
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.5
Description	Defines the status of the BMC.
Syntax	DellStatus
Access	Read-only

#### **BMC** Display Name

Name	bmcDisplayName
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.6
Description	Defines the display name of the BMC.
Syntax	DellString
Access	Read-only

#### **BMC** Description Name

Name	bmcDescriptionName
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.7
Description	Defines the description of the BMC.
Syntax	DisplayString (SIZE (0255))
Access	Read-only

#### **BMC IPMI Version Name**

Name	bmcIPMIVersionName
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.8
Description	Defines the version of the Intelligent Platform Management Interface (IPMI) specification that the BMC supports.
Syntax	DellString
Access	Read-only
BMC GUID	
Name	bmcGUID
Object ID	1.3.6.1.4.1.674.10892.1.1900.10.1.9
Description	Defines the Globally Unique ID (GUID) of the BMC.
Syntax	OCTET STRING (SIZE(16))
Access	Read-only

#### **Baseboard Management Controller Serial Interface Table**

Name	bmcSerialInterfaceTable
Object ID	1.3.6.1.4.1.674.10892.1.1900.20
Description	Defines the BMC Serial Interface Table.
Syntax	SEQUENCE OF BmcSerialInterfaceTableEntry
Access	Not accessible

#### **BMC Serial Interface Table Entry**

Name	bmcSerialInterfaceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1
Description	Defines the BMC Serial Interface Table Entry.
Syntax	BmcSerialInterfaceTableEntry
Access	Not accessible
Index	bmcSerialInterfaceChassisIndex, bmcSerialInterfaceBMCIndex, bmcSerialInterfaceIndex

#### **BMC Serial Interface Chassis Index**

Name	bmcSerialInterfaceChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

#### **BMC Serial Interface BMC Index**

Name	bmcSerialInterfaceBMCIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.2
Description	Defines the index (one-based) of the associated BMC.
Syntax	DellObjectRange
Access	Read-only

#### **BMC Serial Interface Index**

Name	bmcSerialInterfaceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.3
Description	Defines the index (one-based) of the BMC serial interface.
Syntax	DellObjectRange
Access	Read-only

#### **BMC Serial Interface State Capabilities**

Name	bmcSerialInterfaceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.4
Description	Defines the state capabilities of the BMC serial interface.
Syntax	DellStateCapabilities
Access	Read-only

#### **BMC Serial Interface State Settings**

Name	bmcSerialInterfaceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.5
Description	Defines the state settings of the BMC serial interface.
Syntax	DellStateSettings
Access	Read-write

#### **BMC Serial Interface Status**

Name	bmcSerialInterfaceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.6
Description	Defines the status of the BMC serial interface.
Syntax	DellStatus
Access	Read-only

#### **BMC Serial Interface Channel Number**

Name	bmcSerialInterfaceChannelNumber
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.7
Description	Defines the BMC channel number of the BMC serial interface.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **BMC Serial Interface Connection Mode Capabilities**

Name	bmcSerialInterfaceConnectionModeCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.8
Description	Defines the connection mode capabilities of the BMC serial interface.
Syntax	DellBMCSerialConnectionModeCapabilities
Access	Read-only

#### **BMC Serial Interface Connection Mode Settings**

Name	$\verb+bmcSerialInterfaceConnectionModeSettings$
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.9
Description	Defines the connection mode settings of the BMC serial interface.
Syntax	DellBMCSerialConnectionModeSettings
Access	Read-only

#### **BMC Serial Interface Flow Control**

Name	bmcSerialInterfaceFlowControl
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.10
Description	Defines the flow control type of the BMC serial interface.
Syntax	DellBMCSerialFlowControlType
Access	Read-only

#### **BMC Serial Interface Bit Rate**

Name	bmcSerialInterfaceBitRate
Object ID	1.3.6.1.4.1.674.10892.1.1900.20.1.11
Description	Defines the bit rate of the BMC serial interface.
Syntax	DellBMCSerialBitRateType
Access	Read-only

#### Baseboard Management Controller LAN Interface Table

Name	bmcLANInterfaceTable
Object ID	1.3.6.1.4.1.674.10892.1.1900.30
Description	Defines the Baseboard Management Controller (BMC) LAN Interface Table.
Syntax	SEQUENCE OF BmcLANInterfaceTableEntry
Access	Not accessible

#### **BMC LAN Interface Table Entry**

Name	bmcLANInterfaceTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1
Description	Defines the Baseboard Management Controller (BMC) LAN Interface Table Entry.
Syntax	BmcLANInterfaceTableEntry
Access	Not accessible
Index	bmcLANInterfaceChassisIndex, bmcLANInterfaceBMCIndex, bmcLANInterfaceIndex

#### **BMC LAN Interface Chassis Index**

Name	bmcLANInterfaceChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.1
Description	Defines the index (one-based) of the associated chassis.
Syntax	DellObjectRange
Access	Read-only

#### **BMC LAN Interface BMC Index**

Name	bmcLANInterfaceBMCIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.2
Description	Defines the index (one-based) of the associated BMC.
Syntax	DellObjectRange
Access	Read-only

#### **BMC LAN Interface Index**

Name	bmcLANInterfaceIndex
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.3
Description	Defines the index (one-based) of the BMC LAN interface.
Syntax	DellObjectRange
Access	Read-only

#### **BMC LAN Interface State Capabilities**

Name	bmcLANInterfaceStateCapabilities
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.4
Description	Defines the state capabilities of the BMC LAN interface.
Syntax	DellStateCapabilities
Access	Read-only

#### **BMC LAN Interface State Settings**

Name	bmcLANInterfaceStateSettings
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.5
Description	Defines the state settings of the BMC LAN interface.
Syntax	DellStateSettings
Access	Read-write

#### **BMC LAN Interface Status**

Name	bmcLANInterfaceStatus
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.6
Description	Defines the status of the BMC LAN interface.
Syntax	DellStatus
Access	Read-only

#### **BMC LAN Interface Channel Number**

Name	bmcLANInterfaceChannelNumber
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.7
Description	Defines the BMC channel number of the BMC LAN interface.
Syntax	DellUnsigned8BitRange
Access	Read-only

#### **BMC LAN Interface IP Address Source**

Name	bmcLANInterfaceIPAddressSource
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.8
Description	Defines the source type of the IP address of the BMC LAN interface.
Syntax	DellBMCLANIPAddressSourceType
Access	Read-only

#### **BMC LAN Interface IP Address**

Name	bmcLANInterfaceIPAddress
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.9
Description	Defines the IP address of the BMC LAN interface.
Syntax	IpAddress
Access	Read-only

#### **BMC LAN Interface Subnet Mask Address**

Name	bmcLANInterfaceSubnetMaskAddress
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.10
Description	Defines the subnet mask of the BMC LAN interface.
Syntax	IpAddress
Access	Read-only

#### **BMC LAN Interface Default Gateway Address**

Name	bmcLANInterfaceDefaultGatewayAddress
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.11
Description	Defines the IP address of the default gateway for the BMC LAN interface.
Syntax	IpAddress
Access	Read-only

#### **BMC LAN Interface MAC Address**

Name	bmcLANInterfaceMACAddress
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.12
Description	Defines the MAC address of the BMC LAN interface.
Syntax	DellMACAddress
Access	Read-only

#### **BMC LAN Interface Alert Community Name**

Name	bmcLANInterfaceAlertCommunityName
Object ID	1.3.6.1.4.1.674.10892.1.1900.30.1.13
Description	Defines the SNMP community used for BMC LAN alerts (traps) sent on the BMC LAN interface.
Syntax	DisplayString (SIZE (032))
Access	Read-only

### **Baseboard Management Controller Group Variable Values**

This section includes definitions for server administrator-specific variable values used in this section.

Data Type: Integer These values are bit masks; therefore, combination values are possible.

Possible Data Values	Meaning of Data Value
none(0)	No mode capabilities.
modemBasic(1)	BMC serial interface supports Modem Basic mode.
modemPPP(2)	BMC serial interface supports Modem Point to Point Protocol (PPP) mode.
modemTerminal(4)	BMC serial interface supports Modem Terminal mode.
directBasic(8)	BMC serial interface supports Direct Basic mode.
directPPP(16)	BMC serial interface supports Direct PPP mode.
directTerminal(32)	BMC serial interface supports Direct Terminal mode.

#### Table 21-2. BMC Serial Connection Mode Settings

Variable Name: DellBMCSerialConnectionModeSettings

#### Data Type: Integer

These values are bit masks; therefore, combination values are possible.

Possible Data Values	Meaning of Data Value
none(0)	No modes enabled.
modemBasic(1)	Modem Basic mode is enabled.
modemPPP(2)	Modem PPP mode is enabled.
modemTerminal(4)	Modem Terminal mode is enabled.
directBasic(8)	Direct Basic mode is enabled.
directPPP(16)	Direct PPP mode is enabled.
directTerminal(32)	Direct Terminal mode is enabled.

#### Table 21-3. BMC Serial Flow Control Type

Variable Name: DellBMCSerialFlowControlType

Data Type: Integer

Possible Data Values	Meaning of Data Value
none(0)	No flow control used.
rtscts(1)	RTS/CTS (hardware) flow control used.
<pre>xonXoff(2)</pre>	XON/XOFF flow control used.

#### Table 21-4. BMC Serial Bit Rate Type

Variable Name: DellBMCSerialBitRateType

Possible Data Values	Meaning of Data Value
bps9600(6)	Bit rate is 9600 bps (bits per second)
bps19200(7)	Bit rate is 19200 bps
bps38400(8)	Bit rate is 38400 bps
bps57600(9)	Bit rate is 57600 bps
bps115200(10)	Bit rate is 115200 bps

#### Table 21-5. BMC LAN IP Address Source Type

#### Variable Name: DellBMCLANIPAddressSourceType

Possible Data Values	Meaning of Data Value
unspecified(0)	Source is unspecified.
static(1)	IP address is static.
dhcp(2)	Dynamic Host Configuration Protocol (DHCP) used to obtain IP address.
<pre>biosOrSystemSoftware(3)</pre>	BIOS or system software provided IP Address.
other(4)	Other protocol used to obtain IP address.



# **Field Replaceable Unit Group**

A field replaceable unit (FRU) is a part that can be removed and replaced without having to send the system to a repair facility. The Field Replaceable Unit Group provides information about the field replaceable units that may be present in your system.

## Field Replaceable Unit Group Tables

The objects in the FRU group define information such as manufacturer, serial number, part number and revision for field replaceable units. The following MIB tables define the FRU group.

#### **Field Replaceable Unit Table**

Name	fruTable
Object ID	1.3.6.1.4.1.674.10892.1.2000.10
Description	Defines the Field Replaceable Unit table.
Syntax	SEQUENCE OF FruTableEntry
Access	Not accessible

#### **FRU Table Entry**

Name	fruTableEntry
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1
Description	Defines the FRU Table Entry.
Syntax	FruTableEntry
Access	Not accessible
Index	fruChassisIndex, fruIndex

#### **FRU Chassis Index**

Name	fruChassisIndex
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.1
Description	Defines the index (one-based) of the chassis containing the FRU.
Syntax	DellObjectRange
Access	Read-only
FRU Index	
Name	fruIndex
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.2
Description	Defines the index (one-based) of the FRU.
Syntax	DellObjectRange

#### **FRU Information Status**

Access

Name	fruInformationStatus
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.3
Description	Defines the status of the FRU table entry.
Syntax	DellStatus
Access	Read-only

Read-only

#### **FRU Information State**

Name	fruInformationState
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.4
Description	Defines the state of the FRU information. Some information for the FRU may not be available if the state is other than $ok(1)$ .
Syntax	DellFRUInformationState
Access	Read-only

#### **FRU Device Name**

Name	fruDeviceName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.5
Description	Defines the device name of the FRU.
Syntax	DisplayString (SIZE (064))
Access	Read-only

#### FRU Manufacturer Name

Name	fruManufacturerName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.6
Description	Defines the manufacturer of the FRU.
Syntax	DisplayString (SIZE (064))
Access	Read-only

#### **FRU Serial Number Name**

Name	fruSerialNumberName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.7
Description	Defines the serial number of the FRU.
Syntax	DisplayString (SIZE (064))
Access	Read-only

#### **FRU Part Number Name**

Name	fruPartNumberName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.8
Description	Defines the part number of the FRU
Syntax	DisplayString (SIZE (064))
Access	Read-only

#### **FRU Revision Name**

Name	fruRevisionName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.9
Description	Defines the revision of the FRU.
Syntax	DisplayString (SIZE (064))
Access	Read-only

#### FRU Manufacturing Date Name

Name	fruManufacturingDateName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.10
Description	Defines the manufacturing date of the FRU.
Syntax	DellDateName
Access	Read-only

#### FRU Asset Tag Name

Name	fruAssetTagName
Object ID	1.3.6.1.4.1.674.10892.1.2000.10.1.11
Description	Defines the asset tag of the FRU.
Syntax	DisplayString (SIZE (064))
Access	Read-only

## **FRU Group Variable Values**

This section includes definitions for server administrator-specific variable values.

Table 22-1.	FRU	Information	State
		monution	ouno

Variable Name: DellFRUInformationState	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
ok(1)	FRU information is OK.
notSupported(2)	FRU information is not supported.
notAvailable(3)	FRU information is not available.
checksumInvalid(4)	FRU information checksum is invalid.
corrupted(5)	FRU information is corrupted.

# 23

## **Storage Management Group**

The Storage Management Group is composed of the following:

- Storage Management Group—information about the software product and system status.
- Storage Management Information Group—properties about the Simple Network Management Protocol (SNMP) agent.
- Global Data Group—system status.
- Physical Devices Group—physical devices managed by the software.
- Logical Devices Group—logical devices managed by the software.
- Storage Management Event Group—SNMP traps.

## Storage Management Group

The Storage Management Information Base (MIB) Group defines the properties that identify information about the Storage Management software product and the current status of the system it manages.

#### **Software Version**

Name	softwareVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.1
Description	Identifies the version number of the storage management component of the systems management software.
Syntax	DisplayString
Access	Read-only

#### **Global Status**

Name	globalStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.2
Description	Identifies global health for the subsystem managed by the Storage Management software. This global status is customized for HP OpenView. Other applications should refer to the agentSystemGlobalStatus entry in the globalData object group. Possible values:
	1: Critical
	2: Warning
	3: Normal
	4: Unknown
Syntax	Integer
Access	Read-only

#### Software Manufacturer

Name	softwareManufacturer
Object ID	1.3.6.1.4.1.674.10893.1.20.3
Description	Identifies the manufacturer of the Storage Management software.
Syntax	DisplayString
Access	Read-only

#### **Software Product**

Name	softwareProduct
Object ID	1.3.6.1.4.1.674.10893.1.20.4
Description	Identifies product information for the Storage Management software.
Syntax	DisplayString
Access	Read-only

#### **Software Description**

Name	softwareDescription
Object ID	1.3.6.1.4.1.674.10893.1.20.5
Description	Identifies the product description for the Storage Management software.
Syntax	DisplayString
Access	Read-only

## **Storage Management Information Group**

The Storage Management Information MIB Group defines the properties that identify the Storage Management software SNMP agent.

#### **Display Name**

Name	displayName
Object ID	1.3.6.1.4.1.674.10893.1.20.100.1
Description	Identifies the name of this management software for display purposes.
Syntax	DisplayString
Access	Read-only
Description	
Name	description
Object ID	1.3.6.1.4.1.674.10893.1.20.100.2
Description	Provides a short description of this management software.
Syntax	DisplayString
Access	Read-only
Agent Vendor	
Name	agentVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.100.3
Description	Identifies the name of the management software manufacturer.
Syntax	DisplayString
Access	Read-only
Agent Version	
Name	agentVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.100.4
Description	This entry is obsolete. Refer to software Version.
Syntax	DisplayString
Access	Read-only

## **Global Data Group**

The Global Data Management Information Base (MIB) Group defines the properties that identify status information about the system that the Storage Management software is managing and about the Storage Management SNMP agent.

#### **Agent System Global Status**

Name	agentSystemGlobalStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.110.1
Description	This entry is obsolete. Use the value agentGlobalSystemStatus.
Syntax	Integer
Access	Read-only

#### **Agent Last Global Status**

Name	agentLastGlobalStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.110.2
Description	This entry is obsolete. Use the value agentLastGlobalSystemStatus.
Syntax	Integer
Access	Read-only

#### **Agent Time Stamp**

Name	agentTimeStamp
Object ID	1.3.6.1.4.1.674.10893.1.20.110.3
Description	Identifies the last time that the agent values have been updated. Universal time in sec since UTC $1/1/70$ .
Syntax	Integer
Access	Read-only

#### Agent Get Timeout

Name	agentGetTimeout
Object ID	1.3.6.1.4.1.674.10893.1.20.110.4
Description	Indicates the suggested timeout value in milliseconds for how long the SNMP getter should wait while attempting to poll the SNMP agent.
Syntax	Integer
Access	Read-only

#### **Agent Modifiers**

Name	agentModifiers
Object ID	1.3.6.1.4.1.674.10893.1.20.110.5
Description	Identifies the agent functional modifiers. When set, the modifier is active. Bit definitions:
	Bit 3: agent in debug mode.
	All other bits are product specific.
Syntax	Integer
Access	Read-only

#### **Agent Refresh Rate**

Name	agentRefreshRate
Object ID	1.3.6.1.4.1.674.10893.1.20.110.6
Description	Identifies the rate, given in seconds, at which the cached data for SNMP is refreshed. The default value is 300 seconds, or 5 minutes.
Syntax	Integer
Access	Read-only

#### Agent Hostname

Name	agentHostname
Object ID	1.3.6.1.4.1.674.10893.1.20.110.7
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Agent IP Address**

Name	agentIPAddress
Object ID	1.3.6.1.4.1.674.10893.1.20.110.8
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

#### Agent Software Status

Name	agentSoftwareStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.110.9
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Agent SNMP Version**

Name	agentSnmpVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.110.10
Description	This entry is obsolete. Refer to 0001 softwareVersion.
Syntax	DisplayString
Access	Read-only

#### **Agent MIB Version**

Name	agentMibVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.110.11
Description	Identifies the version of the Storage Management MIB.
Syntax	DisplayString
Access	Read-only

#### Agent Management Software URL Name

Name	agentManagementSoftwareURLName
Object ID	1.3.6.1.4.1.674.10893.1.20.110.12
Description	Identifies the Universal Resource Locator (URL) of the systems management software.
Syntax	DisplayString
Access	Read-only

#### Agent Global System Status

Name	agentGlobalSystemStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.110.13
Description	<ul> <li>Global health information for the subsystem managed by the Storage Management software. This global status should be used by applications other than HP OpenView. HP OpenView should refer to the globalStatus in the root level object group. This is a rollup for the entire agent including any monitored devices. The status is intended to give initiative to an SNMP monitor to get further data when this status is abnormal. Possible values:</li> <li>1: Other</li> <li>2: Unknown</li> <li>3: OK</li> <li>4: Non-critical</li> <li>5: Critical</li> </ul>
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

#### Agent Last Global System Status

Name	agentLastGlobalSystemStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.110.14
Description	The previous global status of the system managed by the Storage Management software. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

#### **Agent Smart Thermal Shutdown**

Name	agentSmartThermalShutdown
Object ID	1.3.6.1.4.1.674.10893.1.20.110.15
Description	Indicates the status of smart thermal shutdown for PV220S and PV221S enclosures.
	Possible values:
	l: Enabled
	2: Disabled
	3: Not applicable
Syntax	Integer
Access	Read-only

# **Physical Devices Group**

The Physical Devices MIB group provides information about the devices managed by the Storage Management software and their relationships to each other. The following MIB tables define objects and relationships (connections) among the objects.

- Controller Table—describes available properties for each controller on the managed system.
- Channel Table—describes available properties for each channel on the managed system.
- Enclosure Table—describes available properties for each enclosure on the managed system.
- Array Disk Table—describes available properties for each physical array disk on the managed system.
- Array Disk Enclosure Connection Table—describes the connections between Fibre Channel array disks, their enclosure, and their associated controller. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.
- Array Disk Channel Connection Table—describes the connections between SCSI array disks, their channel, and their associated controller. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.
- Fan Table—describes available properties for each fan on the managed system.
- Fan Connection Table—describes the connection between each fan on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the Enclosure Table.
- **Power Supply Table**—describes available properties for each power supply on the managed system.
- Power Supply Connection Table—describes the connection between each power supply on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the Enclosure Table.
- **Temperature Probe Table**—describes available properties for each temperature probe on the managed system.
- **Temperature Probe Connection Table**—describes the connection between each temperature probe on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the Enclosure Table.
- **EMM Table**—describes available properties for each Enclosure Management Module (EMM) on the managed system.
- EMM Connection Table—describes the connection between each EMM on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the Enclosure Table.
- Battery Table—describes available properties for each controller battery on the managed system.
- Battery Connection Table—describes the connection between each battery on the managed system and its controller. Each controller "number" in the table corresponds to that controller instance in the Controller Table.

# **Controller Table**

Description

Syntax Access

470

Integer

Storage Management Group

Read-only

This table describes available properties for each controller on the managed system. The following object sets up the Controller Table.

Name	controllerTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1
Description	Defines the controller table, which is a table of managed Redundant Array of Independent disks (RAID) controllers. The number of entries is related to the number of RAID controllers discovered in the system.
Syntax	SEQUENCE OF ControllerEntry
Access	Not accessible
Controller Entry	
Name	controllerEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1
Description	Defines the controller table entry, which is an entry in the table of RAID controllers. A row in this table cannot be created or deleted by SNMP operations on columns of the table.
Syntax	ControllerEntry
Access	Not accessible
Index	controllerNumber
Controller Numbe	r
Name	controllerNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.1

Identifies the instance number of the controller entry.

## **Controller Name**

Name	controllerName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.2
Description	Identifies the name of the controller in this subsystem as represented in Storage Management. Includes the controller type and instance. For example: PERC 3/QC 1.
Syntax	DisplayString
Access	Read-only

# **Controller Vendor**

Name	controllerVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.3
Description	Identifies the controller's (re)seller's name.
Syntax	DisplayString
Access	Read-only

## **Controller Type**

Name	controllerType
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.4
Description	Identifies the type of this controller:
	1: SCSI
	2: PV660F
	3: PV662F
	4: Integrated/Intelligent Drive Electronics (IDE)
	5: Serial Advanced Technology Architecture (SATA)
	6: Serial Attached SCSI (SAS)
Syntax	Integer
Access	Read-only

#### **Controller State**

Name	controllerState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.5
Description	Identifies the status of the controller's subsystem (which includes any devices connected to it). Possible states:
	0: Unknown
	1: Ready
	2: Failed
	3: Online
	4: Offline
	6: Degraded
Syntax	Integer
Access	Read-only

#### **Controller Severity**

Name	controllerSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.6
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

# **Controller Rebuild Rate in Percent**

Name	controllerRebuildRateInPercent
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.7
Description	Identifies the percent of the compute cycles dedicated to rebuilding failed array disks.
Syntax	Integer
Access	Read-only

#### **Controller Firmware Version**

Name	controllerFWVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.8
Description	Identifies the controller's current firmware version.
Syntax	DisplayString
Access	Read-only

#### **Controller Cache Size in Megabytes**

Name	controllerCacheSizeInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.9
Description	Identifies the controller's current amount of cache memory in megabytes. If this size is 0, it is less than a megabyte.
Syntax	Integer
Access	Read-only

# **Controller Cache Size in Bytes**

Name	controllerCacheSizeInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.10
Description	Identifies the controller's current amount of cache memory that is less than a megabyte. This combined with the controllerCacheSizeInMB will be the total amount of memory.
Syntax	Integer
Access	Read-only

## **Controller Physical Device Count**

Name	controllerPhysicalDeviceCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.11
Description	Identifies the number of physical devices on the controller channel including both disks and the controller.
Syntax	Integer
Access	Read-only

## **Controller Logical Device Count**

Name	controllerLogicalDeviceCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.12
Description	Identifies the number of virtual disks on the controller.
Syntax	Integer
Access	Read-only

# **Controller Partner Status**

Name	controllerPartnerStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.13
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

## **Controller Host Port Count**

Name	controllerHostPortCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.14
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

#### **Controller Memory Size in Megabytes**

Name	controllerMemorySizeInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.15
Description	Identifies the size of memory in megabytes on the controller. If this size is 0, it is less than a megabyte.
Syntax	Integer
Access	Read-only

## **Controller Memory Size in Bytes**

Name	controllerMemorySizeInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.16
Description	Identifies the size of memory on the controller that is less than a megabyte. This combined with the controllerMemorySizeInMB will be the total size of the memory.
Syntax	Integer
Access	Read-only

#### **Controller Drive Channel Count**

Name	controllerDriveChannelCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.17
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

#### **Controller Fault Tolerant**

Name	controllerFaultTolerant
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.18
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

#### Controller CO Port 0 World Wide Name

Name	controllerC0Port0WWN
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.19
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Controller CO Port 0 Name**

Name	controllerC0Port0Name
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.20
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Controller CO Port 0 ID**

Name	controllerC0Port0ID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.21
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## **Controller CO Target**

Name	controllerC0Target
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.22
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

# **Controller CO Channel**

Name	controllerC0Channel
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.23
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## Controller CO Operating System Controller

Name	controllerC0OSController
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.24
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

# **Controller CO Battery State**

Name	controllerC0BatteryState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.25
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

#### **Controller C1 Port 0 World Wide Name**

Name	controllerC1Port0WWN
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.26
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

# **Controller C1 Port 0 Name**

Name	controllerC1Port0Name
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.27
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Controller C1 Port 0 ID**

Name	controllerC1Port0ID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.28
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## **Controller C1 Target**

Name	controllerC1Target
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.29
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## **Controller C1 Channel**

Name	controllerC1Channel
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.30
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## Controller C1 Operating System Controller

Name	controllerC10SController
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.31
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Controller Battery State C1**

Name	controllerC1BatteryState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.32
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

#### **Controller Node World Wide Name**

Name	controllerNodeWWN
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.33
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Controller C0 Port 1 World Wide Name**

Name	controllerC0Port1WWN
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.34
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Controller C1 Port 1 World Wide Name**

Name	controllerC1Port1WWN
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.35
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Controller Battery Charge Count**

Name	controllerBatteryChargeCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.36
Description	This entry is obsolete. Fibre channel is not supported in Storage Management.
Syntax	Integer
Access	Read-only

## **Controller Roll-Up Status**

Name	controllerRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.37
<b>Description</b> Indicates severity of the controller state. This is the combined status of controller and its components. Possible values:	
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Controller Component Status**

Name	controllerComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.38
<b>Description</b> Indicates the status of the controller itself without the propagatic contained component status. Possible values:	
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Controller Nexus ID**

Name	controllerNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.39
Description	Durable unique ID for this controller.
Syntax	DisplayString
Access	Read-only

## **Controller Alarm State**

Name	controllerAlarmState	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.40	
Description	Indicates state, or setting for the controller's alarm. Possible values:	
	1: Enabled	
	2: Disabled	
	3: Not Applicable	
Syntax	Integer	
Access	Read-only	

#### **Controller Driver Version**

Name	controllerDriverVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.41
Description	Indicates currently installed driver version of the controller
Syntax	DisplayString
Access	Read-only

#### **Controller PCI Slot**

Name	controllerPCISlot
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.42
Description	Indicates the PCI slot number or embedded number for controllers on the motherboard
Syntax	octet string
Access	Read-only

#### **Controller Cluster Mode**

Name	controllerClusterMode
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.43
Description	Identifies if the controller is in cluster mode.
	Possible values:
	1: Enabled
	2: Disabled
	3: Active (enabled and active)
	99: Not Applicable
Syntax	Integer
Access	Read-only

#### **Controller Minimum Firmware Version**

Name	controllerMinFWVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.44
Description	The minimum firmware version for Storage Management to support the controller.
Syntax	DisplayString
Access	Read-only

#### **Controller Minimum Driver Version**

Name	controllerMinDriverVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.45
Description	The minimum driver version for Storage Management to support the controller.
Syntax	DisplayString
Access	Read-write

# **Controller SCSI Initiator ID**

Name	controllerSCSIInitiatorID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.46
Description	The SCSI ID of the initiator.
Syntax	Integer
Access	Read-only

## **Controller Channel Count**

Name	controllerChannelCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.47
Description	The number of channels on the controller.
Syntax	Integer
Access	Read-only

# **Controller Reconstruct Rate**

Name	controllerReconstructRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.48
Description	The rate for reconstruct on the controller.
Syntax	Integer
Access	Read-write

# **Controller Patrol Read Rate**

Name	controllerPatrolReadRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.49
Description	The rate for patrol read on the controller.
Syntax	Integer
Access	Read-only

# **Controller BGI Rate**

Name	controllerBGIRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.50
Description	The rate for background initialization on the controller.
Syntax	Integer
Access	Read-only

## **Controller Check Consistency Rate**

Name	controllerCheckConsistencyRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.51
Description	The rate for check consistency on the controller.
Syntax	Integer
Access	Read-only

# **Controller Patrol Read Mode**

Name	controllerPatrolReadMode
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.52
Description	Identifies the patrol read mode.
	Possible values:
	l: Automatic (enabled)
	2: Manual (enabled)
	3: Disabled
Syntax	Integer
Access	Read-only

#### **Controller Patrol Read State**

Name	controllerPatrolReadState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.53
Description	The state of the patrol read.
	Possible values:
	1: Stopped - not running
	2: Ready - ready to start
	4: Active - is running
	8: Aborted - has aborted
Syntax	Integer
Access	Read-only

#### **Controller Patrol Read Iterations**

Name	controllerPatrolReadIterations
Object ID	1.3.6.1.4.1.674.10893.1.20.130.1.1.54
Description	The number of times Patrol Read has been run on this controller.
Syntax	Integer
Access	Read-only

# **Channel Table**

This table describes available properties for each channel on the managed system. The following object sets up the Channel Table.

Name	channelTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2
Description	Defines the channel table.
Syntax	SEQUENCE OF ChannelEntry
Access	Not accessible

#### **Channel Entry**

Name	channelEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1
Description	Defines the channel table entry.
Syntax	ChannelEntry
Access	Not accessible
Index:	channelNumber

#### **Channel Number**

Name	channelNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.1
Description	Identifies the instance number of the channel entry.
Syntax	Integer
Access	Read-only

#### **Channel Name**

Name	channelName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.2
Description	Identifies the name of the channel as represented in Storage Management. The name will include the word channel and the instance. For example: Channel 1.
Syntax	DisplayString
Access	Read-only
Channel State	
Name	channelState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.3
Description	Identifies the current state of this channel. Possible states:
	0: Unknown
	1: Ready - The I/O has resumed.
	2: Failed
	3: Online
	4: Offline - The I/O has paused.
	6: Degraded
Syntax	Integer
Access	Read-only
Channel Severity	
Name	channelSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.4
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.

Syntax Integer

Access Read-only

## **Channel Termination**

Name	channelTermination
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.5
Description	Identifies the type of SCSI termination on this channel. Termination is required for proper operation of this channel. Possible values:
	1: Wide Termination (16 bit)
	2: Narrow Termination (8 bit)
	3: Not Terminated
Syntax	Integer
Access	Read-only

#### **Channel SCSI ID**

Name	channelSCSIID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.6
Description	Identifies the SCSI ID of the controller to which the channel belongs.
Syntax	Integer
Access	Read-only

# **Channel Roll-Up Status**

Name	channelRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.7
Description	Identifies the severity of the channel state. This is the combined status of the channel and its components. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Channel Component Status**

Name	channelComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.8
Description	The status of the channel itself without the propagation of any contained component status. Possible values:
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Channel Nexus ID**

Name	channelNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.9
Description	Durable unique ID for this channel.
Syntax	DisplayString
Access	Read-only

# **Channel Data Rate**

Name	channelDataRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.10
Description	Identifies the data rate of this channel.
Syntax	DisplayString
Access	Read-only

## **Channel Bus Type**

Name	channelBusType
Object ID	1.3.6.1.4.1.674.10893.1.20.130.2.1.11
Description	The bus type of the channel. Possible values:
	1: SCSI
	2: IDE
	3: Fibre Channel
	4: Serial Storage Architecture (SSA)
	6: Universal Serial Bus (USB)
	7: SATA
	8: SAS
Syntax	Integer
Access	Read-only

# **Enclosure Table**

This table describes available properties for each enclosure on the managed system. The following object sets up the Enclosure Table.

