

# System Info Profile

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# 1. Scope

The DCIM System Info Profile describes the properties and interfaces for executing system management tasks related to the management of the host system. The profile standardizes and aggregates the description for the platform's basic properties into a system view representation and provides static methodology for the clients to query the system views without substantial traversal of the model.

# 2. Normative References

Refer to the following documents for more information.

**NOTE:** For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

- DMTF DSP1033, Profile Registration Profile 1.0.0
- DMTF DSP0226, Web Services for Management (WS-Management) Specification 1.1.0
- DMTF DSP0227, WS-Management CIM Binding Specification 1.0.0
- Dell Lifecycle Controller Best Practices Guide v1.0, <link TBD>
- Dell WSMAN Licenses and Privileges 1.0
- Dell LC XML Schema Guide
- Dell Tech Center MOF Library:
  - <http://www.delltechcenter.com/page/DCIM.Library.MOF>
  - Related Managed Object Format (MOF) files:
    - DCIM\_SystemView.mof
    - DCIM\_SystemAttribute.mof
    - DCIM\_SystemEnumeration.mof
    - DCIM\_SystemInteger.mof
    - DCIM\_SystemString.mof
    - DCIM\_SystemManagementService.mof
    - DCIM\_LCElementConformsToProfile.mof
    - DCIM\_LCRegisteredProfile.mof

# 3. Terms and Definitions

For the purposes of this document, the following terms and definitions apply.

## 3.1. Conditional

Indicates requirements to be followed strictly in order to conform to the document when the specified conditions are met.

## 3.2. Mandatory

Indicates requirements to be followed strictly in order to conform to the document and from which no deviation is permitted.

## 3.3. May

Indicates a course of action permissible within the limits of the document.

### 3.4. Optional

Indicates a course of action permissible within the limits of the document.

### 3.5. Referencing profile

Indicates a profile that owns the definition of this class and can include a reference to this profile in its “Related Profiles” table.

### 3.6. Shall

Indicates requirements to be followed strictly in order to conform to the document and from which no deviation is permitted.

### 3.7. FQDD

Fully Qualified Device Descriptor is used to identify a particular component in a system.

### 3.8. Interop Namespace: root/interop

Interop Namespace: root/interop is where instrumentation instantiates classes to advertise its capabilities for client discovery.

### 3.9. Implementation Namespace: root/dcim

Implementation Namespace: root/dcim is where instrumentation instantiates classes relevant to executing core management tasks.

### 3.10. ENUMERATE

Refers to WS-MAN `ENUMERATE` operation as described in Section 8.2 of DSP0226\_V1.1 and Section 9.1 of DSP0227\_V1.0

### 3.11. GET

Refers to WS-MAN `GET` operation as defined in Section 7.3 of DSP0226\_V1.1 and Section 7.1 of DSP0227\_V1.0

## 4. Symbols and Abbreviated Terms

### 4.1. CIM

Common Information Model

### 4.2. iDRAC

Integrated Dell Remote Access Controller – management controller for blades and monolithic servers

### 4.3. CMC

Chassis Manager Controller – management controller for the modular chassis

### 4.4. WBEM

Web-Based Enterprise Management

### 4.5. PFC

Power Factor Corrector – controls the power drawn from the power supply.

## 5. Synopsis

Profile Name: System Info

Version: 4.0.0

Organization: Dell

CIM Schema Version: 2.41 Final

Dell Schema Version: 1.0.0

Interop Namespace: root/interop: root/interop

Implementation Namespace: root/dcim: root/dcim

Central Class: DCIM\_SystemView

Scoping Class: DCIM\_ComputerSystem

The Dell System Info Profile is a component profile that contains the Dell specific implementation requirements for system view.

DCIM\_SystemView shall be the Central Class.

Table 1 identifies profiles that are related to this profile.