Name	enclosureTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3
Description	Defines the enclosure table.
Syntax	SEQUENCE OF EnclosureEntry
Access	Not accessible

# **Enclosure Entry**

Name	enclosureEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1
Description	Defines the enclosure table entry.
Syntax	EnclosureEntry
Access	Not accessible
Index	enclosureNumber

#### **Enclosure Number**

Name	enclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.1
Description	Identifies the instance number of the enclosure entry.
Syntax	Integer
Access	Read-only

#### **Enclosure Name**

Name	enclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.2
Description	Identifies the enclosure's name as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Enclosure Vendor**

Name	enclosureVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.3
Description	Identifies the enclosure's (re)seller's name.
Syntax	DisplayString
Access	Read-only

#### **Enclosure State**

Name	enclosureState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.4
Description	The current condition of the enclosure (which includes any devices connected to it.) Possible values:
	0: Unknown
	1: Ready
	2: Failed
	3: Online
	4: Offline
	6: Degraded
Syntax	Integer
Access	Read-only

## **Enclosure Severity**

Name	enclosureSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only
Enclosure ID	
Name	enclosureID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.6
Description	Identifies the SCSI address of the processor.
Syntax	Integer
Access	Read-only

# **Enclosure Processor Version**

Name	enclosureProcessorVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.7
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

# **Enclosure Service Tag**

Name	enclosureServiceTag
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.8
Description	The enclosure identification used when consulting customer support.
Syntax	DisplayString
Access	Read-only

## **Enclosure Asset Tag**

Name	enclosureAssetTag
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.9
Description	Customer definable asset tag for the enclosure.
Syntax	DisplayString
Access	Read-only

## **Enclosure Asset Name**

Name	enclosureAssetName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.10
Description	Customer definable asset name of the enclosure.
Syntax	DisplayString
Access	Read-only

## **Enclosure Split Bus Part Number**

Name	enclosureSplitBusPartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.11
Description	Identifies the enclosure's split bus part number.
Syntax	DisplayString
Access	Read-only

# **Enclosure Product ID**

Name	enclosureProductID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.12
Description	Identifies the enclosure's product identification. This also corresponds to the enclosure type.
Syntax	DisplayString
Access	Read-only

## **Enclosure Kernel Version**

Name	enclosureKernelVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.13
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

## Enclosure ESM1 Part Number

Name	enclosureESM1PartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.14
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

#### Enclosure ESM2 Part Number

Name	enclosureESM2PartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.15
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

## **Enclosure Type**

Name	enclosureType
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.16
Description	Indicates the type of the enclosure. Possible values:
	1: Internal
	2: Dell <sup>™</sup> PowerVault <sup>™</sup> 200S (PV201S)
	3: Dell PV210S (PV211S)
	4: Dell PV220S (PV221S)
	5: Dell PV660F
	6: Dell PV224F
	7: Dell PV660F/PV224F
	8: Dell MD1000
Syntax	DisplayString
Access	Read-only

#### **Enclosure Processor2 Version**

Name	enclosureProcessor2Version
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.17
Description	This entry is obsolete for Storage Management.
Syntax	DisplayString
Access	Read-only

#### **Enclosure Configuration**

Name	enclosureConfig
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.18
Description	Identifies the current configuration of the enclosure's backplane. Possible values:
	1: Joined
	2: Split Bus
	3: Clustered
Syntax	Integer
Access	Read-only

#### **Enclosure Channel Number**

Name	enclosureChannelNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.19
Description	Identifies the channel number, or bus, to which the enclosure is connected.
Syntax	Integer
Access	Read-only

#### **Enclosure Alarm**

Name	enclosureAlarm	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.20	
Description	Identifies the current status of the enclosure's alarm (PV220S and PV221S only.) Possible values: 1: Off	
	2: On	
Syntax	Integer	
Access	Read-only	

## **Enclosure Backplane Part Number**

Name	enclosureBackplanePartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.21
Description	Identifies the part number of the enclosure's backplane.
Syntax	Integer
Access	Read-only

#### **Enclosure SCSI ID**

Name	enclosureSCSIID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.22
Description	Identifies the SCSI ID of the controller to which this enclosure is attached.
Syntax	Integer
Access	Read-only

## **Enclosure Roll-Up Status**

Name	enclosureRollUpStatus	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.23	
Description	Identifies the severity of the enclosure state. This is the combined status of the enclosure and its components. Possible values:	
	1: Other	
	2: Unknown	
	3: OK	
	4: Non-critical	
	5: Critical	
	6: Non-recoverable	
Syntax	DellStatus	
Access	Read-only	

#### **Enclosure Component Status**

Name	enclosureComponentStatus	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.24	
Description	component status. Possible values:	
1: Other		
	2: Unknown	
	3: OK	
	4: Non-critical	
	5: Critical	
6: Non-recoverable		
Syntax	DellStatus	
Access	Read-only	

#### **Enclosure Nexus ID**

Name	enclosureNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.25
Description	Durable unique ID for this enclosure.
Syntax	Integer
Access	Read-only

## Enclosure FirmWare Version

Name	enclosureFirmwareVersion
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.26
Description	The firmware version of the enclosure.
Syntax	DisplayString
Access	Read-only

## **Enclosure SCSI Rate**

Name	enclosureSCSIRate
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.27
Description	Actual SCSI rate in the enclosure.
Syntax	Octet String
Access	Read-only

## **Enclosure Part Number**

Name	enclosurePartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.28
Description	The part number of the enclosure.
Syntax	DisplayString
Access	Read-only

# **EnclosureSerial Number**

Name	enclosureSerialNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.3.1.29
Description	Serial number of the enclosure.
Syntax	DisplayString
Access	Read-only

# **Array Disk Table**

This table describes available properties for each physical array disk on the managed system. The following object sets up the Array Disk Table.

Name	arrayDiskTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4
Description	Defines the array disk table.
Syntax	SEQUENCE OF ArrayDiskEntry
Access	Not accessible

#### **Array Disk Entry**

Name	arrayDiskEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1
Description	Defines the array disk table entry.
Syntax	ArrayDiskEntry
Access	Not accessible
Index	arrayDiskNumber

#### **Array Disk Number**

Name	arrayDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.1
Description	Identifies the instance number of the array disk entry.
Syntax	Integer
Access	Read-only

#### **Array Disk Name**

Name	arrayDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.2
Description	Identifies the name of the array disk as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Array Disk Vendor**

Name	arrayDiskVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.3
Description	The array disk's manufacturer's name.
Syntax	DisplayString
Access	Read-only

## Array Disk State

Name	arrayDiskState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.4
Description	Identifies the current state of the array disk. Possible states:
	0: Unknown
	1: Ready - Available for use, but no RAID configuration has been assigned.
	2: Failed - Not operational.
	3: Online - Operational. RAID configuration has been assigned.
	4: Offline - The drive is not available to the RAID controller.
	6: Degraded - Refers to a fault-tolerant array/virtual disk that has a failed disk.
	7: Recovering - Refers to state of recovering from bad blocks on disks.
	11: Removed - Indicates that array disk has been removed.
	15: Resynching - Indicates one of the following types of disk operations: Transform Type, Reconfiguration, and Check Consistency.
	24: Rebuild
	25: No Media - CD-ROM or removable disk has no media.
	26: Formatting - In the process of formatting.
	28: Diagnostics - Diagnostics are running.
	34: Predictive Failure
	35: Initializing: Applies only to virtual disks on PowerEdge™ RAID Controller (PERC), PERC 2/SC, and PERC 2/DC controllers.
	39: Foreign
	40: Clear
	41: Unsupported
Syntax	Integer
Access	Read-only

## Array Disk Severity

Name	arrayDiskSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

## **Array Disk Product ID**

Name	arrayDiskProductID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.6
Description	Identifies the model number of the array disk.
Syntax	DisplayString
Access	Read-only

# Array Disk Serial Number

Name	arrayDiskSerialNo
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.7
Description	Identifies the array disk's unique identification number from the manufacturer.
Syntax	DisplayString
Access	Read-only

## **Array Disk Revision**

Name	arrayDiskRevision
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.8
Description	Identifies the firmware version of the array disk.
Syntax	DisplayString
Access	Read-only

## Array Disk Enclosure ID

Name	arrayDiskEnclosureID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.9
Description	Identifies the SCSI ID of the enclosure processor to which this array disk belongs.
Syntax	DisplayString
Access	Read-only

## Array Disk Channel

Name	arrayDiskChannel
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.10
Description	Identifies the bus to which this array disk is connected.
Syntax	Integer
Access	Read-only

## Array Disk Length in Megabytes

Name	arrayDiskLengthInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.11
Description	Identifies the size in megabytes of the array disk. If this size is 0, it is smaller than a megabyte.
Syntax	Integer
Access	Read-only

## Array Disk Length in Bytes

Name	arrayDiskLengthInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.12
Description	Identifies the size of the array disk in bytes that is less than a megabyte. This size plus the arrayDiskLengthInMB is the total size of the array disk.
Syntax	Integer
Access	Read-only

#### Array Disk Largest Contiguous Free Space in Megabytes

Name	${\tt arrayDiskLargestContiguousFreeSpaceInMB}$
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.13
Description	The size in megabytes of the largest contiguous free space on the array disk. If this size is 0, it is less than a megabyte.
Syntax	Integer
Access	Read-only

#### Array Disk Largest Contiguous Free Space in Bytes

Name	arrayDiskLargestContiguousFreeSpaceInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.14
Description	The size of the largest contiguous free space on this array disk in bytes that is less than a megabyte. This size plus the arrayDiskLargestContiguousFreeSpaceInMB is the total size of the largest contiguous free space on the array disk.
Syntax	Integer
Access	Read-only

#### **Array Disk Target ID**

Name	arrayDiskTargetID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.15
Description	Identifies the SCSI target ID which this array disk is assigned.
Syntax	Integer
Access	Read-only

#### Array Disk LUN ID

Name	arrayDiskLunID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.16
Description	Identifies the array disk's logical unit number.
Syntax	Integer
Access	Read-only

#### Array Disk Used Space in Megabytes

Name	arrayDiskUsedSpaceInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.17
Description	Identifies the amount in megabytes of the used space on the array disk. If this size is 0, it is smaller than a megabyte.
Syntax	Integer
Access	Read-only

#### Array Disk Used Space in Bytes

Name	arrayDiskUsedSpaceInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.18
Description	Identifies the size in bytes of the used space on the array disk that is smaller than a megabyte. This size plus the arrayDiskUsedSpaceInMB is the total amount of used space on the array disk.
Syntax	Integer
Access	Read-only

#### Array Disk Free Space in Megabytes

Name	arrayDiskFreeSpaceInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.19
Description	Identifies the amount in megabytes of the free space on the array disk. If this size is 0, it is smaller than a megabyte.
Syntax	Integer
Access	Read-only

## Array Disk Free Space in Bytes

Name	arrayDiskFreeSpaceInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.20
Description	Identifies the size in bytes of the free space on the array disk that is smaller than a megabyte. This size plus the arrayDiskFreeSpaceInMB is the total amount of free space on the array disk.
Syntax	Integer
Access	Read-only

## Array Disk Bus Type

Name	arrayDiskBusType
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.21
Description	Identifies the bus type of the array disk. Possible values: 1: SCSI 2: IDE 3: Fibre Channel
	4: SSA 6: USB 7: SATA 8: SAS
Syntax	Integer
Access	Read-only

## Array Disk Spare State

Name	arrayDiskSpareState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.22
Description	Identifies the status of the array disk as a spare. Possible states:
	l: Disk is a member of a virtual disk
	2: Disk is a member of a disk group
	3: Disk is a global hot spare
	4: Disk is a dedicated hot spare
	5: Not a spare
	99: Not applicable
Syntax	Integer
Access	Read-only

## Array Disk Roll-Up Status

Name	arrayDiskRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.23
Description	Severity of the array disk state. This is the combined status of the array disk and its components. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Array Disk Component Status**

Name	arrayDiskComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.24
Description	The status of the array disk itself without the propagation of any contained component status. Possible values:
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## Array Disk Device Name

Name	arrayDiskDeviceName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.25
Description	Identifies the operating system device name for this disk.
Syntax	DisplayString
Access	Read-only

## Array Disk Nexus ID

Name	arrayDiskNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.26
Description	Indicates the durable unique ID for this array disk.
Syntax	DisplayString
Access	Read-only

## Array Disk Part Number

Name	arrayDiskPartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.27
Description	Indicates the part number of the disk.
Syntax	DisplayString
Access	Read-only

## **Array Disk SAS Address**

Name	arrayDiskSASAddress
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.28
Description	Indicates the specified SAS address, if this is a SAS disk.
Syntax	Octet String
Access	Read-only

## **Array Disk Negotiated Speed**

Name	arrayDiskNegotiatedSpeed
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.29
Description	Indicates the speed at which the drive is actually running in MPS (megabytes per second).
Syntax	Integer
Access	Read-only

## Array Disk Capable Speed

Name	arrayDiskCapableSpeed
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.30
Description	Indicates the maximum speed at which the drive is capable of negotiating in MPS (megabytes per second).
Syntax	Integer
Access	Read-only

# **Array Disk Smart Alert Indication**

Name	arrayDiskSmartAlertIndication
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.31
Description	Indicates whether the disk has received a predictive failure.
	Possible values:
	1: No - disk has not received a predictive failure alert
	2: Yes - disk has received a predictive failure alert
Syntax	Integer
Access	Read-only

## Array Disk Manufacture Day

Name	arrayDiskManufactureDay
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.32
Description	Indicates the day of the week (1=Sunday through 7=Saturday) on which this disk was manufactured.
Syntax	DisplayString
Access	Read-only

#### Array Disk Manufacture Week

Name	arrayDiskManufactureWeek
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.33
Description	The week (1 through 53) in which this disk was manufactured.
Syntax	DisplayString
Access	Read-only

#### Array Disk Manufacture Year

Name	arrayDiskManufactureYear
Object ID	1.3.6.1.4.1.674.10893.1.20.130.4.1.34
Description	The four digit year in which this disk was manufactured.
Syntax	DisplayString
Access	Read-only

## **Array Disk Enclosure Connection Table**

This table describes the connections among array disks, their enclosure, and their associated controller. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.

**NOTE:** Only array disks that are part of an enclosure will be listed in this table. Backplanes are considered enclosures by Storage Management.

The following object sets up the Array Disk Enclosure Connection Table.

Name	arrayDiskEnclosureConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5
Description	Defines the array disk enclosure connection table.
Syntax	SEQUENCE OF ArrayDiskEnclosureConnectionEntry
Access	Not accessible

## **Array Disk Enclosure Connection Entry**

Name	arrayDiskEnclosureConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1
Description	Defines the array disk enclosure connection table entry.
Syntax	ArrayDiskEnclosureConnectionEntry
Access	Not accessible
Index	arrayDiskEnclosureConnectionNumber

## **Array Disk Enclosure Connection Number**

Name	arrayDiskEnclosureConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.1
Description	Identifies the instance number of the array disk enclosure connection entry.
Syntax	Integer
Access	Read-only

### Array Disk Enclosure Connection Array Disk Name

Name	arrayDiskEnclosureConnectionArrayDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.2
Description	Identifies the name of the array disk in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

### Array Disk Enclosure Connection Array Disk Number

Name	arrayDiskEnclosureConnectionArrayDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.3
Description	Identifies the instance number of the array disk in the arrayDiskTable in this connection.
Syntax	Integer
Access	Read-only

### Array Disk Enclosure Connection Enclosure Name

Name	arrayDiskEnclosureConnectionEnclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.4
Description	Identifies the name of the enclosure as represented in Storage Management to which this array disk belongs.
Syntax	DisplayString
Access	Read-only

### Array Disk Enclosure Connection Enclosure Number

Name	arrayDiskEnclosureConnectionEnclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.5
Description	Identifies the instance number in the enclosureTable of the enclosure to which this array disk belongs.
Syntax	Integer
Access	Read-only

## Array Disk Enclosure Connection Controller Name

Name	arrayDiskEnclosureConnectionControllerName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.6
Description	Identifies the name of the controller as represented in Storage Management to which this array disk is connected.
Syntax	DisplayString
Access	Read-only

### Array Disk Enclosure Connection Controller Number

Name	arrayDiskEnclosureConnectionControllerNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.5.1.7
Description	Identifies the instance number in the controllerTable of the controller to which this array disk is connected.
Syntax	Integer
Access	Read-only

# **Array Disk Channel Connection Table**

This table describes the connections between array disks, their channel, and their associated controller. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.



NOTE: Only array disks that are NOT part of an enclosure will be listed in this table. Backplanes are considered enclosures by Storage Management.

The following object sets up the Array Disk Channel Connection Table.

Name	arrayDiskChannelConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6
Description	Defines the array disk channel connection table.
Syntax	SEQUENCE OF ArrayDiskChannelConnectionEntry
Access	Not accessible

#### **Array Disk Channel Connection Entry**

Name	arrayDiskChannelConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1
Description	Defines the array disk channel connection table entry.
Syntax	ArrayDiskChannelConnectionEntry
Access	Not accessible
Index	arrayDiskEnclosureConnectionNumber

#### **Array Disk Channel Connection Number**

Name	arrayDiskChannelConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.1
Description	Identifies the instance number of the array disk channel connection entry.
Syntax	Integer
Access	Read-only

### Array Disk Channel Connection Array Disk Name

Name	arrayDiskChannelConnectionArrayDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.2
Description	Identifies the name of the array disk in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

### Array Disk Channel Connection Array Disk Number

Name	arrayDiskChannelConnectionArrayDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.3
Description	Identifies the instance number of the array disk in the arrayDiskTable in this connection.
Syntax	Integer
Access	Read-only

# Array Disk Channel Connection Channel Name

Name	arrayDiskChannelConnectionChannelName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.4
Description	Identifies the name of the channel as represented in Storage Management to which is array disk is connected.
Syntax	DisplayString
Access	Read-only

### **Array Disk Channel Connection Channel Number**

Name	arrayDiskChannelConnectionChannelNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.5
Description	Identifies the instance number of the channel in the channelTable to which this array disk is connected.
Syntax	Integer
Access	Read-only

### Array Disk Channel Connection Controller Name

Name	arrayDiskChannelConnectionControllerName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.6
Description	Identifies the name of the controller as represented in Storage Management to which this array disk is connected.
Syntax	DisplayString
Access	Read-only

## **Array Disk Channel Connection Controller Number**

Name	array Disk Channel Connection Controller Number
Object ID	1.3.6.1.4.1.674.10893.1.20.130.6.1.7
Description	Identifies the instance number in the controllerTable of the controller to which this array disk is connected.
Syntax	Integer
Access	Read-only

# Fan Table

This table describes available properties for each fan on the managed system. The following object sets up the Fan Table.

Name	fanTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7
Description	Defines the fan table.
Syntax	SEQUENCE OF FanEntry
Access	Not accessible
Fan Entry	
Name	fanEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1
Description	Defines the fan table entry.
Syntax	FanEntry
Access	Not accessible
Index	fanNumber

### Fan Number

Name	fanNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.1
Description	Identifies the instance number of the fan entry.
Syntax	Integer
Access	Read-only
Fan Name	
Name	Fan Name
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.2
Description	Identifies the fan's name as represented in Storage Management.
Syntax	DisplayString
Access	Read-only
Fan Vendor	
Name	fanVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.3
Description	Identifies the fan's (re)seller's name.
Syntax	DisplayString
Access	Read-only
Fan State	
Name	fanState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.4
Description	Identifies the current state of the fan. Possible states:
	0: Unknown
	1: Ready
	2: Failed
	3: Online
	4: Offline
	6: Degraded
	21: Missing
Syntax	Integer
Access	Read-only

## Fan Severity

Name	fanSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

# Fan Probe Unit

Name	fanProbeUnit
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.6
Description	This entry is obsolete for Storage Services.
Syntax	DisplayString
Access	Read-only

## Fan Probe Minimum Warning

Name	fanProbeMinimumWarning
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.7
Description	This entry is obsolete. This setting is not supported by fans managed under Storage Management.
Syntax	DisplayString
Access	Read-only

## Fan Probe Minimum Critical

Name	fanProbeMinimumCritical
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.8
Description	This entry is obsolete. This setting is not supported by fans managed under Storage Management.
Syntax	DisplayString
Access	Read-only

## Fan Probe Maximum Warning

Name	fanProbeMaximumWarning
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.9
Description	This entry is obsolete. This setting is not supported by fans managed under Storage Management.
Syntax	DisplayString
Access	Read-only

# Fan Probe Maximum Critical

Name	fanProbeMaximumCritical
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.10
Description	This entry is obsolete. This setting is not supported by fans managed under Storage Management.
Syntax	DisplayString
Access	Read-only

### Fan Probe Current Value

Name	fanProbeCurrValue
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.11
Description	Identifies the current speed of the fan.
Syntax	DisplayString
Access	Read-only

## Fan1 Part Number

Name	fanlPartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.12
Description	Identifies the part number of the fan in the enclosure.
Syntax	DisplayString
Access	Read-only

### Fan 2 Part Number

Name	fan2PartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.13
Description	This entry is obsolete. This setting is not supported by fans managed under Storage Management.
Syntax	DisplayString
Access	Read-only
Fan Roll-Up Status	5
Name	fanRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.14
Description	Severity of the fan state. This is the combined status of the fan and its components. Possible values:
	l: Other
	2: Unknown
	3: OK

	-
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.14
Description	Severity of the fan state. This is the combined status of the fan and i components. Possible values:
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

### **Fan Component Status**

Name	fanComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.15
Description	The status of the fan itself without the propagation of any contained component status. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

#### Fan Nexus ID

Name	fanNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.16
Description	Durable unique ID for this fan.
Syntax	DisplayString
Access	Read-only
Fan Revision	
Name	fanRevision
Object ID	1.3.6.1.4.1.674.10893.1.20.130.7.1.17
Description	Indicates the revision number of the fan in the enclosure.
Syntax	DisplayString

## **Fan Connection Table**

Access

This table describes the connection between each fan on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the enclosure Table.

The following object sets up the Fan Connection Table.

Read-only

Name	fanConnectionTable
Object ID	fanConnectionTable
Description	Defines the fan connection table.
Syntax	SEQUENCE OF FanConnectionEntry
Access	Not accessible

#### **Fan Connection Entry**

Name	fanConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1
Description	Defines the fan connection table entry.
Syntax	FanConnectionEntry
Access	Not accessible
Index	fanConnectionNumber

### **Fan Connection Number**

Name	fanConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1.1
Description	Identifies the instance number of the fan connection entry.
Syntax	Integer
Access	Read-only

# Fan Connection Fan Name

Name	fanConnectionFanName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1.2
Description	Identifies the name of the fan in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

## Fan Connection Fan Number

Name	fanConnectionFanNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1.3
Description	Identifies the instance number of the fan in the fanTable in the connection.
Syntax	Integer
Access	Read-only

## **Fan Connection Enclosure Name**

Name	fanConnectionEnclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1.4
Description	Identifies the name of the enclosure as represented in Storage Management to which this fan belongs.
Syntax	DisplayString
Access	Read-only

## **Fan Connection Enclosure Number**

Name	fanConnectionEnclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.8.1.5
Description	Identifies the instance number of the enclosure in the enclosureTable to which this fan belongs.
Syntax	Integer
Access	Read-only

## **Power Supply Table**

This table describes available properties for each power supply on the managed system. The following object sets up the Power Supply Table.

Name	powerSupplyTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9
Description	Defines the power supply table.
Syntax	SEQUENCE OF PowerSupplyEntry
Access	Not accessible

### **Power Supply Entry**

Name	powerSupplyEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1
Description	Defines the power supply table entry.
Syntax	PowerSupplyEntry
Access	Not accessible
Index	powerSupplyNumber

## **Power Supply Number**

Name	powerSupplyNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.1
Description	Identifies the instance number of the power supply entry.
Syntax	Integer
Access	Read-only

## **Power Supply Name**

Name	powerSupplyName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.2
Description	Identifies the power supply's name as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Power Supply Vendor**

Name	powerSupplyVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.3
Description	Identifies the power supply's (re)seller's name.
Syntax	DisplayString
Access	Read-only

## **Power Supply State**

Name	powerSupplyState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.4
Description	Identifies the current state of the power supply. Possible states:
	0: Unknown
	1: Ready
	2: Failed
Syntax	Integer
Access	Read-only

## **Power Supply Severity**

Name	powerSupplySeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

## Power Supply 1 Part Number

Name	powerSupply1PartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.6
Description	Identifies the part number of the power supply of the enclosure.
Syntax	DisplayString
Access	Read-only

### Power Supply 2 Part Number

Name	powerSupply2PartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.7
Description	This entry is obsolete. This setting is not supported by power supplies managed under Storage Management
Syntax	DisplayString
Access	Read-only

# Power Supply Roll-Up Status

Name	powerSupplyRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.8
Description	Severity of the power supply state. This is the combined status of the power supply and its components. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Power Supply Component Status**

Name	powerSupplyComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.9
Description	Severity of the power supply state. This is the combined status of the power supply and its components. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

# **Power Supply NexusID**

Name	powerSupplyNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.10
Description	Durable unique ID for this power supply.
Syntax	DisplayString
Access	Read-only

## **Power Supply Revision**

Name	powerSupplyRevision
Object ID	1.3.6.1.4.1.674.10893.1.20.130.9.1.11
Description	Indicates the revision number of the power supply in the enclosure.
Syntax	DisplayString
Access	Read-only

# **Power Supply Connection Table**

This table describes the connection between each power supply on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the enclosure Table.

The following object sets up the Power Supply Connection Table.

Name	powerSupplyConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10
Description	Defines the power supply connection table.
Syntax	SEQUENCE OF PowerSupplyConnectionEntry
Access	Not accessible

#### **Power Supply Connection Entry**

Name	powerSupplyConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1
Description	Defines the power supply connection table entry.
Syntax	PowerSupplyConnectionEntry
Access	Not accessible
Index	powerSupplyConnectionNumber

#### **Power Supply Connection Number**

Name	powerSupplyConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1.1
Description	Identifies the instance number of the power supply connection entry.
Syntax	Integer
Access	Read-only

### **Power Supply Connection Power Supply Name**

Name	powerSupplyConnectionPowerSupplyName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1.2
Description	Identifies the name of the power supply in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

### Power Supply Connection Power Supply Number

Name	powerSupplyConnectionPowerSupplyNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1.3
Description	Identifies the instance number of the power supply in the powerSupplyTable in the connection.
Syntax	Integer
Access	Read-only

### **Power Supply Connection Enclosure Name**

Name	powerSupplyConnectionEnclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1.4
Description	Identifies the name of the enclosure as represented in Storage Management to which this power supply belongs.
Syntax	DisplayString
Access	Read-only

## Power Supply Connection Enclosure Number

Name	powerSupplyConnectionEnclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.10.1.5
Description	Identifies the instance number of the enclosure in the enclosureTable to which this power supply belongs.
Syntax	Integer
Access	Read-only

# **Temperature Probe Table**

This table describes available properties for each temperature probe on the managed system. The following object sets up the Temperature Probe Table.

Name Object ID	temperatureProbeTable 1.3.6.1.4.1.674.10893.1.20.130.11
Description	A table of managed temperature probes. The number of entries is related to the number of temperature probes discovered in the system. The maximum number of entries is implementation dependent. <b>NOTE:</b> The properties in this table may not be applicable to all entries.
Syntax	SEQUENCE OF TemperatureProbeEntry
Access	Not accessible

### **Temperature Probe Entry**

Name	temperatureProbeEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1
Description	An entry in the Temperature Probe Table. A row in this table cannot be created or deleted by SNMP operations on columns of the table.
Syntax	TemperatureProbeEntry
Access	Not accessible
Index	TemperatureProbeNumber

### Temperature Probe Number

Name	temperatureProbeNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.1
Description	Identifies the instance number of the temperature probe entry.
Syntax	Integer
Access	Read-only

#### **Temperature Probe Name**

Name	temperatureProbeName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.2
Description	Identifies the temperature probe's name as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

## **Temperature Probe Vendor**

Name	temperatureProbeVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.3
Description	Identifies the temperature probe's (re)seller's name.
Syntax	DisplayString
Access	Read-only

## **Temperature Probe State**

Name	temperatureProbeState	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.4	
Description	Identifies the current state of the temperature probe. Possible states:	
	0: Unknown	
	1: Ready	
2: Failed (Minimum Failure Threshold Exceeded, Maximum Failure Three Exceeded)		
	4: Offline	
6: Degraded (Minimum Warning Threshold Exceeded, Maximum Wa Threshold Exceeded)		
	9: Inactive	
21: Missing		
Syntax	Integer	
Access	Read-only	

## **Temperature Probe Severity**

Name	temperatureProbeSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

### **Temperature Probe Unit**

Name	temperatureProbeUnit	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.6	
Description	The units that will be used to display temperatures for the temperature probe.	
Syntax	DisplayString	
Access	Read-only	

### **Temperature Probe Minimum Warning**

Name	temperatureProbeMinWarning
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.7
Description	Identifies the minimum temperature that will force the probe into a warning state.
Syntax	Integer
Access	Read-only

### **Temperature Probe Minimum Critical**

Name	temperatureProbeMinCritical	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.8	
Description	Identifies the minimum temperature that will force the probe into an error state.	
Syntax	Integer	
Access	Read-only	

### **Temperature Probe Maximum Warning**

Name	temperatureProbeMaxWarning	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.9	
Description	Identifies the maximum temperature that will force the probe into a warning state.	
Syntax	Integer	
Access	Read-only	

## Temperature Probe Maximum Critical

Name	temperatureProbeMaxCritical	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.10	
Description	Identifies the maximum temperature that will force the probe into an error state.	
Syntax	Integer	
Access	Read-only	

## Temperature Probe Current Value

Name	temperatureProbeCurValue
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.11
Description	Identifies the current temperature of this probe.
Syntax	Integer
Access	Read-only

## Temperature Probe Roll-Up Status

Name	temperatureProbeRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.12
Description	Severity of the temperature probe state. This is the combined status of the temperature probe and its components. Possible values:
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

#### **Temperature Probe Component Status**

Name	temperatureProbeComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.11.1.13
Description	The status of the temperature probe itself without the propagation of any contained component status. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

## **Temperature Probe Nexus ID**

Name	temperatureProbeNexusID
Object ID	.3.6.1.4.1.674.10893.1.20.130.11.1.14
Description	Durable unique ID for this temperature probe.
Syntax	DisplayString
Access	Read-only

## **Temperature Probe Connection Table**

This table describes the connection between each temperature probe on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the enclosure Table.

The following object sets up the Temperature Probe Connection Table.

Name	temperatureConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12
Description	Defines the temperature probe connection table.
Syntax	SEQUENCE OF TemperatureConnectionEntry
Access	Not accessible

### **Temperature Probe Connection Entry**

Name	temperatureConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1
Description	Defines the temperature probe connection table entry.
Syntax	TemperatureConnectionEntry
Access	Not accessible
Index	temperatureConnectionNumber

### **Temperature Probe Connection Number**

Name	temperatureConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1.1
Description	Identifies the instance number of the temperature probe connection entry.
Syntax	Integer
Access	Read-only

#### **Temperature Probe Connection Temperature Probe Name**

Name	temperatureConnectionTemperatureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1.2
Description	Identifies the name of the temperature probe in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

### Temperature Probe Connection Temperature Probe Number

Name	temperatureConnectionTemperatureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1.3
Description	Identifies the instance number in the temperature Table of the temperature probe in this connection.
Syntax	Integer
Access	Read-only

### **Temperature Probe Connection Enclosure Name**

Name	temperatureConnectionEnclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1.4
Description	Identifies the name of the enclosure as represented in Storage Management to which this temperature probe belongs.
Syntax	DisplayString
Access	Read-only

#### **Temperature Probe Connection Enclosure Number**

Name	temperatureConnectionEnclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.12.1.5
Description	Identifies the instance number of the enclosure in the enclosureTable to which this temperature probe belongs.
Syntax	Integer
Access	Read-only

### **Enclosure Management Module Table**

This table describes available properties for each enclosure management module on the managed system. The following object sets up the Enclosure Management Module Table.

Name	enclosureManagementModuleTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13
Description	Defines the enclosure management module table.
Syntax	SEQUENCE OF EnclosureManagementModuleEntry
Access	Not accessible

#### **Enclosure Management Module Entry**

Name	EnclosureManagementModuleEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1
Description	Defines the enclosure management module table entry.
Syntax	EnclosureManagementModuleEntry
Access	Not accessible
Index	enclosureManagementModuleNumber

## **Enclosure Management Module Number**

Name	enclosureManagementModuleNumber	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.1	
Description	Identifies the instance number of the enclosure management module entry.	
Syntax	Integer	
Access	Read-only	

## **Enclosure Management Module Name**

Name	enclosureManagementModuleName	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.2	
Description	Identifies the enclosure management module's name as represented in Storage Management.	
Syntax	DisplayString	
Access	Read-only	

## **Enclosure Management Module Vendor**

Name	enclosureManagementModuleVendor	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.3	
Description	Identifies the enclosure management module's (re)seller's name.	
Syntax	DisplayString	
Access	Read-only	

## **Enclosure Management Module State**

Name	enclosureManagementModuleState	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.4	
Description	Identifies the current state of the enclosure management module. Possible states:	
	0: Unknown	
1: Ready		
2: Failed		
3: Online		
4: Offline		
5: Not Installed		
6: Degraded		
21: Missing		
Syntax	Integer	
Access	Read-only	

### **Enclosure Management Module Severity**

Name	enclosureManagementModuleSeverity	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.5	
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.	
Syntax	Integer	
Access	Read-only	

### **Enclosure Management Module Part Number**

Name	enclosureManagementModulePartNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.6
Description	Identifies the part number of the enclosure memory module.
Syntax	Display String
Access	Read-only

## Enclosure Management Module Type

Name	enclosureManagementModuleType	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.7	
Description	Identifies the type of the enclosure management module. Possible values:	
	0: Unknown	
	1: EMM	
	2: Termination Card	
Syntax	Integer	
Access	Read-only	

## Enclosure Management Module Firmware Version

Name	enclosureManagementModuleFWVersion	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.8	
Description	Identifies the firmware version of the enclosure memory module.	
Syntax	DisplayString	
Access	Read-only	

### **Enclosure Management Module Maximum Speed**

Name	enclosureManagementModuleMaxSpeed	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.9	
Description	Identifies the maximum bus speed of the enclosure management module.	
Syntax	DisplayString	
Access	Read-only	

## **Enclosure Management Module Roll-Up Status**

Name	enclosureManagementModuleRollUpStatus	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.10	
<b>Description</b> Severity of the enclosure management module state. This is the combine of the EMM and its components. Possible values:		
	1: Other	
2: Unknown		
3: OK		
4: Non-critical		
5: Critical		
	6: Non-recoverable	
Syntax	DellStatus	
Access	Read-only	

### **Enclosure Management Module Component Status**

Name	enclosureManagementModuleComponentStatus	
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.11	
<b>Description</b> The status of the enclosure management module itself without the proof any contained component status. Possible values:		
	l: Other	
2: Unknown		
3: OK		
4: Non-critical		
5: Critical		
6: Non-recoverable		
Syntax	DellStatus	
Access	Read-only	

## **Enclosure Management Module Nexus ID**

Name	enclosureManagementModuleNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.12
Description	Durable unique ID for this EMM.
Syntax	DisplayString
Access	Read-only

### **Enclosure Management Module Revision**

Name	enclosureManagementModuleRevision
Object ID	1.3.6.1.4.1.674.10893.1.20.130.13.1.13
Description	Identifies the revision number of the enclosure management module.
Syntax	DisplayString
Access	Read-only

## **Enclosure Management Module Connection Table**

This table describes the connection between each enclosure management module on the managed system and its enclosure. Each enclosure "number" in the table corresponds to that enclosure instance in the enclosure Table.

The following object sets up the Enclosure Management Module Connection Table.

Name	enclosureManagementModuleConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14
Description	Defines the enclosure memory module connection table.
Syntax	SEQUENCE OF EnclosureManagementModuleConnectionEntry
Access	Not accessible

#### **Enclosure Management Module Connection Entry**

Name	enclosureManagementModuleConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1
Description	Defines the enclosure memory module connection table entry.
Syntax	EnclosureManagementModuleConnectionEntry
Access	Not accessible
Index	enclosureManagementModuleConnectionNumber

#### **Enclosure Management Module Connection Number**

Name	enclosureManagementModuleConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1.1
Description	Identifies the instance number of the enclosure memory module connection entry.
Syntax	Integer
Access	Read-only

## **Enclosure Management Module Connection EMM Name**

Name	enclosureManagementModuleConnectionEMMName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1.2
Description	Identifies the name of the enclosure memory module in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only
Enclosure Management Module Connection EMM Number	
Name	enclosureManagementModuleConnectionEMMNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1.3
Description	Identifies the instance number in the enclosureManagementModuleTable of the enclosure memory module in this connection.
Syntax	Integer
Access	Read-only
Enclosure Management Module Connection Enclosure Name	
Name	enclosureManagementModuleConnectionEnclosureName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1.4
Description	Identifies the name of the enclosure as represented in Storage Management to which this enclosure memory module belongs.
Syntax	DisplayString
Access	Read-only
Enclosure Management Module Connection Enclosure Number	
Name	enclosureManagementModuleConnectionEnclosureNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.14.1.5
Description	Identifies the instance number of the enclosure in the enclosureTable to which this enclosure memory module belongs.

Access Read-only

Integer

Syntax

# **Battery Table**

This table describes available properties for each controller battery on the managed system. The following object sets up the Battery Table.

Name	batteryTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15
Description	Defines the battery table.
Syntax	SEQUENCE OF BatteryEntry
Access	Not accessible

## **Battery Entry**

Name	batteryEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1
Description	Defines the battery table entry.
Syntax	BatteryEntry
Access	Not accessible
Index	batteryNumber

## **Battery Number**

Name	batteryNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.1
Description	Identifies the instance number of the battery entry.
Syntax	Integer
Access	Read-only

#### **Battery Name**

Name	batteryName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.2
Description	Identifies the battery's name as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

# **Battery Vendor**

Name	batteryVendor
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.3
Description	Identifies the battery's (re)seller's name.
Syntax	DisplayString
Access	Read-only
Battery State	
Name	batteryState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.4
Description	Identifies the current state of battery. Possible values:
	0: Unknown
	1: OK
	2: Failed
	6: Degraded
	7: Reconditioning
	9: High
	10: Low
	12: Charging
	21: Missing
	36: Learning
	37: Low Capacity
Syntax	Integer
Access	Read-only

### **Battery Roll-Up Status**

Name	batteryRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.5
<b>Description</b> Severity of the battery state. This is the combined status of the batter components. Possible values:	
	l: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

### **Battery Component Status**

Name	batteryComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.6
<b>Description</b> The status of the battery itself without the propagation of any component status. Possible values:	
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

### **Battery Charge Count**

Name	batteryChargeCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.7
Description	The number of charges that have been applied to the battery.
Syntax	Integer
Access	Read-only

### **Battery Max Charge Count**

Name	batteryMaxChargeCount
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.8
Description	The maximum number of charges that can be applied to the battery.
Syntax	Integer
Access	Read-only

### **Battery Nexus ID**

Name	batteryNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.9
Description	Durable unique ID for this EMM.
Syntax	DisplayString
Access	Read-only

### **Battery Predicted Capacity**

Name	batteryPredictedCapacity
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.10
Description	Displays the battery's ability to be charged.
	Possible values:
	1: Failed - The battery cannot be charged and needs to be replaced.
	2: Ready - The battery can be charged to full capacity.
	4: Unknown - The battery is completing a Learn cycle. The charge capacity of the battery cannot be determined until the Learn cycle is complete.
Syntax	Integer
Access	Read-only

### **Battery Next Learn Time**

Name	batteryNextLearnTime
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.11
Description	Indicates the time (in hours) the next learn cycle must be executed
Syntax	Integer
Access	Read-only

### **Battery Learn State**

Name	batteryLearnState
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.12
Description	Specifies the learn state activity of the battery. Possible values:
	l: Failed
	2: Active
	4: Timed out
	8: Requested
	16: Idle
Syntax	Integer
Access	Read-only

### **Battery Maximum Learn Delay**

Name	batteryMaxLearnDelay
Object ID	1.3.6.1.4.1.674.10893.1.20.130.15.1.14
Description	The maximum amount of time (in hours) that the battery learn cycle can be delayed.
Syntax	Integer
Access	Read-only

### **Battery Connection Table**

This table describes the connection between each controller battery on the managed system and its controller. Each controller "number" in the table corresponds to that controller instance in the controller Table.

The following object sets up the Battery Connection Table.

Name	batteryConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16
Description	Defines the battery connection table.
Syntax	SEQUENCE OF BatteryConnectionEntry
Access	Not accessible

### **Battery Connection Entry**

Name	batteryConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1
Description	Defines the battery connection table entry.
Syntax	BatteryConnectionEntry
Access	BatteryConnectionEntry
Index	BatteryConnectionNumber

### **Battery Connection Number**

Name	batteryConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1.1
Description	Identifies the instance number of the battery connection entry.
Syntax	Integer
Access	Read-only

### **Battery Connection Battery Name**

Name	batteryConnectionBatteryName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1.2
Description	Identifies the name of the battery in this connection as represented in Storage Management.
Syntax	DisplayString
Access	Read-only

### **Battery Connection Battery Number**

Name	batteryConnectionBatteryNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1.3
Description	Identifies the instance number in the batteryTable of the battery in this connection.
Syntax	Integer
Access	Read-only

### **Battery Connection Controller Name**

Name	batteryConnectionControllerName
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1.4
Description	Identifies the name of the controller as represented in Storage Management to which this battery belongs.
Syntax	DisplayString
Access	Read-only
Battery Connection	on Controller Number
Name	batteryConnectionControllerNumber
Name Object ID	batteryConnectionControllerNumber 1.3.6.1.4.1.674.10893.1.20.130.16.1.5
	-
Object ID	1.3.6.1.4.1.674.10893.1.20.130.16.1.5 Identifies instance number of the controller in the controllerTable to which this

# **Logical Devices Group**

The Logical Devices Management Information Base (MIB) group provides information about the logical devices managed by the Dell Storage Management Software and their relationships to each other.

This group and all of its associated tables and objects are not supported on Microsoft<sup>®</sup> Windows<sup>®</sup> Advanced Server Limited Edition 64-bit operating system (Windows.Net-64) on a Dell PowerEdge<sup>™</sup> 7150. The following MIB tables define objects and relationships, or connections among the objects, in the Logical Devices Group:

- Virtual Disk Table—describes available properties for each virtual disk on the managed system.
- Array Disk Logical Connection Table—describes the connections between array disks, the virtual disk to which they belong, and their associated logical disk. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.

### **Virtual Disk Table**

This table describes available properties for each virtual disk on the managed system. The following object sets up the Virtual Disk Table.

Name	virtualDiskTable
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1
Description	Defines the virtual disk table.
Syntax	SEQUENCE OF VirtualDiskEntry
Access	Not accessible

### **Virtual Disk Entry**

Name	virtualDiskEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1
Description	Defines the virtual disk table entry.
Syntax	VirtualDiskEntry
Access	Not accessible
Index	virtualDiskNumber

### **Virtual Disk Number**

Name	virtualDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.1
Description	Identifies the instance number of the virtual disk entry.
Syntax	Integer
Access	Read-only

### Virtual Disk Name

Name	virtualDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.2
Description	Identifies the virtual disk's label generated by Storage Management or entered by the user.
Syntax	DisplayString
Access	Read-only

### Virtual Device Disk Name

Name	virtualDiskDeviceName
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.3
Description	Identifies the device name used by this virtual disk's member disks.
Syntax	DisplayString
Access	Read-only

### Virtual Disk State

Name	virtualDiskState
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.4
Description	Identifies the current state of this virtual disk. Possible states:
	0: Unknown
	1: Ready - The disk is accessible and has no known problems.
	2: Failed - The data on the virtual disk is no longer fault tolerant because one of the underlying disks is not online.
	3: Online
	4: Offline - The disk is not accessible. The disk may be corrupted or intermittently unavailable.
	6: Degraded - The data on the virtual disk is no longer fault tolerant because one of the underlying disks is not online.
	15: Resynching
	16: Regenerating
	24: Rebuilding
	26: Formatting
	32: Reconstructing
	35: Initializing
	36: Background Initialization
Syntax	Integer
Access	Read-only

### **Virtual Disk Severity**

Name	virtualDiskSeverity
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.5
Description	This entry is obsolete for Storage Management. It was replaced with RollUpStatus and ComponentStatus for each device.
Syntax	Integer
Access	Read-only

### Virtual Disk Length in Megabytes

Name	virtualDiskLengthInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.6
Description	Identifies the size of this virtual disk in megabytes. If this size is 0, it is smaller than a megabyte.
Syntax	Integer
Access	Read-only

### Virtual Disk Length in Bytes

Name	virtualDiskLengthBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.7
Description	Identifies the portion of the virtual disk in bytes that is smaller than a megabyte. This size plus the virtualDiskLengthInMB is the total size of the virtual disk.
Syntax	Integer
Access	Read-only

### Virtual Disk Free Space in Megabytes

Name	virtualDiskFreeSpaceInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.8
Description	This entry is obsolete. This property is not supported by virtual disks managed under Storage Management.
Syntax	Integer
Access	Read-only

### Virtual Disk Free Space in Bytes

Name	virtualDiskFreeSpaceInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.9
Description	This entry is obsolete. This property is not supported by virtual disks managed under Storage Management.
Syntax	Integer
Access	Read-only

### Virtual Disk Write Policy

Name	virtualDiskWritePolicy
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.10
Description	Indicates whether the controller's write cache will be used when writing to a virtual disk. Possible values:
	1: Enabled - Adaptec Write Cache Enabled Protected
	2: Disabled - Adaptec Write Cache Disabled
	3: LSI Write Back
	4: LSI Write Through
	5: Enabled Always - (Adaptec only)
Syntax	Integer
Access	Read-only

### Virtual Disk Read Policy

Name	virtualDiskReadPolicy
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.11
Description	Indicates whether the controller's read cache will be used when reading from a virtual disk. Possible values:
	1: Enabled - Adaptec Read Cache Enabled
	2: Disabled - Adaptec Read Cache Disabled
	3: LSI Read Ahead
	4: LSI Adaptive Read Ahead
	5: LSI No Read Ahead
Syntax	Integer
Access	Read-only

### **Virtual Disk Cache Policy**

Name	virtualDiskCachePolicy
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.12
Description	Indicates whether the controller's cache is used when reading from or writing to a virtual disk. Possible values:
	1: Direct I/O (LSI)
	2: Cached I/O (LSI)
	99: Not Applicable
Syntax	Integer
Access	Read-only

### Virtual Disk Layout

Name	virtualDiskLayout
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.13
Description	Indicates the virtual disk's RAID type. Possible values: 1: Concatenated 2: RAID-0 3: RAID-1 7: RAID-5 10: RAID-10 12: RAID-50 19: Concatenated RAID 1
Syntax	Integer
Access	Read-only

### Virtual Disk Current Stripe Size in Megabytes

Name	virtualDiskCurStripeSizeInMB
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.14
Description	Identifies the stripe size of this virtual disk in megabytes. If this size is 0, it is smaller than a megabyte.
Syntax	Integer
Access	Read-only

### Virtual Disk Current Stripe Size in Bytes

Name	virtualDiskCurStripeSizeInBytes
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.15
Description	Identifies the portion of the stripe size in bytes that is smaller than a megabyte. This size plus the virtualDiskCurStripeSizeInMB is the total stripe size on the virtual disk.
Syntax	Integer
Access	Read-only

### **Virtual Disk Channel**

Name	virtualDiskChannel
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.16
Description	This entry is obsolete. This property is not supported by virtual disks managed under Storage Management.
Syntax	Integer
Access	Read-only

### Virtual Disk Target ID

Name	virtualDiskTargetID
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.17
Description	Unique ID for the virtual disk.
Syntax	Integer
Access	Read-only

### Virtual Disk LUN ID

Name	virtualDiskLunID
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.18
Description	This entry is obsolete. This property is not supported by virtual disks managed under Storage Management.
Syntax	Integer
Access	Read-only

### Virtual Disk Roll-Up Status

Name	virtualDiskRollUpStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.19
Description	Severity of the virtual disk state. This is the combined status of the virtual disk and its components. Possible values: 1: Other 2: Unknown 3: OK 4: Non-critical 5: Critical 6: Non-recoverable
Syntax	DellStatus
Access	Read-only

### Virtual Disk Component Status

Name	virtualDiskComponentStatus
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.20
Description	The status of the virtual disk itself without the propagation of any contained component status. Possible values:
	1: Other
	2: Unknown
	3: OK
	4: Non-critical
	5: Critical
	6: Non-recoverable
Syntax	DellStatus
Access	Read-only

### Virtual Disk Nexus ID

Name	virtualDiskNexusID
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.21
Description	Durable unique ID for this virtual disk.
Syntax	DisplayString
Access	Read-only

### **Virtual Disk Array Disk Type**

Name	virtualDiskArrayDiskType
Object ID	1.3.6.1.4.1.674.10893.1.20.140.1.1.22
Description	Identifies the type of array (physical) disks used to create the virtual disk. Possible values:
	1: SAS
	2: SATA
	3: SCSI
	4: IDE
	99: Unknown
Syntax	Integer
Access	Read-only

### **Array Disk Logical Connection Table**

This table describes the connections between array disks, the virtual disk to which they belong, and their associated logical disk. For each object in the table, its object "number" corresponds to an instance number in the appropriate MIB table for that object where all of the object properties can be found.

The following object sets up the Array Disk Logical Connection Table.

Name	arrayDiskLogicalConnectionTable
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3
Description	Defines the array disk logical connection table.
Syntax	SEQUENCE OF arrayDiskLogicalConnectionEntry
Access	Not accessible

### **Array Disk Logical Connection Entry**

Name	arrayDiskLogicalConnectionEntry
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1
Description	Defines the array disk logical connection table entry.
Syntax	ArrayDiskLogicalConnectionEntry
Access	Not accessible
Index	arrayDiskLogicalConnectionNumber

### **Array Disk Logical Connection Number**

Name	arrayDiskLogicalConnectionNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.1
Description	Identifies the instance number of the disk entry.
Syntax	Integer
Access	Read-only

### Array Disk Logical Connection Array Disk Name

Name	arrayDiskLogicalConnectionArrayDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.2
Description	Identifies the name of the array disk in this logical connection.
Syntax	DisplayString
Access	Read-only

### Array Disk Logical Connection Array Disk Number

Name	arrayDiskLogicalConnectionArrayDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.3
Description	Identifies the instance number of the array disk in this logical connection.
Syntax	Integer
Access	Read-only

### Array Disk Logical Connection Virtual Disk Name

Name	arrayDiskLogicalConnectionVirtualDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.4
Description	Identifies the name of the virtual disk to which this array disk belongs.
Syntax	DisplayString
Access	Read-only

### Array Disk Logical Connection Virtual Disk Number

Name	arrayDiskLogicalConnectionVirtualDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.5
Description	Identifies the instance number of the virtual disk to which this array disk belongs.
Syntax	Integer
Access	Read-only

### Array Disk Logical Connection Disk Name

Name	arrayDiskLogicalConnectionDiskName
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.6
Description	Identifies the name of the disk group to which this array disk belongs. This property is currently not supported.
Syntax	DisplayString
Access	Read-only

### Array Disk Logical Connection Disk Number

Name	arrayDiskLogicalConnectionDiskNumber
Object ID	1.3.6.1.4.1.674.10893.1.20.140.3.1.7
Description	Identifies the instance number of the disk group to which this array disk belongs. This property is currently not supported.
Syntax	Integer
Access	Read-only

# Storage Management Event Group

The Storage Management Event Group defines the properties that will be sent with SNMP traps.

### **Message ID Event**

Name	messageIDEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.1
Description	Storage Management event message number.
Syntax	Integer
Access	Read-only

### **Description Event**

Name	descriptionEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.2
Description	Storage Management event message text describing the alert.
Syntax	DisplayString
Access	Read-only

### **Location Event**

Name	locationEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.3
Description	Additional information identifying the location of the object causing the alert.
Syntax	DisplayString
Access	Read-only

### **Object Name Event**

Name	objectNameEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.4
Description	Name of the object as represented in Storage Management causing the alert.
Syntax	DisplayString
Access	Read-only

### **Object OID Event**

Name	objectOIDEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.5
Description	MIB OID of the object causing the alert.
Syntax	DisplayString
Access	Read-only

### **Object Nexus Event**

Name	objectNexusEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.6
Description	Durable, unique ID of the object causing the alert.
Syntax	DisplayString
Access	Read-only

### **Current Status Event**

Name	currentStatusEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.7
Description	Current status of object causing the alert, if applicable.
Syntax	DellStatus
Access	Read-only

### **Previous Status Event**

Name	previousStatusEvent
Object ID	1.3.6.1.4.1.674.10893.1.20.200.8
Description	Previous status of object causing the alert if applicable.
Syntax	DellStatus
Access	Read-only



# **Change Management Group**

The Change Management Group lets you monitor information about the Dell<sup>™</sup> devices and software that are present on a particular managed computer chassis. This information is collected during an inventory scan.

# **Inventory Group**

The following objects describe the fields for inventory information.

### **Inventory Locale**

Name	inventoryLocale
Object ID	1.3.6.1.4.1.674.10899.1.1
Description	Defines the locale of the system.
Syntax	DisplayString
Access	Read-only

### **Inventory Schema Version**

Name	inventorySchemaVersion
Object ID	1.3.6.1.4.1.674.10899.1.2
Description	Defines the inventory schema implemented by this system.
Syntax	DisplayString
Access	Read-only

### **Inventory System ID**

Name	inventorySystemID
Object ID	1.3.6.1.4.1.674.10899.1.3
Description	Defines the System ID for the system.
Syntax	SystemID
Access	Read-only

# **Device Group**

The Device Group defines information about the devices discovered on the system during an inventory scan. Identifying information includes the Component ID, the Device ID, and the Vendor ID.

### **Device Group Table**

The following object sets up the Device Group Table.

Name	deviceTable
Object ID	1.3.6.1.4.1.674.10899.1.5
Description	Defines the Device Table.
Syntax	SEQUENCE OF DeviceEntry
Access	Not accessible
Device Entry	
Name	deviceEntry
Object ID	1.3.6.1.4.1.674.10899.1.5.1
Description	Defines a device entry.
Syntax	DeviceEntry
Access	Not accessible
Device Index	
Nomo	densi ze Tredens

Name	deviceIndex
Object ID	1.3.6.1.4.1.674.10899.1.5.1.1
Description	Defines the unique index for this device.
Syntax	Unsigned16BitRange
Access	Read-only

### **Device Component ID**

Name	deviceComponentID
Object ID	1.3.6.1.4.1.674.10899.1.5.1.2
Description	Defines an optional component ID field for the device.
Syntax	Integer
Access	Read-only

### **Device Display String**

Name	deviceDisplayString
Object ID	1.3.6.1.4.1.674.10899.1.5.1.3
Description	Provides a displayable string that describes the device.
Syntax	DisplayString
Access	Read-only

### **Device Vendor ID**

Name	deviceVendorID
Object ID	1.3.6.1.4.1.674.10899.1.5.1.4
Description	Defines the ID for the vendor supplying the device.
Syntax	Octet String
Access	Read-only
Device ID	
Name	deviceDeviceID
Object ID	1.3.6.1.4.1.674.10899.1.5.1.5
Description	Defines the ID for the device.
Syntax	Octet String
Access	Read-only
Device Sub ID	
Name	deviceSubID
Object ID	1.3.6.1.4.1.674.10899.1.5.1.6
Description	Provides additional device identification.
Syntax	Octet String
Access	Read-only

### **Device Sub Vendor ID**

Name	deviceSubVendorID
Object ID	1.3.6.1.4.1.674.10899.1.5.1.7
Description	Provides additional vendor identification.
Syntax	Octet String
Access	Read-only

## **Application Group**

**NOTE:** Dell updateable components such as Basic input/output system (BIOS) and FirmWare (FW) are considered applications. For example, the following would be returned for system BIOS: Application/DisplayString = BIOS Application/Version = A10

The Application Group defines information about the applications discovered on the system during an inventory scan. Identifying information includes the application type, the application version, and the application description.

### **Application Group Table**

The following object sets up the Application Group Table.

Name	applicationTable
Object ID	1.3.6.1.4.1.674.10899.1.6
Description	Defines a table of application information for the system.
Syntax	SEQUENCE OF ApplicationEntry
Access	Not accessible

### **Application Entry**

Name	applicationEntry
Object ID	1.3.6.1.4.1.674.10899.1.6.1
Description	Defines an application entry.
Syntax	ApplicationEntry
Access	Read-only

### **Application Index**

Name	applicationIndex
Object ID	1.3.6.1.4.1.674.10899.1.6.1.1
Description	Defines the unique index for this application.
Syntax	Unsigned16BitRange
Access	Read-only

### **Application Device Index**

Name	applicationDeviceIndex
Object ID	1.3.6.1.4.1.674.10899.1.6.1.2
Description	Defines a cross-index to the device table for the application.
Syntax	Unsigned16BitRange
Access	Read-only

### **Application Component Type**

Name	applicationComponentType
Object ID	1.3.6.1.4.1.674.10899.1.6.1.3
Description	Identifies the type of application reported.
Syntax	DisplayString
Access	Read-only

### **Application Version**

Name	applicationVersion
Object ID	1.3.6.1.4.1.674.10899.1.6.1.4
Description	Identifies the version of the application.
Syntax	DisplayString
Access	Read-only

### **Application Display String**

Name	applicationDisplayString
Object ID	1.3.6.1.4.1.674.10899.1.6.1.5
Description	A user visible display string that describes the application.
Syntax	DisplayString
Access	Read-only

### **Application Sub-Component ID**

Name	applicationSubComponentID
Object ID	1.3.6.1.4.1.674.10899.1.6.1.6
Description	The sub-component ID for the application. This is usually valid on ESM device reporting.
Syntax	DisplayString
Access	Read-only

## **Operating System Group**

The Operating System Group provides status and identifying information about a system's operating system. Identifying information includes the name, version, and service pack of the installed operating system.

The following objects describe the fields for Operating System Group.

### **Operating System Vendor**

Name	operatingSystemVendor
Object ID	1.3.6.1.4.1.674.10899.2.1
Description	Defines the vendor of the Operating System.
Syntax	DisplayString
Access	Read-only

### **Operating System Major Version**

Name	operatingSystemMajorVersion
Object ID	1.3.6.1.4.1.674.10899.2.2
Description	Defines the major version of the Operating System.
Syntax	DisplayString
Access	Read-only

### **Operating System Minor Version**

Name	operatingSystemMinorVersion
Object ID	1.3.6.1.4.1.674.10899.2.3
Description	Defines the minor version of the Operating System.
Syntax	DisplayString
Access	Read-only

### **Operating System Service Pack Major Version**

Name	operatingSystemSPMajorVersion
Object ID	1.3.6.1.4.1.674.10899.2.5
Description	Defines the Operating System's Service Pack major version.
Syntax	DisplayString
Access	Read-only

### **Operating System Service Pack Minor Version**

Name	operatingSystemSPMinorVersion
Object ID	1.3.6.1.4.1.674.10899.2.6
Description	Defines the Operating System's Service Pack minor version.
Syntax	DisplayString
Access	Read-only

### **Operating System Architecture**

Name	operatingSystemArchitecture
Object ID	1.3.6.1.4.1.674.10899.2.7
Description	Defines the Operating System's architecture.
Syntax	DisplayString
Access	Read-only

# **Inventory Collector Product Information**

The following objects describe the fields for the Inventory Collector. The Inventory Collector product variables are scalar objects, meaning that they are not related to other Inventory Collector base (MIB) objects and are thus not placed in a table.

### **Product ID Display Name**

Name	productIDDisplayName
Object ID	1.3.6.1.4.1.674.10899.100.1
Description	Defines the display name of the product.
Syntax	DisplayString
Access	Read-only

### **Product ID Description**

Name	productIDDescription
Object ID	1.3.6.1.4.1.674.10899.100.2
Description	Provides a description of the product.
Syntax	DisplayString
Access	Read-only

### **Product ID Vendor**

Name	productIDVendor
Object ID	1.3.6.1.4.1.674.10899.100.3
Description	Provides name of the manufacturer of the product.
Syntax	DisplayString
Access	Read-only

### **Product ID Version**

Name	productIDVersion
Object ID	1.3.6.1.4.1.674.10899.100.4
Description	Describes the version of the product.
Syntax	DisplayString
Access	Read-only

### **Product ID Build Number**

Name	productIDBuildNumber
Object ID	1.3.6.1.4.1.674.10899.100.5
Description	Describes the software build number of the product.
Syntax	DisplayString
Access	Read-only

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# Traps

The Server Administrator generates events that result in Simple Network Management Protocol (SNMP) traps or operating system event logs. This section describes the traps, also known as alerts, generated by the SNMP subagent of Server Administrator.

The Server Administrator generates events in response to changes in the status of sensors and other monitored parameters. When an event with predefined characteristics occurs on your system, the SNMP subagent sends information about the event, along with trap variables, to the management console.

Each status change event generates a unique identifier called the trap ID and a trap description that describes the event. The trap ID and message uniquely describe the severity and cause of the event, and provide other relevant information such as the location of the event and the monitored item's previous state.

"Server Administrator SNMP Traps," found later in this section, lists all Server Administrator-supported trap IDs in numerical order and includes each trap ID's corresponding description, severity level, and cause. Description text in brackets (for example, *<State>*) describes the event-specific information provided by Server Administrator.

# **Trap Variables**

This section describes the variables that are sent to the management console to provide additional information about a trap or alert generated by some event on your system. The trap variables presented here apply to all Server Administrator traps. Trap variables are sent in the order listed and are reserved for use only in traps. When a varbind is created for a trap variable, a zero is appended to the object ID (OID) to create the OID for the varbind.

### **Sy**stem

Variable Name	alertSystem		
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.1		
Description	Identifies the system generating the alert.		
Syntax	DisplayString (SIZE (0255))		

### Table Index OID

Variable Name	alertTableIndexOID
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.2
Description	Gives the object identifier for the index attribute in the table that contains the object causing the alert. Uniquely identifies the object causing the alert and can be used to correlate different alerts caused by the same object.
Syntax	OBJECT IDENTIFIER
Message	
Variable Name	alertMessage
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.3
Description	Describes the alert.
Syntax	DisplayString (SIZE (01024))
Current Status	

Variable Name	alertCurrentStatus
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.4
Description	Gives the current status of the object causing the alert.
Syntax	DellStatus

### **Previous Status**

Variable Name	alertPreviousStatus
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.5
Description	Gives the previous status of the object causing the alert.
Syntax	DellStatus
Data	
Variable Name	alertData
Object ID	1.3.6.1.4.1.674.10892.1.5000.10.6
Description	Provides Server Administrator-defined data related to the alert.

OCTET STRING (SIZE (0..1024))

Syntax

# **Understanding the Trap Description**

Table 25-1 lists in alphabetical order each line item that may appear in the trap description.

Description Line Item	Explanation		
Action performed was: <action></action>	Specifies the automatic server recovery action that was performed, for example:		
	Action performed was: Power cycle		
Action requested was: <action></action>	Specifies the user initiated host control action that was requested for example:		
	Action requested was: Reboot, shutdown OS first		
<additional information="" power="" status="" supply=""></additional>	Specifies any additional power supply information pertaining to the event, for example:		
	Power supply input AC is off, Power supply POK (power OK) signal is not normal, Power supply is turned off		
Chassis intrusion state:	Specifies the chassis intrusion state (open or closed), for example:		
<intrusion state=""></intrusion>	Chassis intrusion state: Open		
Chassis location: <name chassis="" of=""></name>	Specifies the name of the chassis that generated the message, for example:		
wane of enabers,	Chassis location: Main System Chassis		
Configuration error type: <type configuration="" error="" of=""></type>	Specifies the type of configuration error that occurred, for example:		
	Configuration error type: Revision mismatch		
Current sensor value (in Amps):	Specifies the current sensor value in amps, for example:		
<reading></reading>	Current sensor value: 7.853		
Date and time of action: <date and="" time=""></date>	Specifies the date and time that an automatic server recovery action was performed, for example:		
	Date and time of action: Fri May 30 23:55:44 2003.		
Discrete current state: <state></state>	Specifies the state of the current sensor, for example:		
	Discrete current state: Good		
Discrete temperature state:	Specifies the state of the temperature sensor, for example:		
<state></state>	Discrete temperature state: Good		

### Table 25-1. Trap Description Reference

Description Line Item	Explanation		
Discrete voltage state: <i><state></state></i>	Specifies the state of the voltage sensor, for example:		
	Discrete voltage state: Good		
Fan sensor value: < <i>Reading</i> >	Specifies the fan speed in revolutions per minute (RPMs) or On/Off, for example:		
	Fan sensor value (in RPM): 2600		
	Fan sensor value: Off		
Log type: <log type=""></log>	Specifies the type of hardware log, for example:		
	Log type: Embedded Server Management (ESM)		
Memory device bank location: <bank chassis="" in="" name=""></bank>	Specifies the name of the memory bank in the system that generated the message, for example:		
	Memory device bank location: Bank_1		
Memory device location: <device chassis="" in="" name=""></device>	Specifies the location of the memory module in the chassis, for example:		
Device name in chapping,	Memory device location: DIMM_A		
Number of devices required for full redundancy: < <i>Number</i> >	Specifies the number of power supply or cooling devices required to achieve full redundancy, for example:		
	Number of devices required for full redundancy: 4		
Possible memory module event cause: <i><list causes="" of=""></list></i>	Specifies a list of possible causes for the memory module event, for example:		
	Possible memory module event cause: Single bit warning error rate exceeded		
	Single bit error logging disabled		
Power Supply type: <type of="" power<="" td=""><td>Specifies the type of power supply, for example:</td></type>	Specifies the type of power supply, for example:		
supply>	Power Supply type: VRM		
Pre-failure state was: < <i>State</i> >	Specifies the status of the previous memory message, for example:		
	Pre-failure state was: Failed		
Previous redundancy state was: < <i>State</i> >	Specifies the status of the previous redundancy message, for example:		
	Previous redundancy state was: Lost		
Previous state was: < <i>State</i> >	Specifies the previous state of the sensor, for example:		
	Previous state was: OK (Normal)		
Processor sensor status:	Specifies the status of the processor sensor, for example:		
<status></status>	Processor sensor status: Configuration error		

### Table 25-1. Trap Description Reference (continued)

Description Line Item	Explanation		
Redundancy unit:	Specifies the location of the redundant power supply or cooling unit in the chassis, for example:		
<redundancy chassis="" in="" location=""></redundancy>	Redundancy unit: Fan Enclosure		
Sensor location:	Specifies the location of the sensor in the specified chassis,		
<location chassis="" in=""></location>	for example:		
	Sensor location: CPU1		
Temperature sensor value (in	Specifies the temperature in degrees Celsius, for example:		
degrees Celsius):	Temperature sensor value (in degrees Celsius): 30		
<reading></reading>			
Voltage sensor value (in Volts):	Specifies the voltage sensor value in volts, for example:		
<reading></reading>	Voltage sensor value: 1.693		

Table 25-1. Trap Description Reference (continued)

### **Understanding Trap Severity**

Traps often contain information about values recorded by probes or sensors. Probes and sensors monitor critical components for values such as amperage, voltage, and temperature. When an event occurs on your system, the Server Administrator sends information about one of the following event types to the system management console:

- Information/Informational An event that describes the successful operation of a unit, such as a power supply turning on or a sensor reading returning to normal.
- Warning An event that is not necessarily significant, but may indicate a possible future problem, such as crossing a warning threshold.
- Critical/Error A significant event that indicates actual or imminent loss of data or loss of function, such as crossing a failure threshold or a hardware failure.

# **Server Administrator SNMP Traps**

This section describes the traps that are generated by the SNMP subagent of Server Administrator. All of the traps documented in this section belong to the MIB enterprise identified by OID 1.3.6.1.4.1.674.10892.1 and are sent with all of the trap variables documented in the section, "Trap Variables." The trap variables are sent in the order in which they are listed. The messages in the **Description** fields below show the format of the message that is sent in the **alertMessage** varbind. If a message in a **Description** field has multiple lines, the message contains newline (0Ah) characters that are part of the value in the **alertMessage** varbind.

### **Miscellaneous Traps**

Miscellaneous traps inform you that certain alert systems are up and working.

Trap ID	Description	Severity	Cause
Syste	m Up		
1001	Server Administrator startup complete	Information	Server Administrator completed its initialization.
Thern	nal Shutdown		
1004	Thermal shutdown protection has been initiated	Error	This message is generated when a system is configured for thermal shutdown due to an error event. If a temperature sensor reading exceeds the error threshold for which the system is configured, the operating system shuts down and the system powers off. This event may also be initiated on certain systems when a fan enclosure is removed from the system for an extended period of time.
Auton	natic System Recovery		
1006	Automatic System Recovery (ASR) action was performed Action performed was:		This message is generated when an automatic system recovery action is performed due to a hung operating system. The action performed and the
	<action></action>		date and time of the action are provided.
	Date and time of action: <date and="" time=""></date>		
Host \$	System Reset		
1007	User initiated host system control action	Information	User requested a host system control action to reboot, power off, or power cycle the system or
	Action requested was: <action></action>		another event such as thermal shutdown protection initiated a power off, operating system shutdown.

### Table 25-2.Miscellaneous Traps

### **Temperature Probe Traps**

Temperature probes help protect critical components by alerting the systems management console when temperatures become too high inside a chassis. The temperature probe traps use additional variables: sensor location, chassis location, previous state, and temperature sensor value reported in degrees Celsius.

Trap ID	Description	Severity	Cause
Temper	ature Probe Normal		
1052	Temperature sensor returned to a normal value	Information	A temperature sensor on the backplane board, system
	Sensor location: <location chassis="" in=""></location>		board, or drive carrier in the
	Chassis location: <name chassis="" of=""></name>		specified system returned to a valid range after crossing a
	Previous state was: < <i>State</i> >		failure threshold. The sensor
	If sensor type is not discrete: Temperature sensor value (in degrees Celsius): <i><reading></reading></i>		location, chassis location, previous state, and temperature sensor value are provided.
If sensor type is discrete: Discrete temperature state: <i><state></state></i>		provided.	
Temper	ature Probe Warning		
1053	Temperature sensor detected a warning value	Warning	A temperature sensor on the backplane board, system
	Sensor location: <location chassis="" in=""></location>		board, or drive carrier in the
	Chassis location: <name chassis="" of=""></name>		specified system exceeded its warning threshold. The sensor location, chassis location, previous state, and temperature sensor value are provided.
	Previous state was: < <i>State</i> >		
	If sensor type is not discrete: Temperature sensor value (in degrees Celsius): <i><reading></reading></i>		
	If sensor type is discrete: Discrete temperature state: <i><state></state></i>		

#### Table 25-3. Temperature Probe Traps

Trap ID	Description	Severity	Cause
Tempera	ature Probe Failure		
1054	Temperature sensor detected a failure value	Error	A temperature sensor on the backplane board, system board, or drive carrier in the specified system exceeded its failure threshold. The sensor
	Sensor location: <location chassis="" in=""></location>		
	Chassis location: <name chassis="" of=""></name>		
	Previous state was: < <i>State</i> >		location, chassis location,
	f sensor type is not discrete: emperature sensor value (in degrees elsius): <i><reading></reading></i>		previous state, and temperature sensor value are provided.
	If sensor type is discrete: Discrete temperature state: <i><state></state></i>		
Tempera	ature Probe Nonrecoverable		
1055	Temperature sensor detected a non-recoverable value	Error	A temperature sensor on the backplane board, system board, or drive carrier in the specified system detected an error from which it cannot recover. The sensor location, chassis location, previous state, and temperature sensor value are provided.
	Sensor location: <location chassis="" in=""></location>		
	Chassis location: <name chassis="" of=""></name>		
	Previous state was: < <i>State</i> >		
	If sensor type is not discrete: Temperature sensor value (in degrees Celsius): <i><reading></reading></i>		
	If sensor type is discrete: Discrete temperature state: <i><state></state></i>		

### Table 25-3. Temperature Probe Traps (continued)

#### **Cooling Device Traps**

Cooling device traps monitor how well a fan is functioning.

#### Table 25-4. Cooling Device Traps

Trap II	) Description	Severity	Cause
Coolin	g Device Normal		
1102	Fan sensor returned to a normal value	Information	A fan sensor reading on the
	Sensor location: <location chassis="" in=""></location>		specified system returned to a valid range after crossing a
	Chassis location: <name chassis="" of=""></name>		warning threshold. The sensor
	Previous state was: < <i>State</i> >		location, chassis location,
	<pre>Fan sensor value: <reading></reading></pre>		previous state, and fan sensor value are provided.
Coolin	g Device Warning		
1103	Fan sensor detected a warning value	Warning	A fan sensor reading in the
	Sensor location: <location chassis="" in=""></location>		specified system exceeded a warning threshold. The sensor
	Chassis location: <name chassis="" of=""></name>		location, chassis location,
	Previous state was: < <i>State</i> >		previous state, and fan sensor
	Fan sensor value: < <i>Reading</i> >		value are provided.
Coolin	g Device Failure		
1104	Fan sensor detected a failure value	Error	A fan sensor in the specified
	Sensor location: <location chassis="" in=""></location>		system detected the failure of one or more fans. The sensor
	Chassis location: <name chassis="" of=""></name>		location, chassis location,
	Previous state was: < <i>State</i> >		previous state, and fan sensor
	Fan sensor value: < <i>Reading</i> >		value are provided.
Coolin	g Device Nonrecoverable		
1105	Fan sensor detected a non-recoverable value		A fan sensor detected an error from which it cannot recover.
	Sensor location: <location chassis="" in=""></location>		The sensor location, chassis
	Chassis location: <name chassis="" of=""></name>		location, previous state, and fan sensor value are provided.
	Previous state was: < <i>State</i> >		
	Fan sensor value: < <i>Reading</i> >		

#### **Voltage Probe Traps**

Voltage probes monitor the number of volts across critical components.

#### Table 25-5.Voltage Probe Traps

voltage state: <State>

Trap ID	Description	Severity	Cause	
Voltage	e Probe Normal			
1152	Voltage sensor returned to a normal value	Information	A voltage sensor in the specified system returned to a valid range	
	Sensor location: <location chassis="" in=""></location>		after crossing a failure threshold. The sensor location, chassis	
	Chassis location: <name chassis="" of=""></name>		location, previous state, and voltage sensor value are provided.	
	Previous state was: < <i>State</i> >		× ·	
	If sensor type is not discrete: Voltage sensor value (in Volts): < <i>Reading&gt;</i>			
	If sensor type is discrete: Discrete voltage state: < <i>State</i> >			
Voltage	e Probe Warning			
1153	Voltage sensor detected a warning value	Warning	A voltage sensor in the specified system exceeded its warning	
	Sensor location: <location chassis="" in=""></location>		threshold. The sensor location, chassis location, previous state, and	
	Chassis location: <name chassis="" of=""></name>		voltage sensor value are provided.	
	Previous state was: < <i>State</i> >			
	If sensor type is not discrete: Voltage sensor value (in Volts): <i><reading></reading></i> If sensor type is discrete: Discrete			

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Table 25-5. Vo	oltage Probe Traps	(continued)
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Trap II	) Description	Severity	Cause
Voltag	e Probe Failure		
1154	Voltage sensor detected a failure value	Error	A voltage sensor in the specified system exceeded its failure
	Sensor location: <location chassis="" in=""></location>		threshold. The sensor location, chassis location, previous state, and voltage sensor value are provided.
	Chassis location: <name chassis="" of=""></name>		voltage sensor value are provided.
	Previous state was: < <i>State</i> >		
	If sensor type is not discrete: Voltage sensor value (in Volts): <i><reading></reading></i>		
	If sensor type is discrete: Discrete voltage state: < <i>State&gt;</i>		
Voltag	e Probe Nonrecoverable		
1155	Voltage sensor detected a non-recoverable value	Error	A voltage sensor in the specified system detected an error from
	Sensor location: <location chassis="" in=""></location>		which it cannot recover. The sensor location, chassis location, previous state, and voltage sensor value are
	Chassis location: <name chassis="" of=""></name>		provided.
If sensor type is not disc	Previous state was: < <i>State</i> >		
	If sensor type is not discrete: Voltage sensor value (in Volts): <i><reading></reading></i>		
	If sensor type is discrete: Discrete voltage state: < <i>State&gt;</i>		

#### **Amperage Probe Traps**

Amperage probes measure the amount of current (in amperes) that is traversing critical components.

Trap ID	Description	Severity	Cause	
Ampera	ge Probe Normal			
1202	Current sensor returned to a normal value	Information	A current sensor on the power supply for the specified system	
	Sensor location: <location chassis="" in=""></location>		returned to a valid range after crossing a failure threshold. The	
	Chassis location: <name chassis="" of=""></name>		sensor location, chassis location,	
	Previous state was: < <i>State</i> >		previous state, and current sensor	
	If sensor type is not discrete: Current sensor value (in Amps): <reading></reading>		value are provided.	
	If sensor type is discrete: Discrete current state: < <i>State&gt;</i>			
Ampera	ge Probe Warning			
1203	Current sensor detected a warning value	Warning	A current sensor on the power supply for the specified system	
	Sensor location: <location chassis="" in=""></location>		exceeded its warning threshold. The sensor location, chassis	
Previous state was: If sensor type is no Current sensor value < <i>Reading</i> >	Chassis location: <name chassis="" of=""></name>		location, previous state, and current sensor value are provided	
	Previous state was: < <i>State</i> >			
	If sensor type is not discrete: Current sensor value (in Amps): <reading></reading>			
	If sensor type is discrete: Discrete			

#### Table 25-6. Amperage Probe Traps

current state: <State>

Trap ID	Description	Severity	Cause
Ampera	ge Probe Failure		
1204	Current sensor detected a failure value	Error	A current sensor on the power supply for the specified system
	Sensor location: <location chassis="" in=""></location>		exceeded its failure threshold. The sensor location, chassis location,
	Chassis location: <name chassis="" of=""></name>		previous state, and current sensor
	Previous state was: < <i>State</i> >		value are provided.
	If sensor type is not discrete: Current sensor value (in Amps): <reading></reading>		
	If sensor type is discrete: Discrete current state: < <i>State</i> >		
Ampera	ge Probe Nonrecoverable		
1205	Current sensor detected a non-recoverable value	Error	A current sensor in the specified system detected an error from
	Sensor location: <location chassis="" in=""></location>		which it cannot recover. The sensor
	Chassis location: <name chassis="" of=""></name>		location, chassis location, previous state, and current sensor value are
	Previous state was: < <i>State</i> >		provided.
	If sensor type is not discrete: Current sensor value (in Amps): <reading></reading>		
	If sensor type is discrete: Discrete current state: < <i>State</i> >		

#### Table 25-6. Amperage Probe Traps (continued)

#### **Chassis Intrusion Traps**

Chassis intrusion traps are a security measure. Chassis intrusion means that someone is opening the cover to a system's chassis. Alerts are sent to prevent unauthorized removal of parts from a chassis.

Trap ID	Description	Severity	Cause
Chassis	Intrusion Normal		
1252	Chassis intrusion returned to normal Sensor location: <location chassis="" in=""> Chassis location: <name chassis="" of=""></name></location>	Information	specified system detected that a cover was opened while the system
	Previous state was: <i><state></state></i>		was operating but has since been replaced. The sensor location,
	Chassis intrusion state: < <i>Intrusion</i> state>		chassis location, previous state, and chassis intrusion state are provided.
Chassis	Intrusion Detected		
1254	Chassis intrusion detected Sensor location: <location chassis="" in=""> Chassis location: <name chassis="" of=""> Previous state was: <state> Chassis intrusion state: <intrusion< td=""><td>Error</td><td>A chassis intrusion sensor in the specified system detected that the system cover was opened while the system was operating. The sensor location, chassis location, previous state, and chassis intrusion state are</td></intrusion<></state></name></location>	Error	A chassis intrusion sensor in the specified system detected that the system cover was opened while the system was operating. The sensor location, chassis location, previous state, and chassis intrusion state are
	chassis intrusion state: <intrusion state=""></intrusion>		provided.

#### Table 25-7. Chassis Intrusion Traps

#### **Redundancy Unit Traps**

Redundancy means that a system chassis has more than one of certain critical components. Fans and power supplies, for example, are so important for preventing damage or disruption of a computer system that a chassis may have "extra" fans or power supplies installed. Redundancy allows a second or *nth* fan to keep the chassis components at a safe temperature when the primary fan has failed. Redundancy is normal when the intended number of critical components are operating. Redundancy is degraded when a component fails but others are still operating. Redundancy is lost when the number of components functioning falls below the redundancy threshold.

The number of devices required for full redundancy is provided as part of the trap message when applicable for the redundancy unit and the platform. For more details on redundancy computation, please refer to the respective platform documentation.

#### Table 25-8. Redundancy Unit Traps

Trap ID	Description	Severity	Cause
Redunda	ancy Normal		
1304	Redundancy regained	Information	A redundancy sensor in the specified
	Redundancy unit: < <i>Redundancy</i> location in chassis>		system detected that a "lost" redundancy device has been reconnected or replaced; full redundancy is in effect.
	Chassis location: <i><name i="" of<=""> <i>chassis</i>&gt;</name></i>		The redundancy unit location, chassis location, and previous redundancy state
	Previous redundancy state was: < <i>State</i> >		are provided.
	Number of devices required for full redundancy: < <i>Number</i> >		
Redunda	ancy Degraded		
1305	Redundancy degraded	Warning	A redundancy sensor in the specified
	Redundancy unit: <redundancy location in chassis&gt;</redundancy 		system detected that one of the components of the redundancy unit has failed but the unit is still redundant.
	Chassis location: < <i>Name of</i> chassis>		The redundancy unit location, chassis location, and previous redundancy state
	Previous redundancy state was: < <i>State</i> >		are provided.
	Number of devices required for full redundancy: < <i>Number</i> >		
Redunda	ancy Lost		
1306	Redundancy lost	Warning or	A redundancy sensor in the specified
	Redundancy unit: <redundancy location in chassis&gt;</redundancy 	Error (depending on	
	Chassis location: < <i>Name of</i> chassis>	the number of units that are functional)	been disconnected, has failed, or is not present. The redundancy unit location, chassis location, and previous
	Previous redundancy state was: < <i>State</i> >		redundancy state are provided.
	Number of devices required for full redundancy: < <i>Number</i> >		

#### **Power Supply Traps**

Power supply traps provide status and warning information for power supplies present in a particular chassis.

Trap ID	Description	Severity	Cause
Power S	upply Normal		
1352	Power supply returned to normal Sensor location: <i><location i="" in<=""> <i>chassis&gt;</i></location></i>	Information	A power supply has been reconnected or replaced. The sensor location, chassis location, previous state, and additional
	Chassis location: <name chassis="" of=""></name>		information about the power supply event are provided.
	Previous state was: < <i>State</i> >		
	Power Supply type: <type of<br="">power supply&gt;</type>		
	<additional information="" power="" status="" supply=""></additional>		
	<pre>If in configuration error state: Configuration error type: <type of configuration error&gt;</type </pre>		
Power S	upply Warning		
1353	Power supply detected a warning	Warning	A power supply sensor has detected a
	Sensor location: < <i>Location in</i> chassis>		warning condition. The sensor location, chassis location, previous state, and
	Chassis location: <name chassis="" of=""></name>		additional power supply status information are provided.
	Previous state was: < <i>State</i> >		
	Power Supply type: <type of<br="">power supply&gt;</type>	:	
	<additional information="" power="" status="" supply=""></additional>		
	<pre>If in configuration error state: Configuration error type: <type of configuration error&gt;</type </pre>		

#### Table 25-9. Power Supply Traps

Trap ID	Description	Severity	Cause
Power S	Supply Failure		
1354	Power supply detected a failure Sensor location: <location in<br="">chassis&gt; Chassis location: <name of<br="">chassis&gt; Previous state was: <state></state></name></location>	Етгог	A power supply has been disconnected or has failed. The sensor location, chassis location, previous state, and additional information about the power supply event are provided.
	Power Supply type: <type of<br="">power supply&gt;</type>		
<i>information&gt;</i> If in configuration error s	<additional power="" status<br="" supply="">information&gt;</additional>		
	<pre>If in configuration error state: Configuration error type: <type of configuration error&gt;</type </pre>		

#### **Memory Device Traps**

Memory device messages provide status and warning information for memory modules present in a particular system. Memory devices determine health status by counting the number of ECC memory corrections.



**NOTE:** A value of failure or non-recoverable does not indicate a system failure or loss of data, but rather that the specified system exceeded the specified ECC correction threshold. Although the system continues to function, you should perform system maintenance as described in Table 25-10.

Table 25-10. Memory Device Messages

Trap ID	Description	Severity	Cause
1403	Memory device status is < <i>status</i> >	Warning	A memory device correction rate
	Memory device location: <location chassis="" in=""></location>		exceeded an acceptable value. The memory device status and location are provided.
	Possible memory module event cause: <list causes="" of=""></list>		pionaea.

Trap ID	Description	Severity	Cause
1404	Memory device status is <i><status></status></i> Memory device location: <i><location chassis="" in=""></location></i> Possible memory module event cause: <i><list causes="" of=""></list></i>	Error	A memory device correction rate exceeded an acceptable value, a memory spare bank was activated, or a Uncorrectable Memory Event occurred. The system continues to function normally (except for a Uncorrectable Memory Event). Clear the memory error on Uncorrectable Memory Event. Replace the memory module identified in the message during the system's next scheduled maintenance. The memory device status and location are provided.

 Table 25-10.
 Memory Device Messages (continued)

#### **Fan Enclosure Traps**

Some systems are equipped with a protective enclosure for fans. Fan enclosure traps monitor enclosures for whether foreign objects are present and for how long a fan enclosure is absent from a chassis.

Trap ID	Description	Severity	Cause
Fan Enc	losure Insertion		
1452	Fan enclosure inserted into system	A fan enclosure has been inserted into	
	Sensor location: <location chassis="" in=""></location>		the specified system. The sensor location and chassis location are provided.
	Chassis location: <i><name i="" of<=""> chassis&gt;</name></i>	provided.	
Fan Enc	losure Removal		
1453	Fan enclosure removed from system	Warning	A fan enclosure has been removed from
	Sensor location: <location chassis="" in=""></location>		the specified system. The sensor location and chassis location are
	Chassis location: <i><name i="" of<=""> chassis&gt;</name></i>		provided.
Fan Enc	losure Extended Removal		
1454	Fan enclosure removed from system for an extended amount of time	Error	A fan enclosure has been removed from the specified system for a user-definable
	Sensor location: <location chassis="" in=""></location>		length of time. The sensor location and chassis location are provided.
	Chassis location: <name chassis="" of=""></name>	•	

#### Table 25-11. Fan Enclosure Traps

#### **AC Power Cord Traps**

The AC power cord sensor monitors the presence of AC power for an AC power cord. AC power cord traps provide status and warning information for power cords that are part of an AC power switch, if your system supports AC switching.

Trap ID	Description	Severity	Cause
AC Pow	er Cord No Power Nonredundant		
1501	AC power cord is not being monitored	Information	The AC power cord status is not being monitored. This occurs when a system's
	chassis> to nonredundant	expected AC power configuration is set to <b>nonredundant</b> . The sensor location and chassis location information are	
	Chassis location: <name chassis<="" of="" td=""><td>&gt;</td><td>provided.</td></name>	>	provided.
AC Pow	er Cord Normal		
1502	AC power has been restored	Information	An AC power cord that did not have
	Sensor location: <location chassis="" in=""></location>		AC power has had the power restored. The sensor location and chassis location
	Chassis location: <name chassis<="" of="" td=""><td>&gt;</td><td>information are provided.</td></name>	>	information are provided.
AC Pow	er Cord Failure		
1504	AC power has been lost	Error	An AC power cord has lost its power.
	Sensor location: <location chassis="" in=""></location>		The sensor location and chassis location information are provided.
	Chassis location: <name chassis<="" of="" td=""><td>&gt;</td><td></td></name>	>	

#### Table 25-12. AC Power Cord Traps

#### **Hardware Log Traps**

Hardware logs provide hardware status messages to systems management software. On certain systems, the hardware log is implemented as a circular queue. When the log becomes full, the oldest status messages are overwritten when new status messages are logged. On some systems, the log is not circular. On these systems, when the log becomes full, subsequent hardware status messages are lost. Hardware log sensor messages provide status and warning information about the noncircular logs that may fill up, resulting in lost status messages.

#### Table 25-13. Hardware Log Traps

Trap ID	Description	Severity	Cause	
Hardwa	re Log Normal			
1552	Log size is no longer near or at capacity	Information	The hardware log on the specified system is no longer near or at its	
	Log type: <log type=""></log>	ype: <log type=""> capacity, us clearing the information</log>		
Hardwa	re Log Warning			
1553	Log size is near or at capacity	Warning	The size of a hardware log on the	
	Log type: <log type=""></log>		specified system is near or at the capacity of the hardware log. The log type information is provided.	
Hardwa	re Log Full			
1554	Log size is full	Error	The size of a hardware log on the	
	Log type: <log type=""></log>		specified system is at the capacity of the hardware log. The log type information is provided.	

#### **Processor Device Status Traps**

The BMC on some systems reports the status of processor devices. Processor device status traps provide status and warning information for processor devices present in a system with a BMC that reports the status of processor devices.

Table 25-14.	Processor Device Status	Traps
--------------	-------------------------	-------

Trap ID	Description	Severity	Cause
Process	or Device Status Normal		
1602	Processor sensor returned to a normal value	Information	A processor sensor in the specified system transitioned back to a normal
	Sensor Location: <location chassis="" in=""></location>		state. The sensor location, chassis location, previous state and processor
	Chassis Location: <i><name i="" of<=""> chassis&gt;</name></i>		sensor status are provided.
	Previous state was: <i><state></state></i>		
	Processor sensor status: <status></status>	•	

Trap ID	Description	Severity	Cause		
Process	or Device Status Warning				
1603	Processor sensor detected a warning value	Warning	A processor sensor in the specified system is in a throttled state. The		
	Sensor Location: <location chassis="" in=""></location>		sensor location, chassis location, previous state and processor sensor status are provided		
	Chassis Location: <name chassis<="" of="" td=""><td>3&gt;</td><td>status are provided.</td></name>	3>	status are provided.		
	Previous state was: <i><state></state></i>				
	Processor sensor status: <i><status></status></i>				
Process	or Device Status Failure				
1604	Processor sensor detected a failure value	Error	A processor sensor in the specified system is disabled, has a configuration		
	Sensor Location: <location chassis="" in=""></location>		error, or experienced a thermal trip. The sensor location, chassis location, previous state and processor sensor		
	Chassis Location: <name chassis<="" of="" td=""><td>3&gt;</td><td>status are provided.</td></name>	3>	status are provided.		
	Previous state was: <i><state></state></i>		•		
	Processor sensor status: <status< td=""><td>s&gt;</td><td></td></status<>	s>			

#### Table 25-14. Processor Device Status Traps

#### **Pluggable Device Traps**

Server Administrator monitors the addition and removal of pluggable devices such as memory cards. Device traps provide information about the addition and removal of such devices.

Trap ID	Description	Severity	Cause
Pluggab	le Device Addition		
1651	Device added to system	Information	A device was added to the specified
	Device Location: <location chassis="" in=""></location>		system. The device location, chassis location, and additional event details, if available, are provided.
	Chassis Location: <name chassis<="" of="" td=""><td>&gt;</td><td>available, are provided.</td></name>	>	available, are provided.
	Additional Details: <additional details for the events&gt;</additional 		
Pluggab	le Device Removal		
1652	Device removed from system	Information	A device was removed from the
	Device Location: <location chassis="" in=""></location>		specified system. The device location, chassis location, and additional event details if quailable, are provided
	Chassis Location: <name chassis<="" of="" td=""><td>&gt;</td><td>details, if available, are provided.</td></name>	>	details, if available, are provided.
	Additional Details: <additional details for the events&gt;</additional 		
Pluggab	le Device Configuration Error		
1653	Device configuration error detected	Error	A configuration error was detected for a
	Device Location: <location chassis="" in=""></location>		pluggable device in the specified system. The device may have been added to the system incorrectly. The
	Chassis Location: <name chassis<="" of="" td=""><td>&gt;</td><td>device location, chassis location, and</td></name>	>	device location, chassis location, and
	Additional Details: <additional details for the events&gt;</additional 		additional event details, if available, are provided.

#### Table 25-15. Pluggable Device Traps

#### **Battery Traps**

The BMC on some systems reports the status of batteries. Battery traps provide status and warning information for batteries present in a system with a BMC that reports the status of batteries.

Trap ID	Description	Severity	Cause
	•	Seventy	Cause
Battery	Normal		
1702	Battery sensor returned to a normal value	Informational	A battery sensor in the specified system detected that a battery transitioned
	Sensor Location: <location chassis="" in=""></location>		back to a normal state. The sensor location, chassis location, previous
	Chassis Location: <name chassis="" of=""></name>		state, and battery sensor status are provided.
	Previous state was: <state></state>		
	Battery sensor status: <status></status>		
Battery	Warning		
1703	Battery sensor detected a warning value	Warning	A battery sensor in the specified system detected that a battery is in a predictive
	Sensor Location: <location chassis="" in=""></location>		failure state. The sensor location, chassis location, previous state, and battery sensor status are provided.
	Chassis Location: <name chassis="" of=""></name>		battery sensor status are provided.
	Previous state was: <state></state>		
	Battery sensor status: <status></status>		
Battery	Failure		
1704	Battery sensor detected a failure value	Critical	A battery sensor in the specified system detected that a battery has failed. The
	Sensor Location: <location chassis="" in=""></location>		sensor location, chassis location, previous state, and battery sensor
	Chassis Location: <name chassis="" of=""></name>		status are provided.
	Previous state was: <state></state>		
	Battery sensor status: <status></status>		

#### Table 25-16. Battery Traps

## **RAC Traps**

This section describes the traps that are generated by the SNMP agent of the Remote Access Controller (RAC). All of the enterprise-specific traps documented in this section belong to the MIB enterprise identified by OID 1.3.6.1.4.1.674.10892.2 and are sent with all of the trap variables documented in the section "Traps". The trap variables are sent in the order in which they are listed.

Trap ID	Name	Description	Severity	Category	Cause	Supported by RAC Platform
0	CodeStart	SNMP agent is initializing itself	Information	Status	RAC power on or reset.	All
1	Authentication Failure	Request received with an invalid community name	Critical	Error	SNMP request with an invalid community name.	All

#### Table 25-17. Generic Traps

#### Table 25-18. Enterprise-specific Traps

Trap ID	Name	Description	Severity	Category	Cause	Supported by RAC Platform
1001	alertDrscTest TrapEvent	The RAC generated a test trap event in response to a user request	Information	Status	A test SNMP trap generated by a RAC.	All
1002	alertDrscAuth Error	RAC Authentication failures during a time period have exceeded a threshold	Minor	Error	RAC login failure caused by authentication failure, number of concurrent logins exceed limit, or permission denied.	All
1003	alertDrscLost ESM	The RAC cannot communicate with the baseboard management controller (ESM)	Critical	Error	RAC lost communication with ESM.	Dell Remote Access Controller (DRAC) III
1004	alertDrscFound ESM	The RAC is communicating normally with the baseboard management controller (ESM)	Information	Error	RAC recovered communication with ESM.	DRAC III

Trap ID	Name	Description	Severity	Category	Cause	Supported by RAC Platform
1005	alertDrscPower Off	The RAC has detected a system power state change to powered-off	Critical	Error	RAC detected a system power state change to power-off.	DRAC III
1006	alertDrscPower On	The RAC has detected a system power state change to powered-on	Information	Error	RAC detected a system power state change to power-on.	DRAC III
1007	alertDrsc Watchdog Expired	The RAC has detected that the system watchdog has expired indicating a system hang	Critical	Event	RAC has detected the system watchdog expired (normally indicating a system hang).	DRAC III
1008	alertDrscBatt Low	The RAC Battery charge is below 25% indicating that the battery may only be able to power the DRSC for 8-10 minutes	Minor	Error	RAC detected its battery charge is below 25% full.	DRAC III
1009	alertDrscTemp Normal	The RAC Temperature probe has returned to a normal value	Information	Status	RAC temperature probe reading returned to normal.	DRAC III
1010	alertDrscTemp Warning	The RAC Temperature probe has detected a Warning value	Minor	Status	RAC temperature probe reading exceeded warning threshold.	DRAC III
1011	alertDrscTemp Critical	The RAC Temperature probe has detected a failure (or critical) value	Critical	Error	RAC temperature probe reading exceeded critical threshold.	DRAC III
1012	alertDrscVolt Normal	The RAC voltage has returned to a normal value	Information	Error	RAC voltage probe reading returns to normal.	DRAC III

Trap ID	Name	Description	Severity	Category	Cause	Supported by RAC Platform
1013	alertDrscVolt Warning	The RAC voltage probe has detected a warning value	Minor	Error	RAC voltage probe reading exceeded warning threshold.	DRAC III
1014	alertDrscVolt Critical	The RAC voltage probe has detected a failure (or critical) value	Critical	Error	RAC voltage probe reading exceeded critical threshold.	DRAC III
1015	alertDrscSEL Warning	The RAC has detected a new event in the System Event Log with Severity: Warning	Major	Error	RAC detected a new system event log with warning severity (detailed log info is in drsAlert Message varbind).	All
1016	alertDrscSEL Critical	The RAC has detected a new event in the System Event Log with Severity: Critical	Critical	Error	RAC detected a new system event log with critical severity (detailed log info is in drsAlert Message varbind).	All
1017	alertDrscSEL 80 percentFull	The RAC system event log is 80% full	Major	Status	RAC detected system event log is 80% full.	All
1018	alertDrscSEL 90 percentFull	The RAC system event log is 90% full	Major	Status	RAC detected system event log is 90% full.	All
1019	alertDrscSEL 100 percentFull	The RAC system event log is 100% full	Major	Status	RAC detected system event log is 100% full.	All
1020	alertDrscSEL Normal	The RAC has detected a new event in the System Event Log with Severity: Normal	Information	Error	RAC detected a new system event log with normal severity (detailed log info is in drsAlert Message varbind).	All

#### Table 25-18. Enterprise-specific Traps (continued)

## **BMC** Traps

The BMC monitors the system for critical events by communicating with various sensors on the system board and by sending alerts and log events when certain parameters exceed their preset thresholds. All of the traps documented in this section belong to the MIB enterprise identified by OID 1.3.6.1.4.1.3183.1.1.1.

Table 25-	19.	BMC	Traps
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Trap ID	Description	Severity
262402	Generic Critical Fan Failure	Critical
262530	Generic Critical Fan Failure Cleared	Informational
131330	Under-Voltage Problem (Lower Critical - going low)	Critical
131458	Under-Voltage Problem Cleared	Informational
131841	Generic Critical Voltage Problem	Critical
131840	Generic Critical Voltage Problem Cleared	Informational
65792	Under-Temperature Warning (Lower non-critical, going low)	Warning
65920	Under-Temperature Warning Cleared	Informational
65794	Under-Temperature Problem (Lower Critical - going low)	Critical
65922	Under-Temperature Problem Cleared	Informational
65799	Over-Temperature warning (Upper non-critical, going high)	Minor
65927	Over-Temperature warning Cleared	Informational
65801	Over-Temperature Problem (Upper Critical - going high)	Critical
65929	Over-Temperature Problem Cleared	Informational
131328	Under-Voltage Warning (Lower Non Critical - going low)	Warning
131456	Under-Voltage Warning Cleared	Informational
131330	Under-Voltage Problem (Lower Critical - going low)	Critical
131458	Under-Voltage Problem Cleared	Informational
131335	Over-Voltage Warning (Upper Non Critical - going high)	Warning
131463	Over-Voltage Warning Cleared	Informational
131337	Over-Voltage Problem (Upper Critical - going high)	Critical
131465	Over-Voltage Problem Cleared	Informational
131841	Generic Critical Voltage Problem	Critical
131840	Generic Critical Voltage Problem Cleared	Informational
356096	Chassis Intrusion - Physical Security Violation	Critical

#### Table 25-19. BMC Traps *(continued)*

Trap ID	Description	Severity
356224	Chassis Intrusion (Physical Security Violation) Event Cleared	Informational
262400	Generic Predictive Fan Failure (predictive failure asserted)	Minor
262528	Generic Predictive Fan Failure Cleared	Informational
262402	Generic Critical Fan Failure	Critical
262530	Generic Critical Fan Failure Cleared	Informational
264962	Fan redundancy has been degraded	Warning
264961	Fan Redundancy Lost	Critical
264960	Fan redundancy Has Returned to Normal	Informational
2715392	Battery Low (Predictive Failure)	Warning
2715520	Battery Low (Predictive Failure) Cleared	Informational
2715393	Battery Failure	Critical
2715521	Battery Failure Cleared	Informational
487169	CPU Thermal Trip (Over Temperature Shutdown)	Critical
487297	CPU Thermal Trip (Over Temperature Shutdown) Cleared	Informational
487168	CPU Internal Error	Critical
487296	CPU Internal Error Cleared	Informational
487173	CPU Configuration Error	Critical
487301	CPU Configuration Error Cleared	Informational
487175	CPU Presence (Processor Presence detected)	Informational
487303	CPU Not Present (Processor Not Present)	Critical
487170	CPU BIST (Built In Self Test) Failure	Critical
487298	CPU BIST (Built In Self Test) Failure Cleared	Informational
487176	CPU Disabled (Processor Disabled)	Critical
487304	CPU Enabled (Processor Enabled)	Informational
487178	CPU Throttle (Processor Speed Reduced)	Warning
487306	CPU Throttle Cleared (Normal Processor Speed)	Informational
527106	Power Supply Redundancy Degraded	Warning
527105	Power Supply Redundancy Lost	Critical
527104	Power Supply Redundancy Has Returned to Normal	Informational
552704	Power Supply Inserted	Informational

Table 25-19.	BMC	Traps	(continued)

Trap ID	Description	Severity
552832	Power Supply Removed	Warning
552705	Power Supply Failure	Critical
552833	Power Supply Failure Cleared	Informational
552706	Power Supply Warning	Warning
552834	Power Supply Warning Cleared	Informational
552707	Power Supply AC Lost	Critical
552835	Power Supply AC Restored	Informational
789249	Memory Redundancy Has Been Lost	Critical
789248	Memory redundancy Has Returned to Normal	Informational
1076994	System Event Log (SEL) Cleared	Informational
1076996	System Event Log (SEL) Full (Logging Disabled)	Critical
2322176	ASR (Automatic System Recovery) Timer Expired	Critical
2322177	ASR (Automatic System Recovery) Reset Occurred	Critical
2322178	ASR (Automatic System Recovery) Power Down Occurred	Critical
2322179	ASR (Automatic System Recovery) Power Cycle Occurred	Critical

# 26

## **Storage Management Alert Reference**

Storage Management's alert or event management features let you monitor the health of storage resources such as controllers, connectors, array disks, and virtual disks.

## Alert Monitoring and Logging

The Storage Management Service performs alert monitoring and logging. By default, the Storage Management Service starts when the managed system starts up. If you stop the Disk Management Service, then alert monitoring and logging stops. Alert monitoring does the following:

- Updates the status of the storage object that generated the alert.
- Propagates the storage object's status to all the related higher objects in the storage hierarchy. For example, the status of a lower-level object will be propagated up to the status displayed on the Health tab for the top-level storage object.
- Logs an alert into the Alert log and Microsoft<sup>®</sup> Windows<sup>®</sup> application log.
- Sends an Simple Network Management Protocol (SNMP) trap if the operating system's SNMP service is installed and enabled.

**NOTE:** Storage Management does not log alerts regarding the data I/O path. These alerts are logged by the respective RAID drivers in the system alert log.

## **Viewing Alerts**

Storage Management generates alerts that are added to the Windows application alert log and to the Server Administrator Alert log. To view these alerts in Server Administrator:

- 1 Select the System object in the tree view.
- 2 Select the Logs tab.
- **3** Select the **Alert** subtab.

**NOTE:** You can also view these alerts in the Windows Event Viewer. Every alert consists of the following:

- Severity Shows the severity of alert.
- Date and Time Date and time when Storage Management logged the alert.
- Description A brief description of the alert. To expand or collapse the alert description, click the Description column heading.

## **Alert Severity Levels**

Each alert message in the Storage Management alert log has a severity level. The severity level is displayed in the **Severity** field of the alert message. The severity level indicates the nature of the alert.

The alert severity levels are as follows:

Alert Severity	Component Status
OK/Normal/Informational	No action is required. The alert is provided for informational purposes and does not indicate an error condition. For example, the alert may indicate the normal start or stop of an operation.
Warning/Non-critical	A component requires attention. This alert indicates a potential problem, but does not necessarily mean that the system has currently lost data or is nonfunctional. For example, a Warning/Non-critical alert may indicate that a component (such as a temperature probe in an enclosure) has crossed a warning threshold.
Critical/Failure/Error	A component has either failed or failure is imminent. This alert indicates a serious problem such as data loss or a loss of function. For example, a Critical/Failure/Error alert may indicate that an array disk has failed.

Table 26-1. Storage Management Alert Severity

## **SNMP Support for Storage Management Alerts**

By default, Storage Management installs SNMP trap forwarding support. For this support to function, you should have SNMP installed on the managed system prior to installing Storage Management.

**NOTE:** For more information on installation requirements and SNMP, see the Server Administrator documentation.

#### **SNMP Trap Forwarding**

The Storage Management alerts are displayed in the Server Administrator alert log and are forwarded to the Windows application alert log. If you have SNMP installed on the managed system (and the SNMP service is running), the Storage Management alerts in the Windows application alert log will be forwarded as SNMP traps. In order for these traps to be viewable, however, a target system or application must be configured to receive these traps. SNMP traps that are generated by Storage Management can be viewed in any standard SNMP-compatible enterprise management console.

The Windows SNMP service must be configured to forward the SNMP traps to the target system or application. When forwarding to an application, the application should also be configured to receive the SNMP traps. The IT Assistant application is already configured to receive the SNMP traps generated by Storage Management.

See your Windows operating system documentation for information on configuring the operating system to forward SNMP traps. This information may be located under such topics as "setting up SNMP" or "SNMP traps." When configuring SNMP for Windows, be sure that the SNMP traps are forwarded to the correct server. For information on configuring an application to receive SNMP traps, see the documentation for that application.

#### **SNMP Trap Definitions**

The Storage Management management information base (MIB) defines the SNMP traps that Storage Management generates. These traps correspond to the alerts documented in the "Alert Descriptions and Corrective Actions" section. The MIB is located in ..\sm\mibs\dcstorag.mib, a subdirectory of the Storage Management installation directory.

**NOTE:** Storage Management supports trap forwarding on both 32-bit and 64-bit operating systems.

#### **SNMP Trap Variables**

The Storage Management SNMP traps use a set of variables that are included with every trap. These variables are the following:

- messageIDEvent
- descriptionEvent
- locationEvent
- objectNameEvent
- objectOIDEvent
- objectNexusEvent
- currentStatusEvent
- previousStatusEvent

### **Viewing SNMP Traps**

SNMP traps that are generated by Storage Management can be viewed in any standard SNMP-compatible enterprise management console. These traps are defined in the Storage Management MIB. These traps correspond to the alerts documented in the "Alert Descriptions and Corrective Actions" section. For more information on the MIB and its structure, as well as a change history of the SNMP traps, see the "Introduction" section. For more information on configuring SNMP, see "SNMP Support for Storage Management Alerts."

## **Alert Descriptions and Corrective Actions**

The following sections describe alerts generated by the Redundant Array of Independent disks (RAID) or Small Computer System Interface (SCSI) controllers supported by Storage Management. The alerts are displayed in the Server Administrator Alert subtab or through Windows Event Viewer. These alerts can also be forwarded as SNMP traps to other applications.

SNMP traps are generated for the alerts listed in the following sections. These traps are included in the Storage Management MIB. The SNMP traps for these alerts use all of the SNMP trap variables. For more information on SNMP support and the MIB, see "SNMP Support for Storage Management Alerts."

To locate an alert, scroll through the following table to find the alert number displayed on the Server Administrator Alert tab or search this HTML file for the alert message text or number. See "Alert Severity Levels" for more information on severity levels.

For more information regarding alert descriptions and the appropriate corrective actions, see the online help.

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2048	Device failed	Critical / Failure / Error	Cause: A storage component such as an array disk or an enclosure has failed. The failed component may have been identified by the controller while performing a task such as a rescan or a check consistency.	1054,	500
			Action: Replace the failed component. You can identify which component has failed by locating the component that has a red "X" for its status. Perform a rescan after replacing the failed component.		
2049	Array disk removed	Warning / Non-critical	Cause: A physical disk has been removed from the array. A user may have also executed the "Prepare to Remove" task. This alert can also be caused by loose or defective cables or by problems with the enclosure.	903	501
			Action: If a physical disk was removed from the array, either replace the disk or restore the original disk. You can identify which disk has been removed by locating the disk that has a red "X" for its status. Perform a rescan after replacing or restoring the disk. If a disk has not been removed from the array, then check for problems with the cables. See the online help for more information on checking the cables. Make sure that the enclosure is powered on. If the problem persists, check the enclosure documentation for further diagnostic information.		

 Table 26-2.
 Storage Management Messages

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2050	Array disk offline	Warning / Non-critical	Cause: A physical disk in the array is offline. A disk can be made offline during a Prepare to Remove operation or because a user manually put the disk offline.	903	502
			Action: Perform a rescan. You can also select the offline disk and perform a Make Online operation.		
2051	Array disk is degraded		Cause: An array disk has reported an error condition and may be degraded. The array disk may have reported the error condition in response to a consistency check or other operation.	903	503
			Action: Replace the degraded array disk. You can identify which disk is degraded by locating the disk that has a red "X" for its status. Perform a rescan after replacing the disk.		
2052	2	OK/Normal/	Cause: This alert is provided for informational purposes.	901	504
	inserted	Informational	Action: None.		
2053	Virtual disk	OK/Normal/	Cause: This alert is provided for informational purposes.	1201	505
	created	Informational	Action: None.		
2054	Virtual disk deleted	Warning / Non-critical	Cause: A virtual disk has been deleted. "Performing a Reset Configuration" may detect that a virtual disk has been deleted and generate this alert.	1203	506
			Action: None.		
2055	Virtual disk configuration	OK/Normal/ Informational	Cause: This alert is provided for informational purposes.	1201	507
	changed	anged	Action: None.		
2056	Virtual disk failed	Critical / Failure / Error	Cause: One or more physical disks included in the virtual disk have failed. If the virtual disk is non-redundant (does not use mirrored or parity data), then the failure of a single physical disk can cause the virtual disk to fail. If the virtual disk is redundant, then more physical disks have failed than can be rebuilt using mirrored or parity information.	1204	508
			Action: Create a new virtual disk and restore from a backup.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2057	Virtual disk degraded	Warning / Non-critical	Cause 1: This alert message occurs when a physical disk included in a redundant virtual disk fails. Because the virtual disk is redundant (uses mirrored or parity information) and only one physical disk has failed, the virtual disk can be rebuilt.	1203	509
			Action 1: Configure a hot spare for the virtual disk if one is not already configured. Rebuild the virtual disk. When using a PowerEdge <sup>™</sup> RAID Controller (PERC) 2/SC, 3/SC, 2/DC, 3/DCL, 3/DC, 3/QC, 4/SC, 4/DC, 4e/DC, 4/Di, 5/E or CERC ATA100/4ch controller, rebuild the virtual disk by first configuring a hot spare for the disk, and then initiating a write operation to the disk. The write operation will initiate a rebuild of the disk.		
			Cause 2: A physical disk in the array has been removed.		
			Action 2: If a physical disk was removed from the array, either replace the disk or restore the original disk. You can identify which disk has been removed by locating the disk that has a red "X" for its status. Perform a rescan after replacing the disk.		
2058	Virtual disk	OK/Normal/	Cause: This alert is provided for informational purposes.	1201	520
	check consistency started	Informational	Action: None.		
2059	Virtual disk	OK/Normal/	Cause: This alert is provided for informational purposes.	1201	521
	format started	Informational	Action: None.		
2061	Virtual disk initialization started	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	523
2062	Array disk Initialization started	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	
2063	Virtual disk reconfiguratio n started	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	525

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2064	Virtual disk rebuild started	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	526
2065	Array disk rebuild started	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	527
2067	Virtual disk check consistency	Informational ncy	Cause: The check consistency operation cancelled because a physical disk in the array has failed or because a user cancelled the check consistency operation.	1201	529
	cancelled		Action: If the physical disk failed, then replace the physical disk. You can identify which disk failed by locating the disk that has a red "X" for its status. Perform a rescan after replacing the disk. When performing a consistency check, be aware that the consistency check can take a long time. The time it takes depends on the size of the physical disk or the virtual disk.		
2070	Virtual disk initialization cancelled	ialization Informational	Cause: The virtual disk initialization cancelled because a physical disk included in the virtual disk has failed or because a user cancelled the virtual disk initialization.	1201	532
			Action: If a physical disk failed, then replace the physical disk. You can identify which disk has failed by locating the disk that has a red "X" for its status. Perform a rescan after replacing the disk. Restart the format array disk operation. Restart the virtual disk initialization.		
2074	Array Disk rebuild cancelled	OK/Normal/ Informational	Cause: A user has cancelled the rebuild operation. Action: Restart the rebuild operation.	901	536
2076	Virtual disk check consistency	neck Failure / Error onsistency	Cause: An array disk included in the virtual disk failed or there is an error in the parity information. A failed array disk can cause errors in parity information.	1204	538
	failed		Action: Replace the failed array disk. You can identify which disk has failed by locating the disk that has a red "X" for its status. Rebuild the array disk. When finished, restart the check consistency operation.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2077	Virtual disk format failed		Cause: An array disk included in the virtual disk failed.	1204	539
			Action: Replace the array disk. You can identify which array disk has failed by locating the disk that has a red "X" for its status. Rebuild the array disk. When finished, restart the virtual disk format operation.		
2079	Virtual disk initialization	Critical / Failure / Error	Cause: An array disk included in the virtual disk has failed or a user has cancelled the initialization.	1204	541
	failed		Action: If an array disk has failed, then replace the array disk.		
2080	Array disk	Critical /	Cause: The array disk has failed or is corrupt.	904	542
	initialize failed		Action: Replace the failed or corrupt disk. You can identify a disk that has failed by locating the disk that has a red "X" for its status. Restart the initialization.		
2081	Virtual disk reconfiguratio n failed	nfiguratio Failure / Error	Cause: An array disk included in the virtual disk has failed or is corrupt. A user may also have cancelled the reconfiguration.	1204	543
			Action: Replace the failed or corrupt disk. You can identify a disk that has failed by locating the disk that has a red "X" for its status. If the array disk is part of a redundant array, then rebuild the array disk. When finished, restart the reconfiguration.		
2082	Virtual disk rebuild failed	Critical / Failure / Error	Cause: An array disk included in the virtual disk has failed or is corrupt. A user may also have cancelled the rebuild.	1204	544
			Action: Replace the failed or corrupt disk. You can identify a disk that has failed by locating the disk that has a red "X" for its status. Restart the virtual disk rebuild.		
2083	Array disk rebuild failed	Critical / Failure / Error	Cause: An array disk included in the virtual disk has failed or is corrupt. A user may also have cancelled the rebuild.	904	545
			Action: Replace the failed or corrupt disk. You can identify a disk that has failed by locating the disk that has a red "X" for its status. Rebuild the virtual disk rebuild.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2085	Virtual disk check consistency completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	547
2086	Virtual disk format completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	548
2088	Virtual disk initialization completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	550
2089	Array disk initialize completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	551
2090	Virtual disk reconfiguratio n completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	552
2091	Virtual disk rebuild completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	553
2092	Array disk rebuild completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	554
2094	Predictive Failure reported.	Warning / Non-critical	Cause: The array disk is predicted to fail. Many array disks contain Self Monitoring Analysis and Reporting Technology (SMART.). When enabled, SMART monitors the health of the disk based on indications such as the number of write operations that have been performed on the disk.	903	570
			Action: Replace the array disk. Even though the disk may not have failed yet, it is strongly recommended that you replace the disk. Review the message text for additional information.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2095	data %1. The %1 indicates a	s a e th he id n	Cause: An array disk has failed, is corrupt, or is otherwise experiencing a problem. Action: Replace the array disk. Even though the disk	903	571
	substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.		may not have failed yet, it is strongly recommended that you replace the disk. Review the message text for additional information.		
2098	Global hot spare assigned		Cause: A user has assigned an array disk as a global hot spare. This alert is provided for informational purposes.	901	574
			Action: None.		
2099	Global hot spare unassigned	OK/Normal/ Informational	Cause: An array disk that was assigned as a hot spare has been unassigned and is no longer functioning as a hot spare. The array disk may have been unassigned by a user or automatically unassigned by Storage Management. Storage Management unassigns hot spares that have been used to rebuild data. Once data is rebuilt onto the hot spare, the hot spare becomes a member of the virtual disk and is no longer assigned as a hot spare. You need to assign a new hot spare to maintain data protection in this situation.	901	575
			On the PERC 2/Si, 3/Si, 3/Di, CERC SATA1.5/6ch, and Cost Effective Raid Controller (CERC) Serial Advanced Technology Attachment (SATA)1.5/2s controllers, if you use another application such as the Basic Input/Output System (BIOS) to include a hot spare in a virtual disk, then Storage Management unassigns the array disk as a hot spare. Action: Although this alert is provided for informational purposes, you may need to assign a new hot spare to the virtual disk.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2100	Temperature exceeded the maximum warning threshold	l the Non-critical m	Cause: The array disk enclosure is too hot. A variety of factors can cause the excessive temperature. For example, a fan may have failed, the thermostat may be set too high, or the room temperature may be too hot.	1053	591
			Action: Check for factors that may cause overheating. For example, verify that the enclosure fan is working. You should also check the thermostat settings and examine whether the enclosure is located near a heat source. Make sure the enclosure has enough ventilation and that the room temperature is not too hot. See the enclosure documentation for more diagnostic information.		
2101	Temperature dropped below the minimum warning threshold	Warning / Non-critical	Cause: The array disk enclosure is too cool.	1053	592
			Action: Check whether the thermostat setting is too low and whether the room temperature is too cool.		
2102	Temperature exceeded the maximum failure		Cause: The array disk enclosure is too hot. A variety of factors can cause the excessive temperature. For example, a fan may have failed, the thermostat may be set too high, or the room temperature may be too hot.	1054	593
	threshold		Action: Check for factors that may cause overheating. For example, verify that the enclosure fan is working. You should also check the thermostat settings and examine whether the enclosure is located near a heat source. Make sure the enclosure has enough ventilation and that the room temperature is not too hot. See the enclosure documentation for more diagnostic information.		
2103	Temperature	Critical /	Cause: The array disk enclosure is too cool.	1054	594
	dropped below the minimum failure threshold	ure	Action: Check whether the thermostat setting is too low and whether the room temperature is too cool.		
2104	Controller	OK/Normal/	Cause: This alert is provided for informational purposes.	1151	581
	battery is reconditioning	Informational	Action: None.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2105	Controller battery recondition is completed	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	582
2106	Smart FPT exceeded	Warning / Non-critical	Cause: A disk on the specified controller has received a SMART alert (predictive failure) indicating that the disk is likely to fail in the near future.	903	585
			Action: Replace the disk that has received the SMART alert. If the array disk is a member of a non-redundant virtual disk, then back up the data before replacing the disk. Removing an array disk that is included in a non-redundant virtual disk will cause the virtual disk to fail and may cause data loss.		
2107	Smart configuration change	Critical / Failure / Error	Cause: A disk has received a SMART alert (predictive failure) after a configuration change. The disk is likely to fail in the near future.	904	586
			Action: Replace the disk that has received the SMART alert. If the array disk is a member of a non-redundant virtual disk, then back up the data before replacing the disk. Removing an array disk that is included in a non- redundant virtual disk will cause the virtual disk to fail and may cause data loss		
2108	Smart warning	Warning / Non-critical	Cause: A disk has received a SMART alert (predictive failure). The disk is likely to fail in the near future.	903	587
			Action: Replace the disk that has received the SMART alert. If the array disk is a member of a non-redundant virtual disk, then back up the data before replacing the disk. Removing an array disk that is included in a non- redundant virtual disk will cause the virtual disk to fail and may cause data loss.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2109		twarning Warning/ erature Non-critical	Cause: A disk has reached an unacceptable temperature and received a SMART alert (predictive failure). The disk is likely to fail in the near future.	903	588
			First Action: Determine why the array disk has reached an unacceptable temperature. A variety of factors can cause the excessive temperature. For example, a fan may have failed, the thermostat may be set too high, or the room temperature may be too hot or cold. Verify that the fans in the server or enclosure are working. If the array disk is in an enclosure, you should check the thermostat settings and examine whether the enclosure is located near a heat source. Make sure the enclosure has enough ventilation and that the room temperature is not too hot. See the enclosure documentation for more diagnostic information.		
			Second Action: If you cannot identify why the disk has reached an unacceptable temperature, then replace the disk. If the array disk is a member of a non-redundant virtual disk, then back up the data before replacing the disk. Removing an array disk that is included in a non- redundant virtual disk will cause the virtual disk to fail and may cause data loss.		
2110	Smart warning degraded	ning Warning/ Non-critical	Cause: A disk is degraded and has received a SMART alert (predictive failure). The disk is likely to fail in the near future.	903	589
			Action: Replace the disk that has received the SMART alert. If the array disk is a member of a non-redundant virtual disk, then back up the data before replacing the disk. Removing an array disk that is included in a non-redundant virtual disk will cause the virtual disk to fail and may cause data loss.		
2111	Failure prediction	ediction Non-critical reshold ceeded due test - No	Cause: A disk has received a SMART alert (predictive failure) due to test conditions.	903	590
	threshold exceeded due to test - No action needed		Action: None.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2112	Enclosure was shut down		Cause: The array disk enclosure is either hotter or cooler than the maximum or minimum allowable temperature range.	854	602
			Action: Check for factors that may cause overheating or excessive cooling. For example, verify that the enclosure fan is working. You should also check the thermostat settings and examine whether the enclosure is located near a heat source. Make sure the enclosure has enough ventilation and that the room temperature is not too hot or too cold. See the enclosure documentation for more diagnostic information.		
2114	A consistency check on a virtual disk has been paused (suspended)	a Informational isk	Cause: The check consistency operation on a virtual disk was paused by a user.	1201	604
			Action: To resume the check consistency operation, right-click the virtual disk in the Storage Management tree view and select Resume Check Consistency.		
2115	A consistency check on a virtual disk has been resumed	ck on a 👘 Informational ual disk been	Cause: The check consistency operation on a virtual disk has resumed processing after being paused by a user.	1201	605
			Action: This alert is provided for informational purposes.		
2116	A virtual disk and its mirror have been split	OK/Normal/ Informational	Cause: A user has caused a mirrored virtual disk to be split. When a virtual disk is mirrored, its data is copied to another virtual disk in order to maintain redundancy. After being split, both virtual disks retain a copy of the data, although because the mirror is no longer intact, updates to the data are no longer copied to the mirror.	1201	606
			Action: This alert is provided for informational purposes.		
2117	A mirrored virtual disk has been unmirrored	OK/Normal/ Informational	Cause: A user has caused a mirrored virtual disk to be unmirrored. When a virtual disk is mirrored, its data is copied to another virtual disk in order to maintain redundancy. After being unmirrored, the disk formerly used as the mirror returns to being an array disk and becomes available for inclusion in another virtual disk. Action: This alert is provided for informational purposes.	1201	607

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2118	Change write policy	OK/Normal/ Informational	Cause: A user has changed the write policy for a virtual disk.	1201	601
			Action: This alert is provided for informational purposes.		
2120	Enclosure firmware mismatch	Warning / Non-critical	Cause: The firmware on the Expanded Memory Manager (EMM) modules is not the same version. It is required that both modules have the same version of the firmware. This alert may be caused when a user attempts to insert an EMM module that has a different firmware version than an existing module.	853	672
			Action: Download the same version of the firmware to both EMM modules.		
2121	Device returned to normal	OK/Normal/ Informational	Cause: A device that was previously in an error state has returned to a normal state. For example, if an enclosure became too hot and subsequently cooled down, then you may receive this alert.	852, 902, 952, 1002, 1052,	None
			Action: This alert is provided for informational purposes.	1152, 1202	
2122	Redundancy degraded	Warning / Non-critical	Cause: One or more of the enclosure components has failed. For example, a fan or power supply may have failed. Although the enclosure is currently operational, the failure of additional components could cause the enclosure to fail.	1305	None
			Action: Identify and replace the failed component. To identify the failed component, select the enclosure in the tree view and click the Health subtab. Any failed component will be identified with a red X on the enclosure's Health subtab. Alternatively, you can select the Storage object and click the Health subtab. The controller status displayed on the Health subtab indicates whether a controller has a failed or degraded component. See the enclosure documentation for information on replacing enclosure components and for other diagnostic information.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2123	Redundancy lost	Warning / Non-critical	Cause: A virtual disk or an enclosure has lost data redundancy. In the case of a virtual disk, one or more array disks included in the virtual disk have failed. Due to the failed array disk or disks, the virtual disk is no longer maintaining redundant (mirrored or parity) data. The failure of an additional array disk will result in lost data. In the case of an enclosure, more than one enclosure component has failed. For example, the enclosure may have suffered the loss of all fans or all power supplies.	1306	None
			Action: Identify and replace the failed components. To identify the failed component, select the Storage object and click the Health subtab. The controller status displayed on the Health subtab indicates whether a controller has a failed or degraded component. Click the controller that displays a Warning or Failed status. This action displays the controller Health subtab which displays the status of the individual controller components. Continue clicking the components with a Warning or Health status until you identify the failed component. See the online help for more information. See the enclosure documentation for information on replacing enclosure components and for other diagnostic information.		
2124	Redundancy normal	OK/Normal/ Informational	Cause: Data redundancy has been restored to a virtual disk or an enclosure that previously suffered a loss of redundancy.	1304	None
			Action: This alert is provided for informational purposes.		
2126	SCSI sense sector reassign	Warning / Non-critical	Cause: A sector of the disk is corrupted and data cannot be maintained on this portion of the disk.	903	None
			Action: If the disk is part of a non-redundant virtual disk, then replace the disk. Any data residing on the corrupt portion of the disk may be lost and you may need to restore from backup. If the disk is part of a redundant virtual disk, then any data residing on the corrupt portion of the disk will be reallocated elsewhere in the virtual disk.		

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2127	Background initialization	OK/Normal/ Informational	Cause: Background initialization of a virtual disk has started. This alert is provided for informational purposes.	1201	683
	started		Action: None.		
2128	Background initialization cancelled	OK/Normal/ Informational	Cause: Background initialization of a virtual disk has been cancelled. A user or the firmware may have stopped background initialization.	1201	684
			Action: None.		
2129	Background initialization	Critical / Failure / Error	Cause: Background initialization of a virtual disk has failed.	1204	685
	failed		Action: None.		
2130	Background initialization completed	OK/Normal/ Informational	Cause: Background initialization of a virtual disk has completed. This alert is provided for informational purposes.	ls 1201	686
			Action: None.		
2131	Firmware version	rsion Non-critical	Cause: The firmware on the controller is not a supported version.	753	None
	mismatch		Action: Install a supported version of the firmware. If you do not have a supported version of the firmware available, it can be downloaded from the Dell <sup>™</sup> support site at <b>support.dell.com</b> . If you do not have a supported version of the firmware available, check with your support provider for information on how to obtain the most current firmware.		
2132	Driver version	0	Cause: The controller driver is not a supported version.	753	None
	mismatch	nismatch Non-critical	Action: Install a supported version of the driver. If you do not have a supported driver version available, it can be downloaded from the Dell support site at <b>support.dell.com</b> . If you do not have a supported version of the driver available, check with your support provider for information on how to obtain the most current driver.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2135	Array Manager is installed on		Cause: Storage Management has been installed on a system that has an Array Manager installation.	103	None
	the system		Action: Installing Storage Management and Array Manager on the same system is not a supported configuration. Uninstall either Storage Management or Array Manager.		
2136	Virtual disk initialization	OK/Normal/ Informational	Cause: Virtual disk initialization is in progress. This alert is provided for informational purposes.	1201	None
			Action: None.		
2137	Communicati on timeout	Warning / Non-critical	Cause: The controller is unable to communicate with an enclosure. There are several reasons why communication may be lost. For example, there may be a bad or loose cable. An unusual amount of I/O may also interrupt communication with the enclosure. In addition, communication loss may be caused by software, hardware, or firmware problems, bad or failed power supplies, and enclosure shutdown.	853	688, 610, 611
			When viewed in the Alert Log, the description for this event displays several variables: controller name, enclosure name, type of communication problem, return code, and SCSI status.		
			Action: Check for problems with the cables. See the online help for more information on checking the cables. You should also check to see if the enclosure has degraded or failed components. To do so, select the enclosure object in the tree view and click the Health subtab. The Health subtab displays the status of the enclosure components. Verify that the controller has supported driver and firmware versions installed and that the enclosure management modules (EMMs) are each running the same version of supported firmware.		
2138	Enclosure alarm enabled	OK/Normal/ Informational	Cause: A user has enabled the enclosure alarm. This alert is provided for informational purposes.	851	676
			Action: None.		
2139	Enclosure alarm disabled	OK/Normal/ Informational	Cause: A user has disabled the enclosure alarm. Action: None.	851	677

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2140	Dead disk segments restored	OK/Normal/ Informational	Cause: Disk space that was formerly "dead" or inaccessible to a redundant virtual disk has been restored. This alert is provided for informational purposes.	1201	None
			Action: None.		
2141	Array disk dead segments recovered	OK/Normal/ Informational	Cause: Portions of the array disk that were formerly inaccessible have been recovered. Any data residing on these dead segments has been lost. This alert is provided for informational purposes.	901	None
			Action: None.		
2142	rebuild rate	OK/Normal/ Informational	Cause: A user has changed the controller rebuild rate. This alert is provided for informational purposes.	751	680
	has changed		Action: None.		
2143	Controller alarm enabled	OK/Normal/ Informational	Cause: A user has enabled the controller alarm. This alert is provided for informational purposes.	751	678
			Action: None.		
2144		OK/Normal/ Informational	Cause: A user has disabled the controller alarm. This alert is provided for informational purposes.	751	679
			Action: None.		
2145	Controller battery low	Warning / Non-critical	Cause: The controller battery charge is low. On batteries that automatically recharge or recondition, this alert may indicate that the recharge limit has been reached.	1153	580
			Action: Recondition the battery. See the online help for more information		
2146	Bad block	Warning /	Cause: A portion of an array disk is damaged.	753	691
	replacement error	Non-critical	al Action: See the Storage Management online help or the Dell OpenManage™ Server Administrator Storage Management User's Guide for more information.		
2147	Bad block sense error	Warning / Non-critical	Cause: A portion of an array disk is damaged. See the online help for more information.	753	691
			Action: See the online help for more information.		
2148	Bad block medium error	Warning / Non-critical	Cause: A portion of an array disk is damaged. See the online help for more information.	753	691
			Action: See the online help for more information.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2149	Bad block extended	Warning / Non-critical	Cause: A portion of an array disk is damaged. See the online help for more information.	753	691
	sense error		Action: See the online help for more information.		
2150	Bad block extended	Warning / Non-critical	Cause: A portion of an array disk is damaged. See the online help for more information.	753	691
	medium error		Action: See the online help for more information.		
2151	Asset tag changed	OK/Normal/ Informational	Cause: A user has changed the enclosure asset tag. This alert is provided for informational purposes.	851	None
			Action: None.		
2152	Asset name changed		Cause: A user has changed the enclosure asset name. This alert is provided for informational purposes.	851	None
			Action: None.		
2153	Service tag changed	Warning / Non-critical	Cause: An enclosure service tag was changed. In most circumstances, this service tag should only be changed by Dell support or your service provider.	853	None
			Action: Ensure that the tag was changed under authorized circumstances.		
2154	Maximum temperature probe warning	OK/Normal/ Informational	Cause: A user has changed the value for the maximum temperature probe warning threshold. This alert is provided for informational purposes.	1051	None
	threshold value changed		Action: None		
2155	Minimum temperature probe warning threshold	OK/Normal/ Informational	Cause: A user has changed the value for the minimum temperature probe warning threshold. This alert is provided for informational purposes.	1051	None
	value changed		Action: None.		
2156	Controller alarm has	OK/Normal/ Informational	Cause: The controller alarm test has run successfully. This alert is provided for informational purposes.	751	None
	been tested		Action: None.		
2157	Controller configuration has been reset	OK/Normal/ Informational	Cause: A user has reset the controller configuration. See the online help for more information. This alert is provided for informational purposes.	751	None
			Action: None.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2158	Array disk online	OK/Normal/ Informational	Cause: An offline array disk has been made online. This alert is provided for informational purposes. Action: None.	901	None
2159	Virtual disk renamed	OK/Normal/ Informational	Cause: A user has renamed a virtual disk. This alert is provided for informational purposes.	1201	608
			When renaming a virtual disk on a PERC 2, 2/Si, 3/Si, 3/Di, CERC SATA1.5/6ch, and CERC SATA1.5/2s controller, this alert displays the new virtual disk name. On the PERC 2/SC, 2/DC, 3/SC, 3/DCL, 3/DC, 3/QC, 4/SC, 4/DC, 4e/DC, 4/Di, 4/IM,4e/Si, 4e/Di, 5/E, and CERC SATA100/4ch controllers, this alert displays the original virtual disk name.		
			Action: None.		
2160	Dedicated hotspare assigned	OK/Normal/ Informational	Cause: A user has assigned an array disk as a dedicated hot spare to a virtual disk. See the online help for more information. This alert is provided for informational purposes.	901	574
			Action: None.		
2161	Dedicated hotspare unassigned	OK/Normal/ Informational	Cause: An array disk that was assigned as a hot spare has been unassigned and is no longer functioning as a hot spare. The array disk may have been unassigned by a user or automatically unassigned by Storage Management. Storage Management unassigns hot spares that have been used to rebuild data. Once data is rebuilt onto the hot spare, the hot spare becomes a member of the virtual disk and is no longer assigned as a hot spare. You need to assign a new hot spare to maintain data protection in this situation.	901	575
			On the PERC 2/Si, 3/Si, 3/Di, CERC SATA1.5/6ch, and CERC SATA1.5/2s controllers, if you use another application such as the BIOS to include a hot spare in a virtual disk, then Storage Management unassigns the array disk as a hot spare. Action: Although this alert is provided for informational purposes, you may need to assign a new		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2162	Communicati on regained		Cause: Communication with an enclosure has been restored. This alert is provided for informational purposes.	851	None
			Action: None.		
2163	Rebuild completed	Critical / Failure / Error	Cause: See "A Rebuild Completes with Errors" in online help for more information.	904	690
	with errors		Action: See "A Rebuild Completes with Errors" in online help for more information.		
2164		adme.txt for Informational	Cause: Storage Management is unable to determine whether the system has the minimum required versions of the RAID controller drivers.	101	None
			Action: This alert is generated for informational purposes. See the Readme file for driver and firmware requirements. In particular, if Storage Management experiences performance problems, you should verify that you have the minimum supported versions of the drivers and firmware installed.		
2165	The RAID controller firmware and driver validation was not performed. The configuration	Warning / Non-critical	Cause: Storage Management is unable to determine whether the system has the minimum required versions of the RAID controller firmware and drivers. This situation may occur for a variety of reasons. For example, the installation directory path to the configuration file may not be correct. The configuration file may also have been removed or renamed.	753	None
	configuration file cannot be opened.		Action: Reinstall Storage Management		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2166	The RAID controller firmware and driver validation was not performed. The configuration file is out of date or corrupted.	Warning / Non-critical	Cause: Storage Management is unable to determine whether the system has the minimum required versions of the RAID controller firmware and drivers. This situation has occurred because a configuration file is unreadable or missing data. The configuration file may be corrupted. Action: Reinstall Storage Management	753	None
2167	The current kernel version and the non- RAID SCSI driver version are older than the minimum required levels. See readme.txt for a list of validated kernel and driver versions.	Warning / Non-critical	Cause: The version of the kernel and the driver do not meet the minimum requirements. Storage Management may not be able to display the storage or perform storage management functions until you have updated the system to meet the minimum requirements. Action: See the Readme file for kernel and driver requirements. Update the system to meet the minimum requirements and then reinstall Storage Management.	103	None
2168	The non- RAID SCSI driver version is older than the minimum required level. See readme.txt for the validated driver version.	Warning / Non-critical	Cause: The version of the driver does not meet the minimum requirements. Storage Management may not be able to display the storage or perform storage management functions until you have updated the system to meet the minimum requirements. Action: See the Readme file for the driver requirements. Update the system to meet the minimum requirements and then reinstall Storage Management.	103	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2169	The controller battery needs to be replaced.	/Error	Cause: The controller battery cannot recharge. The battery may be old or it may have been already recharged the maximum number of times. In addition, the battery charger may not be working.	1154	None
			Action: Replace the battery pack.		
2170	The controller battery charge	OK/Normal/ Informational	Cause: This alert is provided for informational purposes.	1151	None
	level is normal.		Action: None.		
2171	The controller battery temperature is	Warning/ Non-critical	Cause: The battery may be in the process of recharging. The room temperature may also be too hot. The fan in the system may also be degraded or failed.	1153	None
	above normal.	ove normal.	Action: If this alert was generated due to a battery recharge, then the situation will correct itself when the recharge is complete. You should also verify that the room temperature is normal and that system components such as the fan are functioning properly.		
2172	The controller battery	OK/Normal/ Informational	Cause: This alert is provided for informational purposes.	1151	None
	temperature is normal.		Action: None.		
2174	The controller batty has been removed.		Cause: The controller cannot communicate with the battery. The battery may be removed. The contact point between the controller and the battery may also be burned or corroded.	1153	None
			Action: Verify whether the battery is present. Replace the battery if it is not present. If the contact point between the battery and the controller is burned or corroded, you will need to replace either the battery or the controller or both. Refer to the hardware documentation for information on how to safely access, remove, and replace the battery.		
2175	The controller battery has been replaced.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2176		OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2177	The controller battery Learn cycle has completed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2178	The controller battery Learn cycle has timed out.		Cause: The controller battery must be fully charged before the Learn cycle can begin. The battery may be unable to maintain a full charge causing the Learn cycle to timeout. In addition, the battery must be able to maintain cached data for a specified period of time in the event of a power loss. For example, some batteries maintain cached data for 24 hours. If the battery is unable to maintain cached data for the required period of time, then the Learn cycle will timeout. Action: Replace the battery pack. The battery is unable to maintain a full charge.	1153	None
2179	The controller battery Learn cycle has been postponed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2180	The controller battery Learn cycle will start in % days. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2181	The controller battery Learn cycle will start in % hours. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2182	An invalid SAS configuration has been detected.	Critical/ Failure/ Error	Cause: The controller and attached enclosures are not cabled correctly. Action: See the hardware documentation for information on correct cabling configurations.	754	None
2186	The controller cache has been discarded.	Warning/ Non-critical	Cause: The controller has flushed the cache and any data in the cache has been lost. This may occur when the system has memory or battery problems that cause the controller to distrust the cache. Although user data may have been lost, this alert does not always indicate that relevant or user data has been lost. Action: Verify that the battery and memory are	753	None
			functioning properly.		
2187	Single-bit ECC error	Warning/ Non-critical	Cause: The system memory is malfunctioning.	753	None
	limit exceeded.	non-critical	Action: Replace the battery pack.		

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2188	The controller write policy has been changed to Write Through.	Warning/ Non-critical	Cause: The controller battery is unable to maintain cached data for the required period of time. For example, if the required period of time is 24 hours, then the battery is unable to maintain cached data for 24 hours. It is normal to receive this alert during the battery Learn cycle. This is because the Learn cycle discharges the battery before recharging it. When discharged, the battery cannot maintain cached data.	1153	None
			Action: Verify the health of the battery. If the battery is not healthy, then replace the battery pack.		
2189	The controller write policy has been changed to Write Back.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2191	There are too many enclosures attached to the controller. This is an unsupported	Critical/ Failure/ Error	Cause: There are too many enclosures attached to the controller port. When the enclosure limit is exceeded, the controller loses contact with all enclosures attached to the port. Action: Remove the last enclosure. You must remove the enclosure that has been added last and is causing the enclosure limit to be exceeded.	854	None
2192	configuration. The virtual disk Check Consistency has made corrections and completed.	OK/Normal/ Informational	Cause: The virtual disk Check Consistency has identified errors and made corrections. For example, the Check Consistency may have encountered a bad disk block and remapped the disk block to restore data consistency. This alert is provided for informational purposes.	1203	None
	completed.		Action: Monitor the battery health and the cache health to make sure the battery and cache are functioning properly. Monitor the Alert Log for events related to the battery and to write policy changes. You should also monitor the Alert Log for events related to disk errors. If you suspect that the battery or a disk have problems, then replace the battery pack or the disk.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2193	The virtual disk reconfigure has resumed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	None
2194	The virtual disk read policy has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	None
2199	The virtual disk cache policy has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	None
2201	A global hot spare failed.	Warning/ Non-critical	Cause: The controller is not able to communicate with a disk that is assigned as a global hot spare. The disk may have failed or been removed. There may also be a bad or loose cable.	903	None
			Action: Verify that the disk is healthy and that it has not been removed. Check the cables. If necessary, replace the disk and reassign the hot spare.		
2202	A global hot spare has been removed.	Warning/ Non-critical	Cause: The controller is not able to communicate with a disk that is assigned as a global hot spare. The disk may have been removed. There may also be a bad or loose cable.	903	None
			Action: Verify that the disk is healthy and that it has not been removed. Check the cables. If necessary, replace the disk and reassign the hot spare.		
2203	A dedicated hot spare failed.	Warning/ Non-critical	Cause: The controller is not able to communicate with a disk that is assigned as a dedicated hot spare. The disk may have failed or been removed. There may also be a bad or loose cable.	903	None
			Action: Verify that the disk is healthy and that it has not been removed. Check the cables. If necessary, replace the disk and reassign the hot spare.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2204	A dedicated hot spare has been removed.	Warning/ Non-critical	Cause: The controller is not able to communicate with a disk that is assigned as a dedicated hot spare. The disk may have been removed. There may also be a bad or loose cable.	903	None
			Action: Verify that the disk is healthy and that it has not been removed. Check the cables. If necessary, replace the disk and reassign the hot spare.		
2205	A dedicated hot spare has	Warning/ Non-critical	Cause: The hot spare is no longer required because the virtual disk it was assigned to has been deleted.	903	None
	been automatically unassigned.		Action: None.		
2206	The only hot spare available is a SATA disk. SATA disks cannot replace SAS disks.	Warning/ Non-critical	Cause: The only array disk available to be assigned as a hot spare is using SATA technology. The array disks in the virtual disk are using Serial Attached SCSI (SAS) technology. Because of this difference in technology, the hot spare cannot rebuild data if one of the array disks in the virtual disk fails.	903	None
			Action: Add a SAS disk that is large enough to be used as the hot spare and assign the new disk as a hot spare.		
2207	The only hot spare available is a SAS disk. SAS disks cannot replace SATA disks.	Warning/ Non-critical	Cause: The only array disk available to be assigned as a hot spare is using SAS technology. The array disks in the virtual disk are using SATA technology. Because of this difference in technology, the hot spare cannot rebuild data if one of the array disks in the virtual disk fails.	903	None
			Action: Add a SATA disk that is large enough to be used as the hot spare and assign the new disk as a hot spare.		
2211	The physical disk is not supported.	Warning/ Non-critical	Cause: The physical disk may not have a supported version of the firmware or the disk may not be supported by Dell.	903	None
			Action: If the disk is supported by Dell, then update the firmware to a supported version. If the disk is not supported by Dell, then replace the disk with one that is supported.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2232	The controller alarm is silenced.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2233	The background initialization (BGI) rate has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2234	The Patrol Read rate has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2235	The Check Consistency rate has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2238	The controller debug log file has been exported.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2239	A foreign configuration has been cleared.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2240	A foreign configuration has been imported.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2241	The Patrol Read mode has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2242	The Patrol Read has started.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2243	The Patrol Read has stopped.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2244	A virtual disk	OK/Normal/	Cause: This alert is provided for informational purposes.	1201	None
	blink has been initiated.	Informational	Action: None.		
2245	A virtual disk	OK/Normal/	Cause: This alert is provided for informational purposes.	1201	None
	blink has Informational ceased.	Action: None.			
2246	The controller battery is degraded.	Warning/ Non-critical	Cause: The controller battery charge is weak. As the battery charge weakens, the battery charger should automatically recharge the battery. If the battery has already met its recharge limit, then the battery pack needs to be replaced.	1153	None
			Action: Monitor the battery to make sure that it recharges successfully. If the battery does not recharge, then replace the battery pack.		
2247	The controller		Cause: This alert is provided for informational purposes.	1151	None
	battery is charging.	Informational	Action: None.		
2248	The controller		Cause: This alert is provided for informational purposes.	1151	None
	battery is executing a Learn cycle.	Informational	Action: None.		
2249	The array disk		Cause: This alert is provided for informational purposes.	901	None
	Clear operation has started.	Informational	Action: None.		
2251	The array disk	OK/Normal/	Cause: This alert is provided for informational purposes.	901	None
	blink has initiated.	Informational	Action: None.		
2252	The array disk		Cause: This alert is provided for informational purposes.	901	None
	blink has ceased.	Informational	Action: None.		
2254	The Clear operation has cancelled.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None
2255	The array disk has started.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2259	An enclosure blink operation has initiated.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2260	An enclosure blink has ceased.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2261	A global rescan has initiated.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	101	None
2262	Smart thermal shutdown is enabled.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	101	None
2263	Smart thermal shutdown is disabled.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	101	None
2264	A device is missing.	Warning/ Non-critical	Cause: The controller cannot communicate with a device. The device may be removed. There may also be a bad or loose cable. Action: Verify that the device is present and not removed. If it is present, then check the cables. You should also check the connection to the controller battery and the battery health. A battery with a weak or dealeted charge may eque this plant.	753, 803, 853, 903, 953, 1003, 1053, 1103, 1153, 1203	None
2265	A device is in an unknown state.	Warning/ Non-critical	depleted charge may cause this alert. Cause: The controller cannot communicate with a device. The state of the device cannot be determined. There may be a bad or loose cable. The system may also be experiencing problems with the application programming interface (API). There could also be a problem with the driver or firmware. Action: Check the cables. Verify that the controller has a supported version of the driver and firmware. You can download the most current version of the driver and firmware from <b>support.dell.com</b> . Rebooting the system may also resolve this problem.	753, 803, 853, 903, 953, 1003, 1053, 1103, 1153, 1203	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2266	Controller log file entry:%1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2267	The controller reconstruct rate has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2268	%1, Storage Management has lost communicatio n with this RAID controller and attached storage. An immediate reboot is strongly recommended to avoid further problems. If the reboot does not restore communicatio	Critical/ Failure/ Error	Cause: Storage Management has lost communication with a device. There may be faulty hardware or loose or defective cables. Action: Reboot the system. If the problem is not resolved, check for hardware failures. Any failed component must be replaced. Make sure the cables are attached securely. Refer to the hardware documentation for more diagnostics information.	104	None
	n, then there may be a hardware failure. The %l indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.				
2269	The array disk Clear operation has completed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2270	The array disk Clear operation failed.	Critical/ Failure/ Error	Cause: A Clear task was being performed on an array disk but the task was interrupted and did not complete successfully. The controller may have lost communication with the disk. They disk may have been removed or the cables may be loose or defective.	904	None
			Action: Verify that the disk is present and not in a Failed state. Make sure the cables are attached securely. Restart the Clear task.		
2271	The Patrol Read corrected a	OK/Normal/ Informational	Cause: The Patrol Read task has encountered an error such as a bad disk block and remapped data to correct the error.	901	None
	media error.		Action: None.		
2272	Patrol Read found an uncorrectable	Warning/ Non-critical	Cause: The Patrol Read task has encountered an error that cannot be corrected. There may be a bad disk block that cannot be remapped.	903	None
	media error.		Action: Replace the array disk to avoid future data loss.		
2273	Bad media.	Critical/ Failure/ Error	Cause: A source (array) disk in a redundant virtual disk has a bad disk block. The algorithm that maintains redundant data has created a similar bad block on the target redundant disk in order to maintain consistency in disk block addressing. Data has been lost.	904	None
			Action: Restore from backup.		
2274	The array disk	OK/Normal/	Cause: This alert is provided for informational purposes.	901	None
	rebuild has resumed.	Informational	Action: None.		
2276	The dedicated hot spare is	Warning/ Non-critical	Cause: The dedicated hot spare is not large enough to protect all virtual disks that reside on the disk group.	903	None
	too small.		Action: Assign a larger disk as the dedicated hot spare.		
2277	The global hot spare is too	Warning/ Non-critical	Cause: The global hot spare is not large enough to protect all virtual disks that reside on the controller.	903	None
	small.	all.	Action: Assign a larger disk as the global hot spare.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2278	The controller battery charge level is below a normal threshold.		Cause: The battery is discharging. A battery discharge is a normal activity during the battery Learn cycle. Before completing, the battery Learn cycle recharges the battery. You should receive alert 2179 when the recharge occurs.	1151	None
			Action: Verify whether the battery Learn cycle is in progress. Alert 2176 indicates that the battery Learn cycle has initiated. The battery also displays the Learn state while the Learn cycle is in progress. If a Learn cycle is not in progress, then check for other events concerning the state of the battery. These may help determine the cause of this event.		
2279	The controller battery charge level is above a normal		Cause: This alert is provided for informational purposes. This alert indicates that the battery is recharging during the battery Learn cycle. Action: None.	1151	None
2280	threshold. A disk media error has been corrected.	OK/Normal/ Informational	Cause: A disk media error was detected while the controller was completing a background task. A bad disk block was identified. The disk block has been remapped.	1201	None
			Action: Consider replacing the disk. If you receive this alert frequently, be sure to replace the disk. You should also routinely back up your data.		
2281	Virtual disk has inconsistent data.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	None
2282	Hot spare SMART polling failed.	Critical/ Failure/ Error	Cause: The controller firmware attempted to do SMART polling on the hot spare but was not able to complete the SMART polling. The controller has lost communication with the hot spare.	904	None
			Action: Verify the health of the disk assigned as a hot spare. You may need to replace the disk and reassign the hot spare. Make sure the cables are attached securely.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2283	A redundant path is broken.	Warning/ Non-critical	Cause: The controller has two connectors that are connected to the same enclosure. The communication path on one connector has lost connection with the enclosure. The communication path on the other connector is reporting this loss.	903	None
			Action: Make sure the cables are attached securely, and that both enclosure management modules (EMMs) are healthy.		
2284	A redundant	OK/Normal/	Cause: This alert is provided for informational purposes.	901	None
	path has been restored.		Action: None.		
2285	A disk media	OK/Normal/	Cause: This alert is provided for informational purposes.	901	None
	error was corrected during recovery.	Informational	Action: None.		
2286	A Learn cycle start is pending while the battery charges.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1151	None
2287	The Patrol Read is paused.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2288	The patrol read has resumed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2289	Multi-bit ECC error.	Critical/ Failure/ Error	Cause: An error involving multiple bits has been encountered during a read or write operation. The error correction algorithm recalculates parity data during read and write operations. If an error involves only a single bit, it may be possible for the error correction algorithm to correct the error and maintain parity data. An error involving multiple bits, however, generally indicates data loss. In some cases, if the multi-bit error occurs during a read operation, then the data on the disk may be OK. If the multi-bit error occurs during a write operation, then data loss has occurred.	754	None
			Action: Replace the dual in-line memory module (DIMM). The DIMM is a part of the controller battery pack. Refer to your hardware documentation for information on replacing the DIMM. You may need to restore data from backup.		
2290	Single-bit ECC error.	Warning/ Non-critical	Cause: An error involving a single bit has been encountered during a read or write operation. The error correction algorithm has corrected this error. Action: None.	753	None
2291	An enclosure management module (EMM) has been discovered.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2292	Communicati on with the	Failure/	Cause: The controller has lost communication with an EMM. The cables may be loose or defective.	854	None
	enclosure has been lost.	Error	Action: Make sure the cables are attached securely. Reboot the system.		
2293	The enclosure management module (EMM) has failed.	Critical/ Failure/ Error	Cause: An EMM has failed. The failure may be caused by a loss of power to the EMM. The EMM self test may also have identified a failure. There could also be a firmware problem or a multi-bit error. Action: Replace the EMM. See the hardware documentation for information on replacing the EMM.	854	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2294	A device has been inserted.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	752, 802, 852, 902, 952, 1002, 1052, 1102, 1152, 1202	None
2295	A device has been removed.	Critical/ Failure/ Error	Cause: A device has been removed and the system is no longer functioning in optimal condition. Action: Replace the device.	754, 804, 854, 904, 954, 1004, 1054, 1104, 1154, 1204	None
2296	An enclosure management module (EMM) has been inserted.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2297	An enclosure management module (EMM) has been removed.	Critical/ Failure/ Error	Cause: An EMM has been removed. Action: Replace the EMM. See the hardware documentation for information on replacing the EMM.	854	None
2298	There is a bad sensor on an enclosure.	Warning/ Non-critical	Cause: The enclosure has a bad sensor. The enclosure sensors monitor the fan speeds, temperature probes, and so on. Action: Refer to the hardware documentation for more information.	853	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2299	Bad PHY %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary	Critical/ Failure/ Error	Cause: There is a problem with a physical connection or PHY. Action: Replace the EMM that contains the bad PHY. See the hardware documentation for information on replacing the EMM. Attach the storage to a different connector if one is available. Make sure the cables are attached securely.	854	None
2300	depending on the situation. The enclosure is unstable.	Critical/ Failure/ Error	Cause: The controller is not receiving a consistent response from the enclosure. There could be a firmware problem or an invalid cabling configuration. If the cables are too long, they will degrade the signal.	854	None
			Action: Completely power down all enclosures attached to the system and reboot the system. If the problem persists, upgrade the firmware to the latest supported version. You can download the most current version of the driver and firmware from <b>support.dell.com</b> . Make sure the cable configuration is valid. See the hardware documentation for valid cabling configurations.		
2301	The enclosure has a hardware error.		Cause: The enclosure or an enclosure component is in a Failed or Degraded state. Action: Verify the health of the enclosure and its components. Replace any hardware that is in a Failed state. See the hardware documentation for more information.	854	None
2302	The enclosure is not responding.	Critical/ Failure/ Error	Cause: The enclosure or an enclosure component is in a Failed or Degraded state. Action: Verify the health of the enclosure and its components. Replace any hardware that is in a Failed state. See the hardware documentation for more information.	854	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2303	The enclosure cannot support both SAS and SATA array disks. Array disks may be disabled.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2304	An attempt to hot plug an enclosure management module (EMM) has been detected. This type of hot plug is not supported.		Cause: This alert is provided for informational purposes. Action: None.	751	None
2305	The array disk is too small to be used for a rebuild.		Cause: This alert is provided for informational purposes. Action: None.	901	None
2306	Bad block table is 80% full.	Warning/ Non-critical	Cause: The bad block table is the table used for remapping bad disk blocks. This table fills as bad disk blocks are remapped. When the table is full, bad disk blocks can no longer be remapped which means that disk errors can no longer be corrected. At this point, data loss can occur. The bad block table is now 80% full. Action: Back up your data. Replace the disk generating this alert and restore from back up.	903	None

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2307	Bad block table is full. Unable to log block %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	Critical/ Failure/ Error	Cause: The bad block table is the table used for remapping bad disk blocks. This table fills as bad disk blocks are remapped. When the table is full, bad disk blocks can no longer be remapped which means that disk errors can no longer be corrected. At this point, data loss can occur. Action: Replace the disk generating this alert and restore from backup. You may have lost data.	904	None
2309	An array disk is incompatible.	Warning/ Non-critical	Cause: You have attempted to replace a disk with another disk that is using an incompatible technology. For example, you may have replaced one side of a mirror with a SAS disk when the other side of the mirror is using SATA technology.	903	None
			Action: Refer to the hardware documentation for information on replacing disks		
2310	A virtual disk is permanently degraded.	Critical/ Failure/ Error	Cause: A redundant virtual disk has lost redundancy. This may occur when the virtual disk suffers the failure of more than one array disk. In this case, both the source array disk and the target disk with redundant data have failed. A rebuild is not possible because there is no longer redundancy.	1204	None
			Action: Replace the failed disks and restore from backup.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2311	The firmware on the enclosure management modules (EMMs) is not the same version. EMM0 %1 EMM1 %2	Warning/ Non-critical	Cause: The firmware on the EMM modules is not the same version. It is required that both modules have the same version of the firmware. This alert may be caused when a user attempts to insert an EMM module that has a different firmware version than an existing module. Action: Upgrade to the same version of the firmware on both EMM modules.	853	None
	The %1 and %2 indicate a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.				
2312	A power supply in the enclosure has an AC failure.	Warning/ Non-critical	Cause: The power supply has an AC failure. Action: Replace the power supply.	1003	None
2313	A power supply in the enclosure has a DC failure.	Warning/ Non-critical	Cause: The power supply has a DC failure. Action: Replace the power supply.	1003	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2314	The initialization sequence of SAS components failed during system startup. SAS management and monitoring is not possible.	Critical/ Failure/ Error	Cause: Storage Management is unable to monitor or manage SAS devices. Action: Reboot the system. If problem persists, make sure you have supported versions of the drivers and firmware. You may need to reinstall Storage Management or Server Administrator. You may be missing some of the installation components.	104	None
2315	Diagnostic message %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2316	Diagnostic message %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	Critical/ Failure/Error	Cause: A diagnostics test failed. The text for this alert is generated by the utility that ran the diagnostics. Action: See the documentation for the utility that ran the diagnostics for more information.	754	None
2317	Background initialization (BGI) terminated due to loss of ownership in a cluster configuration.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1201	None
2318	Problems with the battery or the battery charger have been detected. The battery health is poor.		Cause: The battery or the battery charger is not functioning properly. Action: Replace the battery pack.	1153	None
2319	Single-bit ECC error. The dual in- line memory module (DIMM) is degrading.	Warning/ Non-critical	Cause: The DIMM is beginning to malfunction. Action: Replace the DIMM to avoid data loss or data corruption. The DIMM is a part of the controller battery pack. Refer to your hardware documentation for information on replacing the DIMM.	753	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2320	Single-bit ECC error.	Critical/ Failure/	Cause: The DIMM is malfunctioning. Data loss or data corruption may be imminent.	754	None
	The dual in- line memory module (DIMM) is critically degraded.	Action: Replace the DIMM inmediately to avoid datauleloss or data corruption. The DIMM is a part of the controller battery pack. Refer to your hardware documentation for information on replacing the DIMM.			
2321	Single-bit ECC error. The dual in- line memory	CC error. Failure/ malfunctioning. Data loss or of the dual in- Error imminent. The DIMM must	Cause: The dual in-line memory module DIMM is malfunctioning. Data loss or data corruption is imminent. The DIMM must be replaced immediately. No further alerts will be generated.	754	None
	module (DIMM) is critically degraded. There will be no further reporting.		Action: Replace the DIMM immediately. The DIMM is a part of the controller battery pack. Refer to your hardware documentation for information on replacing the DIMM.		
2322	The DC power supply is switched	Critical/ Failure/ Error	Cause: The power supply unit is switched off. Either a user switched off the power supply unit or it is defective.	1004	None
	off.		Action: Check to see whether the power switch is turned off or on. If it is turned off, turn it on. If the problem is not corrected, verify that the power cord is attached and functional. If the problem is still not corrected or if the power switch is already turned on, then replace the power supply unit.		
2323	The power supply is switched on.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	1001	None
2324	The AC power supply cable has been removed.	Critical/ Failure/ Error	Cause: The power cable may be pulled out or removed. The power cable may also have overheated and become warped and nonfunctional. Action: Replace the power cable.	1004	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2325	The power supply cable	OK/Normal/ Informational	Cause: This alert is provided for informational purposes.	1001	None
	has been inserted.		Action: None.		
2326	A foreign configuration has been detected.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. The controller has array disks that were moved from another controller. These array disks contain virtual disks that were created on the other controller.	751	None
			Action: None.		
2327	The NVRAM has corrupted data. The controller is	Warning/ Non-critical	Cause: The Non-Volatile Random-Access Memory (NVRAM) has corrupted data. This may occur after a power surge, a battery failure, or for other reasons. The controller is reinitializing the NVRAM.	753	None
	reinitializing the NVRAM.		Action: None. The controller is taking the required corrective action. If this alert is generated often (such as during each reboot), then replace the controller.		
2328	The NVRAM has corrupt	Warning/ Non-critical	Cause: The NVRAM has corrupt data. The controller is unable to correct the situation.	753	None
	data.	-	Action: Replace the controller.		
2329	SAS port report: %1.	AS port Warning/	Cause: The text for this alert is generated by the controller and can vary depending on the situation.	753	None
	The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.		Action: Make sure the cables are attached securely. If the problem is not resolved, replace the cable with a valid cable according to SAS specifications. If the problem persists, you may need to replace devices such as the controller or EMM. Refer to the hardware documentation for more information.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2330	SAS port report: %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2331	A bad disk block has been reassigned.	Warning/ Non-critical	Cause: The disk has a bad block. Data has been readdressed to another disk block. No data loss has occurred.	903	None
			Action: Monitor the disk for other alerts or indications of poor health. For example, you may receive alert 2306. Replace the disk if you suspect there is a problem.		
2332	A controller	OK/Normal/	Cause: This alert is provided for informational purposes.	751	None
	hot plug has been detected.	Informational	Action: None.		
2333	An enclosure temperature	Warning/ Non-critical	Cause: The firmware has detected a temperature sensor differential in the enclosure.	853	None
	sensor differential has been detected.	ferential s been	Action: Monitor the enclosure for other alerts related to the temperature. For example, you may receive alerts related to the fan or temperature probes. Verify the health of the enclosure and its components. Replace any component that is failed.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2334	Controller event log: %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2335	Controller event log: %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	Warning/ Non-critical	Cause: The text for this alert is generated by the controller and can vary depending on the situation. This text is from events in the controller event log that were generated while Storage Management was not running. Action: If there is a problem, review the controller event log and the Server Administrator Alert Log for significant events or alerts that may assist in diagnosing the problem. Verify the health of the storage components. See the hardware documentation for more information.	753	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2336	Controller event log: %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.	Critical/ Failure/ Error	Cause: The text for this alert is generated by the controller and can vary depending on the situation. This text is from events in the controller event log that were generated while Storage Management was not running. Action: See the hardware documentation for more information.	754	None
2337	The controller is unable to recover cached data from the battery backup unit (BBU).	Failure/	Cause: The controller was unable to recover data from the cache. Action: Verify that the battery is charged and in good health. When the battery charge is unacceptably low, the battery cannot maintain cached data. Verify whether the battery has met its recharge limit. The battery may need to be recharged or replaced.	1154	None
2338	The controller has recovered cached data from the battery backup unit (BBU).	OK/Normal/ Informational	Cause: This alert is provided for informational	1151	None
2339	The factory default settings have been restored.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2340	The background initialization (BGI)	background Failure/ initialization Error	Cause: The BGI task encountered errors that cannot be corrected. The virtual disk contains array disks that have unusable disk space or disk errors that cannot be corrected.	1204	None
	completed with uncorrectable errors.		Action: Replace the array disk that contains the disk errors. Review other alert messages to identify the array disk that has errors. If the virtual disk is redundant, you can replace the array disk and continue using the virtual disk. If the virtual disk is non-redundant, you may need to recreate the virtual disk after replacing the array disk. After replacing the array disk, run a Check Consistency to verify the data.		
2341	The Check Consistency	OK/Normal/ Informational	Cause: This alert is provided for informational purposes.	1201	None
	made corrections and completed.		Action: None.		
2342	The Check Consistency	0	Cause: The data on a source disk and the redundant data on a target disk is inconsistent.	1203	None
	found inconsistent parity data. Data redundancy may be lost.		Action: Restart the Check Consistency task. If you receive this alert again, verify the health of the array disks included in the virtual disk. Review the alert messages for significant alerts related to the array disks. If you suspect that an array disk has a problem, replace it and restore from backup.		
2343	The Check Consistency	Warning/ Non-critical	Cause: The Check Consistency can no longer report errors in the parity data.	1203	None
	logging of inconsistent parity data is disabled.		Action: See the hardware documentation for more information.		
2344	The virtual disk	Warning/ Non-critical	Cause: A user has cancelled the virtual disk initialization.	1203	None
	initialization terminated.		Action: Restart the initialization.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2345	The virtual disk initialization	Critical/ Failure/ Error	Cause: The controller cannot communicate with attached devices. A disk may be removed or contain errors. Cables may also be loose or defective.	1204	None
	failed.		Action: Verify the health of attached devices. Review the Alert Log for significant events. Make sure the cables are attached securely.		
2346	Error occurred: %1.	Warning/ Non-critical	Cause: The text for this alert is generated by the firmware and can vary depending on the situation.	903	None
	The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.		Action: Verify the health of attached devices. Review the Alert Log for significant events. You may need to replace faulty hardware. Make sure the cables are attached securely. See the hardware documentation for more information.		
2347	The rebuild failed due to errors on the	Critical/ Failure/ Error	Cause: You are attempting to rebuild data that resides on a defective disk. Action: Replace the source disk and restore from	904	None
	source physical disk.		backup.		
2348	The rebuild failed due to	Critical/ Failure/	Cause: You are attempting to rebuild data onto a disk that is defective.	904	None
	errors on the target physical disk.	Error	Action: Replace the target disk. If a rebuild does not automatically start after replacing the disk, then initiate the Rebuild task. You may need to assign the new disk as a hot spare in order to initiate the rebuild.		
2349	A bad disk block could not be reassigned	Critical/ Failure/ Error	Cause: A write operation could not complete because the disk contains bad disk blocks that could not be reassigned. Data loss may have occurred. Data redundancy may also be lost.	904	None
	during a write operation.		Action: Replace the disk.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2350	There was an unrecoverable disk media error during the rebuild.	Critical/ Failure/ Error	Cause: The rebuild encountered an unrecoverable disk media error. Action: Replace the disk.	904	None
2351	A physical disk is marked as missing.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None
2352	A physical disk that was marked as missing has been replaced.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None
2353	The enclosure temperature has returned to normal.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2354	Enclosure firmware download in progress.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2355	Enclosure firmware download failed.	Warning/ Non-critical	Cause: The system was unable to download firmware to the enclosure. The controller may have lost communication with the enclosure. There may have been problems with the data transfer or the download media may be corrupt.	853	None
			Action: Attempt to download the enclosure firmware again. If problems continue, verify that the controller can communicate with the enclosure. Make sure that the enclosure is powered on. Check the cables. Verify the health of the enclosure and its components. To verify the health of the enclosure, select the enclosure object in the tree view. The Health subtab displays a red "X" or yellow exclamation point for enclosure components that are failed or degraded.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2356	SAS Management Protocol (SMP)	Critical/ Failure/ Error	Cause: The text for this alert is generated by the firmware and can vary depending on the situation. The reference to SMP in this text refers to SAS Management Protocol.	754	None
	communi- cations error %1. The %1 indicates a substitution variable. The text for this substitution variable is displayed with the alert in the Alert Log and can vary depending on the situation.		Action: There may be a SAS topology error. See the hardware documentation for information on correct SAS topology configurations. There may be problems with the cables such as a loose connection or an invalid cabling configuration. See the hardware documentation for information on correct cabling configurations. Verify that the firmware is a supported version.		
2357	SAS expander error: %1. The %1 indicates a substitution variable. The text for this substitution variable is	Failure/	Cause: The text for this alert is generated by the firmware and can vary depending on the situation. Action: There may be a problem with the enclosure. Verify the health of the enclosure and its components. To verify the health of the enclosure, select the enclosure object in the tree view. The Health subtab displays a red "X" or yellow exclamation point for	754	None
2358	displayed with the alert in the Alert Log and can vary depending on the situation. The battery	OK/Normal/	enclosure components that are failed or degraded. See the enclosure documentation for more information. Cause: This alert is provided for informational purposes.	1151	None
	charge cycle is complete.		Action: None.		

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2359	The physical disk is not	k is not Non-critical	Cause: The physical disk does not comply with the standards set by Dell and is not supported.	903 No	None
	certified.		Action: Replace the physical disk with a physical disk that is supported.		
2360	A user has discarded data from the controller cache.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2361	Array disk(s) that are part of a virtual disk have been removed while the system was shut down. This removal was discovered during system start-up.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2362	Array disk(s) have been removed from a virtual disk. The virtual disk will be in Failed state during the next system reboot.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2363	A virtual disk and all of its member array disks have been removed while the system was shut down. This removal was discovered during system start-up.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2364	All virtual disks are missing from the controller. This situation was discovered during system start-up.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	751	None
2365	The speed of the enclosure fan has changed.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None
2366	Dedicated spare imported as global due to missing arrays.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None
2367	Rebuild not possible as SAS/SATA is not supported in the same virtual disk.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	901	None

 Table 26-2.
 Storage Management Messages (continued)

Event ID	Description	Severity	Cause and Action	SNMP Trap Numbers	Array Manager Event Number
2368	The Scalable Encryption Processor (SEP) has been rebooted as part of the firmware download operation and will be unavailable until the operation completes.	OK/Normal/ Informational	Cause: This alert is provided for informational purposes. Action: None.	851	None

 Table 26-2.
 Storage Management Messages (continued)

## **Standard Data Type Definitions**

This appendix contains definitions for data types that are standard in most contexts across the information technology industry. These are the most common data types for expressing variable values defined in the 10892.mib, dcs3rmt.mib and dcs3fru.mib files. Server Administrator-specific variable values are defined in the last section of the section in which they are introduced.

## **Common Data Types**

Common data types include several types of strings, the object range, signed and unsigned bit ranges, and the familiar Boolean (true or false) data type.

Variable Name:	Definition
DellString	DisplayString (SIZE (064))
DellSecurityString	DisplayString (SIZE (0255))
DellCostofOwnershipString	DisplayString (SIZE (064))
DellObjectRange	INTEGER (1128)
DellUnsigned8BitRange	INTEGER (1256)
DellUnsigned16BitRange	INTEGER (165535)
DellUnsigned32BitRange	INTEGER (12147483647)
DellSigned32BitRange	INTEGER (-21474836472147483647)
DellBoolean	INTEGER $(01 \text{ (FALSE} = 0, \text{TRUE} = 1))$

Table A-1. Common Data Types

# Variables with Data Types of State Capabilities and State Capabilities Unique

Variables with definitions of *variable name*>StateCapabilities or *variable name*>StateCapabilitiesUnique are integers representing a series of bit definitions. They are NOT enumerations and should be treated as bit fields. The value is passed as a decimal value. The decimal value should be converted to hex and the appropriate bits should be parsed from hex. Some of the more common bit combinations are defined in some variables, but not all combinations are or will be defined.

<u> </u>				
Data Type: Integer				
Possible Data Values	Meaning of Data Value			
if set to zero(0)	The object has no capabilities.			
unknownCapabilities(1)	The object's capabilities are unknown.			
enableCapable(2)	The object can be disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).			
notReadyCapable(4)	The object is not ready.			
enableAndNotReadyCapable(6)	Enable and not ready capable.			

#### Table A-2. Dell State Capabilities

Variable Name: DellStateCapabilities

#### Table A-3. Dell State Settings

Variable Name: DellStateSettings				
Data Type: Integer				
Possible Data Values	Meaning of Data Value			
if set to zero(0)	The object has no settings capabilities and its state is disabled.			
unknown(1)	The object's state is unknown.			
enabled(2)	The object's state is disabled (offline, a binary 0 value) or enabled (online, a binary 1 value).			
notReady(4)	The object is not ready.			
enableAndNotReady(6)	The object is enabled and not ready.			

## Table A-4. Dell Probe Capabilities

Variable Name: DellProbeCapabilities					
Data Type: Integer					
Possible Data Values	Meaning of Data Value				
if set to zero(0)	The object has no capabilities.				
upperNonCriticalThresholdSetCapable(1)	The upper noncritical threshold can be set.				
lowerNonCriticalThresholdSetCapable(2)	The lower noncritical threshold can be set.				
upperNonCriticalThresholdDefaultCapable(4)	The upper noncritical threshold can be set to default.				
lowerNonCriticalThresholdDefaultCapable(8)	The lower noncritical threshold can be set to default.				

## **Dell Status Data Types**

Status data types include DellStatus, DellStatusRedundancy, and DellStatusProbe.

Variable Name: DellStatus				
Data Type: Integer				
Possible Data Values	Meaning of Data Value			
other(1)	The object's status is not one of the following:			
unknown(2)	The object's status is unknown.			
ok(3)	The object's status is OK.			
nonCritical(4)	The object's status is warning, noncritical.			
critical(5)	The object's status is critical (failure).			
nonRecoverable(6)	The object's status is nonrecoverable (dead).			

#### Table A-5. Dell Status

## Table A-6. Dell Status Redundancy

Variable Name: DellStatusRedundancy

Data Type: Integer

Possible Data Values	Meaning of Data Value
other(1)	The object's status is not one of the following:
unknown(2)	The object's redundancy status is unknown.
full(3)	The object is fully redundant.
degraded(4)	The object's redundancy has been degraded.
lost(5)	The object's redundancy has been lost.
notRedundant(6)	Redundancy does not apply or it is not redundant.

#### Table A-7. Dell Status Probe

Variable Name: DellStatusProbe	
Data Type: Integer	
Possible Data Values	Meaning of Data Value
other(1)	The object's status is not one of the following:
unknown(2)	The status of the object is unknown.
ok(3)	The status of the object is OK.
nonCriticalUpper(4)	The object is at the noncritical upper limit.
CriticalUpper(5)	The object is at the critical upper limit.
nonRecoverableUpper(6)	The object is at the nonrecoverable upper limit.
nonCriticalLower(7)	The object is at the noncritical lower limit.
criticalLower(8)	The object is at the critical lower limit.
nonRecoverableLower(9)	The object is at the nonrecoverable lower limit.
failed(10)	The status of the object is failed.

## **Dell Date**

Variable Name: DellDate

Data Type: DellUnsigned64BitRange

## OCTET STRING (SIZE(8))

## **Full Dates**

Variable Name: DellDateName

Data Type: DisplayString

DisplayString (SIZE (25))

Full dates are defined in the ASCII format:

yyyyMMddhhmmss.uuuuuu+fff or yyyyMMddhhmmss.uuuuuu-fff

where *yyyy* is the year, *MM* is the month, *dd* is the day, *hh* are the hours, *mm* are the minutes, and *ss* are the seconds. *uuuuuu* is the number of microseconds, and +*fff* or *-fff* is the offset from UTC in minutes. For example, Friday, October 31, 2001, at 6:05:19 PM CST would be represented as 20011031180519.000000-360.

The values are zero-padded, and if a valid value for a field is not deliverable, each character in the field will be replaced with an asterisk (\*) character.

## **SNMP Sample Output**

This sample output from the Simple Network Management Protocol (SNMP) covers the first three groups of the **10892.mib**. Values are shown for each object identifier (OID) in the management information base (MIB) Version Group, the Systems Management Software Group, the System State Group, the Chassis Information Table, and Event Log Table. The data is from a Dell<sup>™</sup> PowerEdge<sup>™</sup> 2650 server.

Walk .1.3.6.1.4.1.674.10892 (Agent: 'SERVER01', Community: 'public')

.iso.org.dod.internet.private.enterprises.dell.server3

1.3.6.1.4.1.674.10892.1.1.1.0 5 = 1.3.6.1.4.1.674.10892.1.1.2.0 3 = 1.3.6.1.4.1.674.10892.1.1.3.0 0 = 1.3.6.1.4.1.674.10892.1.100.1.0 'Server Administrator' = '5.3.0' 1.3.6.1.4.1.674.10892.1.100.2.0 1.3.6.1.4.1.674.10892.1.100.3.0 = 4522 1.3.6.1.4.1.674.10892.1.100.4.0 'Management software for Dell = systems.' 1.3.6.1.4.1.674.10892.1.100.5.0 1 = 1.3.6.1.4.1.674.10892.1.100.6.0 1 = 1.3.6.1.4.1.674.10892.1.100.7.0 'No Updates' = 1.3.6.1.4.1.674.10892.1.100.8.0 'https://1.2.3.4:1311' = 1.3.6.1.4.1.674.10892.1.100.9.0 = 'en US' 1.3.6.1.4.1.674.10892.1.100.10.0 '2.2.0' = 1.3.6.1.4.1.674.10892.1.100.11.0 0 = 1.3.6.1.4.1.674.10892.1.100.12.0 1 = 1.3.6.1.4.1.674.10892.1.100.13.0 'Dell Inc.' =

1.3.6.1.4.1.674.10892.1.200.10.1.1.1 =1 1.3.6.1.4.1.674.10892.1.200.10.1.2.1 =3 1.3.6.1.4.1.674.10892.1.200.10.1.3.1 = 21.3.6.1.4.1.674.10892.1.200.10.1.4.1 = 3  $1.3.6.1.4.1.674.10892.1.200.10.1.5.1 = '\02'$ 1.3.6.1.4.1.674.10892.1.200.10.1.6.1 =3  $1.3.6.1.4.1.674.10892.1.200.10.1.7.1 = '\03'$  $1.3.6.1.4.1.674.10892.1.200.10.1.8.1 = '\02\02'$ 1.3.6.1.4.1.674.10892.1.200.10.1.9.1 = 3 $1.3.6.1.4.1.674.10892.1.200.10.1.10.1 = '\03\03'$ 1.3.6.1.4.1.674.10892.1.200.10.1.11.1 =1.3.6.1.4.1.674.10892.1.200.10.1.12.1 = 31.3.6.1.4.1.674.10892.1.200.10.1.13.1 =  $1.3.6.1.4.1.674.10892.1.200.10.1.20.1 = '\02\02\02\02\02\02\02'$ 1.3.6.1.4.1.674.10892.1.200.10.1.21.1 = 3 $1.3.6.1.4.1.674.10892.1.200.10.1.22.1 = '\03\03\03\03\03'$  $1.3.6.1.4.1.674.10892.1.200.10.1.23.1 = '\02\02\02\02\02\02\02\02'$ 1.3.6.1.4.1.674.10892.1.200.10.1.24.1 = 3 1.3.6.1.4.1.674.10892.1.200.10.1.25.1 '\03\03\03\03\03\03' = 1.3.6.1.4.1.674.10892.1.200.10.1.26.1 '\02\02\02\02' = 1.3.6.1.4.1.674.10892.1.200.10.1.27.1 = 3 1.3.6.1.4.1.674.10892.1.200.10.1.28.1 = '\03\03\03\03' 1.3.6.1.4.1.674.10892.1.200.10.1.29.1 '\02' = 1.3.6.1.4.1.674.10892.1.200.10.1.30.1 = 3  $1.3.6.1.4.1.674.10892.1.200.10.1.31.1 = '\03'$ 1.3.6.1.4.1.674.10892.1.200.10.1.41.1 = 31.3.6.1.4.1.674.10892.1.200.10.1.42.1 =3  $1.3.6.1.4.1.674.10892.1.200.10.1.43.1 = '\03'$ 

1.3.6.1.4.1.674.10892.1.300.10.1.1.1	=	1
1.3.6.1.4.1.674.10892.1.300.10.1.2.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.3.1	=	2
1.3.6.1.4.1.674.10892.1.300.10.1.4.1	=	3
1.3.6.1.4.1.674.10892.1.300.10.1.5.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.6.1	=	23
1.3.6.1.4.1.674.10892.1.300.10.1.7.1	=	'Main System Chassis'
1.3.6.1.4.1.674.10892.1.300.10.1.8.1	=	'Dell Inc.'
1.3.6.1.4.1.674.10892.1.300.10.1.9.1	=	'PowerEdge 2650'
1.3.6.1.4.1.674.10892.1.300.10.1.10.1	=	'ASSETTAG'
1.3.6.1.4.1.674.10892.1.300.10.1.11.1	=	'1234567'
1.3.6.1.4.1.674.10892.1.300.10.1.12.1	=	254
1.3.6.1.4.1.674.10892.1.300.10.1.13.1	=	289
1.3.6.1.4.1.674.10892.1.300.10.1.14.1	=	4
1.3.6.1.4.1.674.10892.1.300.10.1.15.1	=	'SERVER01'
1.3.6.1.4.1.674.10892.1.300.10.1.16.1	=	'20050513095213.000000-360'
1.3.6.1.4.1.674.10892.1.300.10.1.17.1	=	'20050513100052.000000-360'
1.3.6.1.4.1.674.10892.1.300.10.1.18.1	=	'Please set the value'
1.3.6.1.4.1.674.10892.1.300.10.1.19.1	=	'Please set the value'
1.3.6.1.4.1.674.10892.1.300.10.1.20.1	=	'Please set the value'
1.3.6.1.4.1.674.10892.1.300.10.1.21.1	=	3
1.3.6.1.4.1.674.10892.1.300.10.1.22.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.23.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.24.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.25.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.26.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.27.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.28.1	=	8
1.3.6.1.4.1.674.10892.1.300.10.1.29.1	=	2

1.3.6.1.4.1.674.10892.1.300.10.1.30.1	=	1
1.3.6.1.4.1.674.10892.1.300.10.1.31.1	=	15
1.3.6.1.4.1.674.10892.1.300.10.1.32.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.33.1	=	27
1.3.6.1.4.1.674.10892.1.300.10.1.34.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.35.1	=	1
1.3.6.1.4.1.674.10892.1.300.10.1.36.1	=	480
1.3.6.1.4.1.674.10892.1.300.10.1.37.1	=	1
1.3.6.1.4.1.674.10892.1.300.10.1.38.1	=	2
1.3.6.1.4.1.674.10892.1.300.10.1.39.1	=	2
1.3.6.1.4.1.674.10892.1.300.10.1.44.1	=	0
1.3.6.1.4.1.674.10892.1.300.10.1.45.1	=	0
1.3.6.1.4.1.674.10892.1.300.40.1.1.1.1	=	1
1.3.6.1.4.1.674.10892.1.300.40.1.2.1.1	=	1
1.3.6.1.4.1.674.10892.1.300.40.1.3.1.1	=	8
1.3.6.1.4.1.674.10892.1.300.40.1.4.1.1	=	2
1.3.6.1.4.1.674.10892.1.300.40.1.5.1.1	=	'Log cleared'
1.3.6.1.4.1.674.10892.1.300.40.1.6.1.1	=	2
1.3.6.1.4.1.674.10892.1.300.40.1.7.1.1	=	3
1.3.6.1.4.1.674.10892.1.300.40.1.8.1.1	=	'20050513100047.000000-360'

## Glossary

The following list defines or identifies technical terms, abbreviations, and acronyms used in Dell<sup>™</sup> user documents.

## A

Abbreviation for ampere(s).

## AC

Abbreviation for alternating current.

## AC power switch

A switch with two AC power inputs that provides AC power redundancy by failing over to a standby AC input in the event of a failure to the primary AC input.

#### access

Refers to the actions a user can take on a variable value. Examples include read-only and read-write.

## adapter card

An expansion card that plugs into an expansion-card connector on the computer's system board. An adapter card adds some specialized function to the computer by providing an interface between the expansion bus and a peripheral device. Examples of adapter cards include network cards, sound cards, and SCSI adapters.

## ADB

Abbreviation for assign database.

## AGP

Abbreviation for Advanced Graphics Port. A high performance graphics interface becoming available for Pentium Pro systems.

## ASCII

Acronym for American Standard Code for Information Interchange. A text file containing only characters from the ASCII character set (usually created with a text editor, such as Notepad in Microsoft<sup>®</sup> Windows<sup>®</sup>), is called an ASCII file.

## ASIC

Acronym for application-specific integrated circuit.

## ASPI

Advanced SCSI programming interface.

## ASR

Abbreviation for automatic system recovery.

#### asset tag code

An individual code assigned to a computer, usually by a system administrator, for security or tracking purposes.

#### attribute

An attribute, or property, contains a specific piece of information related to a component. Attributes can be combined to form groups. If an attribute is defined as read-write, it may be defined by a management application.

## autoexec.bat file

The **autoexec.bat** file is executed when you boot your computer (after executing any commands in the **config.sys** file). This start-up file contains commands that define the characteristics of each device connected to your computer, and it finds and executes programs stored in locations other than the active directory.

#### backup

A copy of a program or data file. As a precaution, you should back up your computer's hard drive on a regular basis. Before making a change to the configuration of your computer, you should back up important start-up files from your operating system.

#### baud rate

A measurement of data transmission speed. For example, modems are designed to transmit data at one or more specified baud rate(s) through the COM (serial) port of a computer.

#### beep code

A diagnostic message in the form of a pattern of beeps from your computer's speaker. For example, one beep, followed by a second beep, and then a burst of three beeps is beep code 1-1-3.

#### BGA

Abbreviation for Ball Grid Array, an IC package that uses an array of solder balls, instead of pins, to connect to a PC board.

#### binary

A base-2 numbering system that uses 0 and 1 to represent information. The computer performs operations based on the ordering and calculation of these numbers.

## BIOS

Acronym for basic input/output system. Your computer's BIOS contains programs stored on a flash memory chip. The BIOS controls the following:

Communications between the microprocessor and peripheral devices, such as the keyboard and the video adapter

Miscellaneous functions, such as system messages

#### bit

The smallest unit of information interpreted by your computer.

#### BMC

Abbreviation for baseboard management controller, which is a controller that provides the intelligence in the IPMI structure.

#### boot routine

When you start your computer, it clears all memory, initializes devices, and loads the operating system. Unless the operating system fails to respond, you can reboot (also called *warm boot*) your computer by pressing <Ctrl><Alt><Del>; otherwise, you must perform a cold boot by pressing the reset button or by turning the computer off and then back on.

#### bootable diskette

You can start your computer from a diskette. To make a bootable diskette, insert a diskette in the diskette drive, type sys a: at the command line prompt, and press <Enter>. Use this bootable diskette if your computer will not boot from the hard drive.

#### bpi

Abbreviation for bits per inch.

## bps

Abbreviation for bits per second.

## BTU

Abbreviation for British thermal unit.

#### bus

An information pathway between the components of a computer. Your computer contains an expansion bus that allows the microprocessor to communicate with controllers for all the various peripheral devices connected to the computer. Your computer also contains an address bus and a data bus for communications between the microprocessor and RAM.

#### byte

Eight contiguous bits of information, the basic data unit used by your computer.

## C

Abbreviation for Celsius.

#### cache

A fast storage area that keeps a copy of data or instructions for quicker data retrieval. For example, your computer's BIOS may cache ROM code in faster RAM. Or, a disk-cache utility may reserve RAM in which to store frequently accessed information from your computer's disk drives; when a program makes a request to a disk drive for data that is in the cache, the disk-cache utility can retrieve the data from RAM faster than from the disk drive.

#### capability

Refers to the actions that an object can perform, or actions that can be taken on a managed object. For example, if a card is hot-pluggable, it is capable of being replaced while the system power is ON.

#### **CDRAM**

Abbreviation for cached DRAM, which is a high-speed DRAM memory chip developed by Mitsubishi that includes a small SRAM cache.

## **CD-ROM**

Abbreviation for compact disc read-only memory. CD drives use optical technology to read data from CDs. CDs are read-only storage devices; you cannot write new data to a CD with standard CD drives.

## chip

A set of microminiaturized, electronic circuits that are designed for use as processors and memory in computers. Small chips can hold from a handful to tens of thousands of transistors. They look like tiny chips of aluminum, no more than 1/16" square by 1/30" thick, which is where the term "chip" came from. Large chips, which can be more than a half inch square, hold millions of transistors. It is actually only the top one thousandth of an inch of a chip's surface that holds the circuits. The rest of it is just a base.

## CIM

Acronym for Common Information Model, which is a model for describing management information from the DMTF. CIM is implementation independent, allowing different management applications to collect the required data from a variety of sources. CIM includes schemas for systems, networks, applications and devices, and new schemas will be added. It provides mapping techniques for interchange of CIM data with MIB data from SNMP agents and MIF data from DMI-compliant systems.

## CIMOM

Acronym for common information model object manager.

## CI/O

Acronym for comprehensive input/output.

## cm

Abbreviation for centimeter(s).

## CMOS

Acronym for complementary metal-oxide semiconductor. In computers, CMOS memory chips are often used for NVRAM storage.

## COM n

The device names for the first through fourth serial ports on your computer are COM1, COM2, COM3, and COM4. The default interrupt for COM1 and COM3 is IRQ4, and the default interrupt for COM2 and COM4 is IRQ3. Therefore, you must be careful when configuring software that runs a serial device so that you don't create an interrupt conflict.

## component

As they relate to DMI, manageable components are operating systems, computer systems, expansion cards, or peripherals that are compatible with DMI. Each component is made up of groups and attributes that are defined as relevant to that component.

#### config.sys file

The **config.sys** file is executed when you boot your computer (before running any commands in the **autoexec.bat** file). This start-up file contains commands that specify which devices to install and which drivers to use. This file also contains commands that determine how the operating system uses memory and controls files.

#### controller

A chip that controls the transfer of data between the microprocessor and memory or between the microprocessor and a peripheral device such as a disk drive or the keyboard.

#### control panel

The part of the computer that contains indicators and controls, such as the power switch, hard drive access indicator, and power indicator.

#### conventional memory

The first 640 KB of RAM. Conventional memory is found in all computers. Unless they are specially designed, MS-DOS<sup>®</sup> programs are limited to running in conventional memory.

## C00

Acronym for cost of ownership.

## cooling unit

Sets of fans or other cooling devices in a system chassis.

#### coprocessor

A chip that relieves the computer's microprocessor of specific processing tasks. A math coprocessor, for example, handles numeric processing. A graphics coprocessor handles video rendering. The Intel<sup>®</sup> Pentium<sup>®</sup> microprocessor, for example, includes a built-in math coprocessor.

## срі

Abbreviation for characters per inch.

## CPU

Abbreviation for central processing unit. See also <term>.

## CRC

Abbreviation for cyclic redundancy code, which is a number derived from, and stored or transmitted with, a block of data in order to detect corruption. By recalculating the CRC and comparing it to the value originally transmitted, the receiver can detect some types of transmission errors.

#### cursor

A marker, such as a block, underscore, or pointer that represents the position at which the next keyboard or mouse action will occur.

## DAT

Acronym for digital audio tape.

## dB

Abbreviation for decibel(s).

## dBA

Abbreviation for adjusted decibel(s).

## DC

Abbreviation for direct current.

## device driver

A program that allows the operating system or some other program to interface correctly with a peripheral device, such as a printer. Some device drivers—such as network drivers—must be loaded from the **config.sys** file (with a **device=** statement) or as memory-resident programs (usually, from the **autoexec.bat** file). Others such as video drivers—must load when you start the program for which they were designed.

## DIMM

Acronym for dual in-line memory module. A small circuit board containing DRAM chips that connects to the system board.

## DIN

Acronym for *Deutsche Industrie* Norm which is the standards-setting organization for Germany.

A DIN connector is a connector that conforms to one of the many standards defined by DIN. DIN connectors are used widely in personal computers. For example, the keyboard connector for PCs is a DIN connector.

## DIP

Acronym for dual in-line package. A circuit board, such as a system board or expansion card, may contain DIP switches for configuring the circuit board. DIP switches are always toggle switches, with an ON position and an OFF position.

## directory

Directories help keep related files organized on a disk in a hierarchical, "inverted tree" structure. Each disk has a "root" directory; for example, a C: \> prompt normally indicates that you are at the root directory of hard-drive C. Additional directories that branch off of the root directory are called *subdirectories*. Subdirectories may contain additional directories branching off of them.

## display adapter

See video adapter.

## DMA

Abbreviation for direct memory access. A DMA channel allows certain types of data transfer between RAM and a device to bypass the microprocessor.

## DMI

Abbreviation for Desktop Management Interface. DMI enables the management of your computer system's software and hardware. DMI collects information about the system's components, such as the operating system, memory, peripherals, expansion cards, and asset tag. Information about the system's components is displayed as a MIF file or through the Dell Inspector program.

## DMTF

Abbreviation for Distributed Management Task Force, a consortium of companies representing hardware and software providers, of which Dell is a member.

## dpi

Abbreviation for dots per inch.

## DPMS

Abbreviation for Display Power Management Signaling. A standard developed by the Video Electronics Standards Association (VESA<sup>®</sup>) that defines the hardware signals sent by a video controller to activate power management states in a monitor. A monitor is said to be DPMS-compliant when it is designed to enter a power management state after receiving the appropriate signal from a computer's video controller.

## DRAC

Abbreviation for Dell Remote Access Card.

## DRAM

Acronym for dynamic random-access memory. A computer's RAM is usually made up entirely of DRAM chips. Because DRAM chips cannot store an electrical charge indefinitely, your computer continually refreshes each DRAM chip in the computer.

## drive-type number

Your computer can recognize a number of specific hard drives. Each is assigned a drive-type number that is stored in NVRAM. The hard drive(s) specified in your computer's System Setup program must match the actual drive(s) installed in the computer. The System Setup program also allows you to specify physical parameters (logical cylinders, logical heads, cylinder number, and logical sectors per pack) for drives not included in the table of drive types stored in NVRAM.

## DTE

Abbreviation for data terminal equipment. Any device, such as a computer system, that can send data in digital form by means of a cable or communications line. The DTE is connected to the cable or communications line through a data communications equipment (DCE) device, such as a modem.

## ECC

Abbreviation for error checking and correction.

## ECP

Abbreviation for Extended Capabilities Port.

## ED0

Acronym for extended data output dynamic random access memory which is a type of DRAM that is faster than conventional DRAM. EDO RAM can start fetching the next block of memory at the same time that it sends the previous block to the CPU.

## EEPROM

Acronym for electrically erasable programmable read-only memory.

## EIDE

Abbreviation for enhanced integrated drive electronics. EIDE devices add one or more of the following enhancements to the traditional IDE standard:

Data transfer rates of up to 16 MB/sec

Support for drives other than just hard drives, such as CD and tape drives

Support for hard drives with capacities greater than 528 MB

Support for up to two controllers, each with up to two devices attached

## EISA

Acronym for Extended Industry-Standard Architecture, a 32-bit expansion-bus design. The expansion-card connectors in an EISA computer are also compatible with 8- or 16-bit ISA expansion cards.

To avoid a configuration conflict when installing an EISA expansion card, you must use the EISA Configuration Utility. This utility allows you to specify which expansion slot contains the card and obtains information about the card's required system resources from a corresponding EISA configuration file.

## EMC

Abbreviation for Electromagnetic Compatibility.

## EMI

Abbreviation for electromagnetic interference.

## EMM

Abbreviation for expanded memory manager. A utility that uses extended memory to emulate expanded memory on computers with an Intel386<sup>™</sup> or higher microprocessor.

## EMS

Abbreviation for Expanded Memory Specification.

## EPP

Abbreviation for Enhanced Parallel Port which provides improved bidirectional data transmission. Many devices are designed to take advantage of the EPP standard, especially devices, such as network or SCSI adapters that connect to the parallel port of a portable computer.

## EPROM

Acronym for erasable programmable read-only memory.

## ESD

Abbreviation for electrostatic discharge.

## ESM

Abbreviation for Embedded Systems Management.

#### expanded memory

A technique for accessing RAM above 1 MB. To enable expanded memory on your computer, you must use an EMM. You should configure your system to support expanded memory only if you run application programs that can use (or require) expanded memory.

#### expansion bus

Your computer contains an expansion bus that allows the microprocessor to communicate with controllers for peripheral devices, such as a network card or an internal modem.

#### expansion-card connector

A connector on the computer's system board or riser board for plugging in an expansion card.

#### extended memory

RAM above 1 MB. Most software that can use it, such as the Windows operating system, requires that extended memory be under the control of an XMM.

## external cache memory

A RAM cache using SRAM chips. Because SRAM chips operate at several times the speed of DRAM chips, the microprocessor can retrieve data and instructions faster from external cache memory than from RAM.

## F

Abbreviation for Fahrenheit.

## FAT

Acronym for file allocation table. The file system structure used by MS-DOS<sup>®</sup> to organize and keep track of file storage. The Windows NT<sup>®</sup> operating systems can optionally use a FAT file system structure.

## FCC

Abbreviation for Federal Communications Commission.

## FEPROM

Acronym for Flash Erasable Programmable Read-Only Memory. Flash memory is a kind of non-volatile storage device similar to EEPROM, but the erasing is done only in blocks or the entire chip.

## flash BIOS

A PC BIOS that is stored in flash memory rather than in a ROM. A flash BIOS chip can be updated in place, whereas a ROM BIOS must be replaced with a newer chip.

## flash memory

A type of EEPROM chip that can be reprogrammed from a utility on diskette while still installed in a computer; most EEPROM chips can only be rewritten with special programming equipment.

## format

To prepare a hard drive or diskette for storing files. An unconditional format deletes all data stored on the disk.

## FPBGA

Acronym for field programmable gate array, a programmable logic chip (PLD) with a high density of gates.

## FRU

Acronym for field replaceable unit.

## ft

Abbreviation for feet.

## FTP

Abbreviation for file transfer protocol.

## g

Abbreviation for gram(s).

## G

Abbreviation for gravities.

## GB

Abbreviation for gigabyte(s). A gigabyte equals 1,024 megabytes or 1,073,741,824 bytes.

## graphics coprocessor

See coprocessor.

## graphics mode

A video mode that can be defined as *x* horizontal by *y* vertical pixels by *z* colors.

## group

As it relates to DMI, a group is a data structure that defines common information, or attributes, about a manageable component.

## GTL

Abbreviation for ground termination logic.

## GUI

Acronym for graphical user interface.

## h

Abbreviation for hexadecimal. A base-16 numbering system, often used in programming to identify addresses in the computer's RAM and I/O memory addresses for devices. The sequence of decimal numbers from 0 through 16, for example, is expressed in hexadecimal notation as: 0, 1, 2, 3, 4, 5, 6, 7, 8, 9, A, B, C, D, E, F, 10. In text, hexadecimal numbers are often followed by *h*.

## heat sink

A metal plate with metal pegs or ribs that help dissipate heat. Most microprocessors include a heat sink.

## HIP

Abbreviation for Hardware Instrumentation Package (HIP).

## HMA

Abbreviation for high memory area. The first 64 KB of extended memory above 1 MB. A memory manager that conforms to the XMS can make the HMA a direct extension of conventional memory. See also **upper memory area** and **XMM**.

## host adapter

A host adapter implements communication between the computer's bus and the controller for a peripheral device. (hard-drive controller subsystems include integrated host adapter circuitry.) To add a SCSI expansion bus to your system, you must install or connect the appropriate host adapter.

## hot plug

The ability to remove and replace a redundant part while the system is being used. Also called a "hot spare."

## HPFS

Abbreviation for the High Performance File System option in the Windows NT operating systems.

## Hz

Abbreviation for hertz.

## ICES

Abbreviation for Interface-Causing Equipment Standard (in Canada).

## ICU

Abbreviation for ISA Configuration Utility.

## IDE

Abbreviation for Integrated Device Electronics. IDE is a computer system interface, used primarily for hard drives and CDs.

## I/0

Abbreviation for input/output. The keyboard is an input device, and a printer is an output device. In general, I/O activity can be differentiated from computational activity. For example, when a program sends a document to the printer, it is engaging in output activity; when the program sorts a list of terms, it is engaging in computational activity.

## ID

Abbreviation for identification.

## IHV

Acronym for independent hardware vendor. IHVs often develop their own MIBs for components that they manufacture.

## interlacing

A technique for increasing video resolution by only updating alternate horizontal lines on the screen. Because interlacing can result in noticeable screen flicker, most users prefer noninterlaced video adapter resolutions.

## internal microprocessor cache

An instruction and data cache built in to the microprocessor. The Intel Pentium microprocessor includes a 16-KB internal cache, which is set up as an 8-KB read-only instruction cache and an 8-KB read/write data cache.

## **IP Address**

Abbreviation for Internet Protocol address. See TCP/IP.

## IPMI

Abbreviation for Intelligent Platform Management Interface, which is an industry standard for management of peripherals used in enterprise computers based on Intel architecture. The key characteristic of IPMI is that inventory, monitoring, logging, and recovery control functions are available independent of the main processors, BIOS, and operating system.

## IPX

Acronym for internetwork packet exchange.

## IRQ

Abbreviation for interrupt request. A signal that data is about to be sent to or received by a peripheral device travels by an IRQ line to the microprocessor. Each peripheral connection must be assigned an IRQ number. For example, the first serial port in your computer (COMI) is assigned to IRQ4 by default. Two devices can share the same IRQ assignment, but you cannot operate both devices simultaneously.

## ISA

Acronym for Industry-Standard Architecture. A 16-bit expansion bus design. The expansion-card connectors in an ISA computer are also compatible with 8-bit ISA expansion cards.

## ITE

Abbreviation for information technology equipment.

## jumper

Jumpers are small blocks on a circuit board with two or more pins emerging from them. Plastic plugs containing a wire fit down over the pins. The wire connects the pins and creates a circuit. Jumpers provide a simple and reversible method of changing the circuitry in a printed circuit board.

## K

Abbreviation for kilo-, indicating 1,000.

## KB

Abbreviation for kilobyte(s), 1,024 bytes.

## KB/sec

Abbreviation for kilobyte(s) per second.

## Kbit(s)

Abbreviation for kilobit(s), 1,024 bits.

## Kbit(s)/sec

Abbreviation for kilobit(s) per second.

#### key combination

A command requiring you to press multiple keys at the same time. For example, you can reboot your computer by pressing the <Ctrl><Alt><Del> key combination.

## kg

Abbreviation for kilogram(s), 1,000 grams.

## kHz

Abbreviation for kilohertz, 1,000 hertz.

## LAN

Acronym for local area network. A LAN system is usually confined to the same building or a few nearby buildings, with all equipment linked by wiring dedicated specifically to the LAN.

## lb

Abbreviation for pound(s).

## LCC

Acronym for leaded or leadless chip carrier.

## LIF

Acronym for low insertion force. Some computers use LIF sockets and connectors to allow devices, such as the microprocessor chip, to be installed or removed with minimal stress to the device.

## LED

Abbreviation for light-emitting diode. An electronic device that lights up when a current is passed through it.

## local bus

On a computer with local-bus expansion capability, certain peripheral devices (such as the video adapter circuitry) can be designed to run much faster than they would with a traditional expansion bus. Some local-bus designs allow peripherals to run at the same speed and with the same width data path as the computer's microprocessor.

## LPTn

The device names for the first through third parallel printer ports on your computer are LPT1, LPT2, and LPT3.

## LRA

Acronym for local response agent.

## m

Abbreviation for meter(s).

## mA

Abbreviation for milliampere(s).

## mAh

Abbreviation for milliampere-hour(s).

## math coprocessor

See coprocessor.

## Mb

Abbreviation for megabit.

## MB

Abbreviation for megabyte(s). The term *megabyte* means 1,048,576 bytes; however, when referring to hard-drive storage, the term is often rounded to mean 1,000,000 bytes.

## MB/sec

Abbreviation for megabytes per second.

## Mbps

Abbreviation for megabits per second.

## MBR

Abbreviation for master boot record.

## MCA

Abbreviation for Micro Channel Architecture, which is designed for multiprocessing. MCA eliminates potential conflicts that arise when installing new peripheral devices. MCA is not compatible with either EISA or XT bus architecture, so older cards cannot be used with it.

#### memory

A computer can contain several different forms of memory, such as RAM, ROM, and video memory. Frequently, the word *memory* is used as a synonym for RAM; for example, an unqualified statement such as "a computer with 16 MB of memory" refers to a computer with 16 MB of RAM.

#### memory address

A specific location, usually expressed as a hexadecimal number, in the computer's RAM.

#### memory manager

A utility that controls the implementation of memory in addition to conventional memory, such as extended or expanded memory.

#### memory module

A small circuit board containing DRAM chips that connects to the system board.

#### MHz

Abbreviation for megahertz.

#### MIB

Acronym for management information base. MIB is used to send detailed status/commands from or to an SNMP managed device.

#### microprocessor

The primary computational chip inside the computer that controls the interpretation and execution of arithmetic and logic functions. Software written for one microprocessor must usually be revised to run on another microprocessor. *CPU* is a synonym for microprocessor.

## MIDI

Abbreviation for musical instrument digital interface.

#### MIF

Acronym for management information format. A MIF file contains information, status, and links to component instrumentation. MIF files are installed into the MIF database by the DMI service layer. The content of a MIF is defined by a DTMF working committee and is published in the form of a MIF definition document. This document identifies the groups and attributes that are relevant to DMI-manageable components.

#### mm

Abbreviation for millimeter(s).

#### modem

A device that allows your computer to communicate with other computers over telephone lines.

#### MOF

Acronym for managed object format, which is an ASCII file that contains the formal definition of a CIM schema.

#### mouse

A pointing device that controls the movement of the cursor on a screen. Mouse-aware software allows you to activate commands by clicking a mouse button while pointing at objects displayed on the screen.

## MPEG

Acronym for Motion Picture Experts Group. MPEG is a digital video file format.

## ms

Abbreviation for millisecond(s).

## MS-DOS

Abbreviation for Microsoft Disk Operating System.

## MTBF

Abbreviation for mean time between failures.

#### multifrequency monitor

A monitor that supports several video standards. A multifrequency monitor can adjust to the frequency range of the signal from a variety of video adapters.

## mV

Abbreviation for millivolt(s).

## name

The name of an object or variable is the exact string that identifies it in an SNMP Management Information Base (MIB) file, or in a DMI Management Information Format (MIF) file, or in a CIM Management Object File (MOF).

## NDIS

Abbreviation for Network Driver Interface Specification.

## NIC

Acronym for network interface controller.

## NIF

Acronym for network interface function. This term is equivalent to NIC.

## NMI

Abbreviation for nonmaskable interrupt. A device sends an NMI to signal the microprocessor about hardware errors, such as a parity error.

## noninterlaced

A technique for decreasing screen flicker by sequentially refreshing each horizontal line on the screen.

## ns

Abbreviation for nanosecond(s), one billionth of a second.

## NTFS

Abbreviation for the NT File System option in the Windows NT operating system.

## NuBus

Proprietary expansion bus used on Apple Macintosh personal computers.

## NVRAM

Acronym for nonvolatile random-access memory. Memory that does not lose its contents when you turn off your computer. NVRAM is used for maintaining the date, time, and system configuration information.

## OID

Abbreviation for object identifier. An implementation-specific integer or pointer that uniquely identifies an object.

## online access service

A service that typically provides access to the Internet, E-mail, bulletin boards, chat rooms, and file libraries.

## ОТР

Abbreviation for one-time programmable.

## parallel port

An I/O port used most often to connect a parallel printer to your computer. You can usually identify a parallel port on your computer by its 25-hole connector.

## parameter

A value or option that you specify to a program. A parameter is sometimes called a *switch* or an *argument*.

## partition

You can divide a hard drive into multiple physical sections called *partitions* with the **fdisk** command. Each partition can contain multiple logical drives.

After partitioning the hard drive, you must format each logical drive with the **format** command.

## PC 98

The third PC 9x specification, which defines five categories (Consumer, Office, Mobile, Entertainment and Workstation). It eliminates the ISA bus and pushes the minimum requirements to a 200MHz CPU with 32MB of RAM and 256K of L2 cache. PC 98 machines must support OnNow, and the BIOS must support booting from a CD and be Y2K compliant. Systems cannot ship with ISA cards installed, but may have an ISA bus for legacy devices.

## PC card

A credit-card sized, removable module for portable computers standardized by PCMCIA. PC Cards are also known as "PCMCIA cards." PC Cards are 16-bit devices that are used to attach modems, network adapters, sound cards, radio transceivers, solid state disks and hard disks to a portable computer. The PC Card is a "plug and play" device, which is configured automatically by the Card Services software.

## PCI

Abbreviation for Peripheral Component Interconnect. A standard for local-bus implementation developed by Intel Corporation.

## PCIX

Abbreviation for PCI extended.

## PCMCIA

Personal Computer Memory Card International Association. An international trade association that has developed standards for devices, such as modems and external hard drives, that can be plugged into portable computers.

## PERC

Acronym for PowerEdge Expandible RAID controller.

## peripheral device

An internal or external device—such as a printer, a disk drive, or a keyboard—connected to a computer.

## PGA

Abbreviation for pin grid array, a type of microprocessor socket that allows you to remove the microprocessor chip.

## physical memory array

The physical memory array is the entire physical memory of a system. Variables for physical memory array include maximum size, total number of memory slots on the motherboard, and total number of slots in use.

## physical memory array mapped

The physical memory array mapped refers to the way physical memory is divided. For example, one mapped area may have 640 KB and the other mapped area may have between 1 Megabyte and 127 Megabytes.

## PIC

Acronym for programmable interrupt controller.

## PIP

Acronym for peripheral interchange program. A CP/M utility program that was used to copy files.

## pixel

A single point on a video display. Pixels are arranged in rows and columns to create an image. A video resolution, such as 640 x 480, is expressed as the number of pixels across by the number of pixels up and down.

## PLCC

Acronym for plastic leaded chip carrier.

## **Plug and Play**

An industry-standard specification that makes it easier to add hardware devices to personal computers. Plug and Play provides automatic installation and configuration, compatibility with existing hardware, and dynamic support of mobile computing environments.

## PME

Abbreviation for Power Management Event. A PME is a pin on a peripheral component interconnect that allows a PCI device to assert a wake event.

## POST

Acronym for power-on self-test. Before the operating system loads when you turn on your computer, the POST tests various system components such as RAM, the disk drives, and the keyboard.

## power supply

An electrical system that converts AC current from the wall outlet into the DC currents required by the computer circuitry. The power supply in a personal computer typically generates multiple voltages.

## power unit

A set of power supplies in a system chassis.

## ppm

Abbreviation for pages per minute.

## PQFP

Abbreviation for plastic quad flat pack, a type of microprocessor socket in which the microprocessor chip is permanently mounted.

## protected mode

An operating mode supported by 80286 or higher microprocessors, protected mode allows operating systems to implement:

- A memory address space of 16 MB (80286 microprocessor) to 4 GB (Intel386 or higher microprocessor)
- Multitasking
- Virtual memory, a method for increasing addressable memory by using the hard drive

Windows, OS/2, and UNIX<sup>®</sup> 32-bit operating systems run in protected mode. MS-DOS cannot run in protected mode; however, some programs that you can start from MS-DOS, such as the Windows operating system, are able to put the computer into protected mode.

## provider

A provider is an extension of a CIM schema that communicates with managed objects and accesses data and event notifications from a variety of sources. Providers forward this information to the CIM Object Manager for integration and interpretation.

## PS/2

Abbreviation for Personal System/2.

## PXE

Abbreviation for Pre-boot eXecution Environment.

## QFP

Acronym for quad flat pack.

## RAID

Acronym for redundant array of independent drives.

## RAM

Acronym for random-access memory. The computer's primary temporary storage area for program instructions and data. Each location in RAM is identified by a number called a *memory address*. Any information stored in RAM is lost when you turn off your computer.

## RAMBUS

Acronym for Rambus DRAM, a type of memory (DRAM) developed by Rambus, Inc.

## RAMDAC

Acronym for random-access memory digital-to-analog converter.

## RAW

Unprocessed. The term refers to data that is passed along to an I/O device without being interpreted. In contrast, *cooked* refers to data that is processed before being passed to the I/O device.

It often refers to uncompressed text that is not stored in any proprietary format. The term comes from UNIX, which supports cooked and raw modes for data output to a terminal.

#### RDRAM

Acronym for Rambus DRAM. A dynamic RAM chip technology from Rambus, Inc. Direct RDRAMs are used in computers. Direct RDRAM chips are housed in RIMM modules, which are similar to DIMMs but have different pin settings. The chips can be built with dual channels, doubling the transfer rate to 3.2 GB/sec.

#### read-only file

A read-only file is one that you are prohibited from editing or deleting. A file can have read-only status if:

Its read-only attribute is enabled.

It resides on a physically write-protected diskette or on a diskette in a write-protected drive.

It is located on a network in a directory to which the system administrator has assigned read-only rights to you.

#### readme file

A text file included with a software package or hardware product that contains information supplementing or updating the documentation for the software or hardware. Typically, readme files provide installation information, describe new product enhancements or corrections that have not yet been documented, and list known problems or other things you need to be aware of as you use the software or hardware.

## real mode

An operating mode supported by 80286 or higher microprocessors, real mode imitates the architecture of an 8086 microprocessor.

## refresh rate

The rate at which the monitor redraws the video image on the monitor screen. More precisely, the refresh rate is the frequency, measured in Hz, at which the screen's horizontal lines are recharged (sometimes also referred to as its *vertical frequency*). The higher the refresh rate, the less video flicker can be seen by the human eye. The higher refresh rates are also noninterlaced.

## RFI

Abbreviation for radio frequency interference.

## RGB

Abbreviation for red/green/blue.

## RIMM

Acronym for Rambus In-line Memory Module, which is the Rambus equivalent of a DIMM module.

## ROM

Acronym for read-only memory. Your computer contains some programs essential to its operation in ROM code. Unlike RAM, a ROM chip retains its contents even after you turn off your computer. Examples of code in ROM include the program that initiates your computer's boot routine and the POST.

## rpm

Abbreviation for revolutions per minute.

## RTC

Abbreviation for real-time clock. Battery-powered clock circuitry inside the computer that keeps the date and time after you turn off the computer.

## SAS

Acronym for Serial Attached SCSI.

## SCA

Acronym for single connector attachment.

## schema

A collection of class definitions that describes managed objects in a particular environment. A CIM schema is a collection of class definitions used to represent managed objects that are common to every management environment, which is why CIM is called the Common Information Model.

## SCSI

Acronym for small computer system interface. An I/O bus interface with faster data transmission rates than standard ports. You can connect up to seven devices (15 for some newer SCSI types) to one SCSI interface.

#### SDMS

Abbreviation for SCSI device management system.

#### sec

Abbreviation for second(s).

#### SEC

Abbreviation for single-edge contact.

#### serial port

An I/O port used most often to connect a modem to your computer. You can usually identify a serial port on your computer by its 9-pin connector.

#### settings

Settings are conditions of a manageable object help to determine what happens when a certain value is detected in a component. For example, a user can set the upper critical threshold of a temperature probe to 75 degrees Celsius. If the probe reaches that temperature, the setting results in an alert being sent to the management console so that user intervention can be taken. Some settings, when reached, can trigger a system shutdown or other response that can prevent damage to the system.

#### service tag number

A bar code label on the computer that identifies it when you call Dell for customer or technical support.

## SGRAM

Acronym for synchronous graphics RAM.

#### shadowing

A computer's system and video BIOS code is usually stored on ROM chips. Shadowing refers to the performance-enhancement technique that copies BIOS code to faster RAM chips in the upper memory area (above 640 KB) during the boot routine.

## SIMD

Abbreviation for Single Instruction Multiple Data.

#### SIMM

Acronym for single in-line memory module. A small circuit board containing DRAM chips that connects to the system board.

## SIP

Acronym for single in-line package, which is a type of housing for electronic components in which the connecting pins protrude from one side. A SIP is also called a Single In-line Pin Package (SIPP).

## SKU

Acronym for stock keeping unit.

#### SMART

Acronym for Self-Monitoring Analysis Reporting Technology. A technology that allows hard drives to report errors and failures to the system BIOS, which then displays an error message on the screen. To take advantage of this technology, you must have a SMART-compliant hard drive and the proper support in the system BIOS.

## **SMBIOS**

Acronym for system management BIOS.

## SMD

Acronym for surface mount device.

## SNMP

Abbreviation for Simple Network Management Protocol. SNMP is an industry-standard interface that allows a network manager to remotely monitor and manage workstations.

## SODIMM

Acronym for small outline-DIMM. A DIMM module with a thinner profile due to the use of TSOP chip packages. SODIMMs are commonly used in laptop computers.

## SOIC

Acronym for Small Outline IC, a small-dimension, plastic, rectangular, surface mount chip package that uses gull-wing pins extending outward.

## SOJ

Acronym for small outline package J-lead, a small-dimension, plastic, rectangular surface mount chip package with j-shaped pins on its two long sides.

## SRAM

Abbreviation for static random-access memory. Because SRAM chips do not require continual refreshing, they are substantially faster than DRAM chips.

## state

Refers to the condition of an object that can have more than one condition. For example, an object may be in the "not ready" state.

#### status

Refers to the health or functioning of an object. For example, a temperature probe can have the status normal if the probe is measuring acceptable temperatures. When the probe begins reading temperatures that exceed limits set by the user, it reports a critical status.

## SVGA

Abbreviation for super video graphics array. VGA and SVGA are video standards for video adapters with greater resolution and color display capabilities than previous standards.

To display a program at a specific resolution, you must install the appropriate video drivers and your monitor must support the resolution. Similarly, the number of colors that a program can display depends on the capabilities of the monitor, the video driver, and the amount of video memory installed in the computer.

## switch

On a computer system board, switches control various circuits or functions in your computer system. These switches are known as *DIP switches*; they are normally packaged in groups of two or more switches in a plastic case. Two common DIP switches are used on system boards: *slide* switches and *rocker* switches. The names of the switches are based on how the settings (on and off) of the switches are changed.

#### syntax

The rules that dictate how you must type a command or instruction so that the computer understands it. A variable's syntax indicates its data type.

#### system board

As the main circuit board, the system board usually contains most of your computer's integral components, such as the following:

- Microprocessor
- RAM
- Controllers for standard peripheral devices, such as the keyboard
- Various ROM chips

Frequently used synonyms for system board are *motherboard* and *logic board*.

## system configuration information

Data stored in memory that tells a computer what hardware is installed and how the computer should be configured for operation.

## system diskette

System diskette is a synonym for bootable diskette.

#### system memory

System memory is a synonym for RAM.

## System Setup program

A BIOS-based program that allows you to configure your computer's hardware and customize the computer's operation by setting such features as password protection and energy management. Some options in the System Setup program require that you reboot the computer (or the computer may reboot automatically) in order to make a hardware configuration change. Because the System Setup program is stored in NVRAM, any settings remain in effect until you change them again.

#### system.ini file

A start-up file for the Windows operating system. When you start Windows, it consults the **system.ini** file to determine a variety of options for the Windows operating environment. Among other things, the **system.ini** file records which video, mouse, and keyboard drivers are installed for Windows.

Running the Control Panel or Windows Setup program may change options in the **system.ini** file. On other occasions, you may need to change or add options to the **system.ini** file manually with a text editor, such as Notepad.

#### table

In SNMP MIBs, a table is a two dimensional array that describes the variables that make up a managed object.

## TCP/IP

Abbreviation for Transmission Control Protocol/Internet Protocol. A system for transferring information over a computer network containing dissimilar systems, such as systems running Windows and UNIX.

#### termination

Some devices (such as the last device at each end of a SCSI cable) must be terminated to prevent reflections and spurious signals in the cable. When such devices are connected in a series, you may need to enable or disable the termination on these devices by changing jumper or switch settings on the devices or by changing settings in the configuration software for the devices.

## text editor

An application program for editing text files consisting exclusively of ASCII characters. Windows Notepad is a text editor, for example. Most word processors use proprietary file formats containing binary characters, although some can read and write text files.

#### text mode

A video mode that can be defined as *x* columns by *y* rows of characters.

#### threshold values

Systems are normally equipped with various sensors that monitor temperature, voltage, current, and fan speed. The sensor's threshold values specify the ranges (min and max values) for determining whether the sensor is operating under normal, noncritical, critical or fatal conditions. Dell-supported threshold values are

UpperThresholdFatal UpperThresholdCritical UpperThresholdNon-critical Normal LowerThresholdNon-critical LowerThresholdCritical LowerThresholdFatal

#### time-out

A specified period of system inactivity that must occur before an energy conservation feature is activated.

## tpi

Abbreviation for tracks per inch.

## TQFP

Acronym for thin quad flat pack.

## TSR

Abbreviation for terminate-and-stay-resident. A TSR program runs "in the background." Most TSR programs implement a predefined key combination (sometimes referred to as a *hot key*) that allows you to activate the TSR program's interface while running another program. When you finish using the TSR program, you can return to the other application program and leave the TSR program resident in memory for later use.

TSR programs can sometimes cause memory conflicts. When troubleshooting, rule out the possibility of such a conflict by rebooting your computer without starting any TSR programs.

#### TSOP

Acronym for thin small outline package. A very-thin, plastic, rectangular surface mount chip package with gull-wing pins on its two short sides. TSOPs are about a third as thick as SOJ chips.

#### UART

Acronym for universal asynchronous receiver transmitter, the electronic circuit that makes up the serial port.

#### UDP

Acronym for user datagram protocol.

#### UL

Abbreviation for Underwriters Laboratories.

#### UMB

Abbreviation for upper memory blocks.

#### unicode

A fixed width, 16-bit world wide character encoding, developed and maintained by the Unicode Consortium.

#### upper memory area

The 384 KB of RAM located between 640 KB and 1 MB. If the computer has an Intel386 or higher microprocessor, a utility called a *memory manager* can create UMBs in the upper memory area, in which you can load device drivers and memory-resident programs.

#### UPS

Abbreviation for uninterruptible power supply. A battery-powered unit that automatically supplies power to your computer in the event of an electrical failure.

#### USB

Abbreviation for Universal Serial Bus. A USB connector provides a single connection point for multiple USB-compliant devices, such as mice, keyboards, printers, and computer speakers. USB devices can also be connected and disconnected while the system is running.

#### utility

A program used to manage system resources—memory, disk drives, or printers, for example.

#### UTP

Abbreviation for unshielded twisted pair.

#### UUID

Acronym for Universal Unique Identification.

#### V

Abbreviation for volt(s).

#### VAC

Abbreviation for volt(s) alternating current.

#### varbind

An algorithm used to assign and object identifier or OID. The varbind gives rules for arriving at the decimal prefix that uniquely identifies an enterprise, as well as the formula for specifying a unique identifier for the objects defined in that enterprise's MIB.

#### variable

A component of a managed object. A temperature probe, for example, has a variable to describe its capabilities, its health or status, and certain indexes that you can use to help you in locating the right temperature probe.

#### VCCI

Abbreviation for Voluntary Control Council for Interference.

#### VCR

Abbreviation for video cassette recorder.

#### VDC

Abbreviation for volt(s) direct current.

#### VESA

Acronym for Video Electronics Standards Association.

#### VGA

Abbreviation for video graphics array. VGA and SVGA are video standards for video adapters with greater resolution and color display capabilities than previous standards. To display a program at a specific resolution, you must install the appropriate video drivers and your monitor must support the resolution. Similarly, the number of colors that a program can display depends on the capabilities of the monitor, the video driver, and the amount of video memory installed for the video adapter.

#### VGA feature connector

On some systems with a built-in VGA video adapter, a VGA feature connector allows you to add an enhancement adapter, such as a video accelerator, to your computer. A VGA feature connector can also be called a VGA *pass-through connector*.

#### video adapter

The logical circuitry that provides—in combination with the monitor—your computer's video capabilities. A video adapter may support more or fewer features than a specific monitor offers. Typically, a video adapter comes with video drivers for displaying popular application programs and operating systems in a variety of video modes.

On some Dell computers, a video adapter is integrated into the system board. Also available are many video adapter cards that plug into an expansion-card connector.

Video adapters often include memory separate from RAM on the system board. The amount of video memory, along with the adapter's video drivers, may affect the number of colors that can be simultaneously displayed. Video adapters can also include their own coprocessor for faster graphics rendering.

#### video driver

A program that allows graphics-mode application programs and operating systems to display at a chosen resolution with the desired number of colors. A software package may include some "generic" video drivers. Any additional video drivers may need to match the video adapter installed in the computer.

#### video memory

Most VGA and SVGA video adapters include memory chips in addition to your computer's RAM. The amount of video memory installed primarily influences the number of colors that a program can display (with the appropriate video drivers and monitor capabilities).

#### video mode

Video adapters normally support multiple text and graphics display modes. Character-based software displays in text modes that can be defined as x columns by y rows of characters. Graphics-based software displays in graphics modes that can be defined as x horizontal by y vertical pixels by z colors.

#### video resolution

Video resolution—800 x 600, for example—is expressed as the number of pixels across by the number of pixels up and down. To display a program at a specific graphics resolution, you must install the appropriate video drivers and your monitor must support the resolution.

#### virtual memory

A method for increasing addressable RAM by using the hard drive. For example, in a computer with 16 MB of RAM and 16 MB of virtual memory set up on the hard drive, the operating system would manage the system as though it had 32 MB of physical RAM.

#### virus

A self-starting program designed to inconvenience you. Virus programs have been known to corrupt the files stored on a hard drive or to replicate themselves until a computer or network runs out of memory.

The most common way that virus programs move from one computer to another is via "infected" diskettes, from which they copy themselves to the hard drive. To guard against virus programs, you should do the following:

- Periodically run a virus-checking utility on your computer's hard drive
- Always run a virus-checking utility on any diskettes (including commercially sold software) before using them

#### VLSI

Abbreviation for very-large-scale integration.

#### VLVESA

Acronym for very low voltage enterprise system architecture.

#### vpp

Abbreviation for peak-point voltage.

#### VRAM

Acronym for video random-access memory. Some video adapters use VRAM chips (or a combination of VRAM and DRAM) to improve video performance. VRAM is dual-ported, allowing the video adapter to update the screen and receive new image data at the same time.

#### VRM

Abbreviation for voltage regulator module.

#### W

Abbreviation for watt(s).

#### Wakeup on LAN

The ability for the power in a client station to be turned on by the network. Remote wake-up enables software upgrading and other management tasks to be performed on users' machines after the work day is over. It also enables remote users to gain access to machines that have been turned off. Intel calls remote wake-up "Wake-on-LAN."

#### WH

Abbreviation for watt-hour(s).

#### win.ini file

A start-up file for the Windows operating system. When you start Windows, it consults the **win.ini** file to determine a variety of options for the Windows operating environment. Among other things, the **win.ini** file records what printer(s) and fonts are installed for Windows. The **win.ini** file also usually includes sections that contain optional settings for Windows application programs that are installed on the hard drive.

Running the Control Panel or Windows Setup program may change options in the **win.ini** file. On other occasions, you may need to change or add options to the **win.ini** file manually with a text editor such as Notepad.

#### Windows 95

An integrated and complete Microsoft Windows operating system that does not require MS-DOS and that provides advanced operating system performance, improved ease of use, enhanced workgroup functionality, and simplified file management and browsing.

#### Windows NT

High-performance server and workstation operating system software developed by Microsoft that is intended for technical, engineering, and financial applications.

#### write-protected

Read-only files are said to be *write-protected*. You can write-protect a 3.5-inch diskette by sliding its write-protect tab to the open position or by setting the write-protect feature in the System Setup program.

#### XMM

Abbreviation for extended memory manager, a utility that allows application programs and operating systems to use extended memory in accordance with the XMS.

#### XMS

Abbreviation for eXtended Memory Specification.

### ZIF

Acronym for zero insertion force. Some computers use ZIF sockets and connectors to allow devices such as the microprocessor chip to be installed or removed with no stress applied to the device.

### ZIP

A 3.5 inch removable disk drive from Iomega. Originally, it provided a 100 MB removable cartridges. The drive is bundled with software that can catalog the disks and lock the files for security.

A 250 MB version of the Zip drive also reads and writes the 100 MB Zip cartridges.

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