**Table 1.** Related Profiles

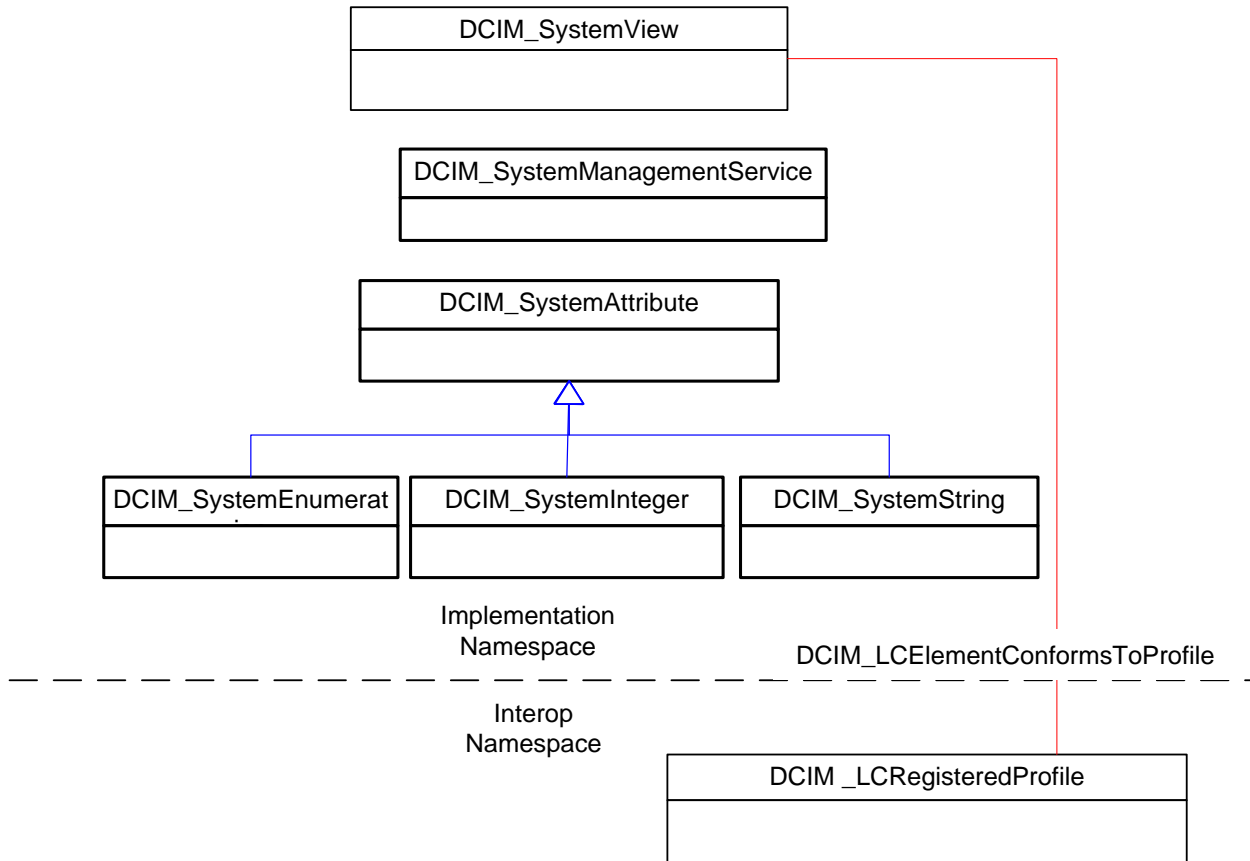
Profile Name	Organization	Version	Relationship
Profile Registration Profile	DMTF	1.0	References



## 6. Description

The Dell System Info Profile describes platform's basic properties. The host system's information is represented by an instance of DCIM\_SystemView class.

Figure 1 details the class diagram of the Dell System Info Profile.



**Figure 1. Class Diagram**

Figure 2 details typical Dell System Info Profile implementation for a platform. In order for client to discover the instrumentation's support of this profile, SystemInfoProfile is instantiated in the Interop Namespace: root/interop. SystemInfoProfile instance describes the information about the implemented profile: most importantly, the name and version of the profile and the organization name that produced the profile.

Systemview1 is the system views representing the platform's basic properties in the Implementation Namespace: root/dcim. It is associated to the Interop namespace's SystemInfoProfile instance.

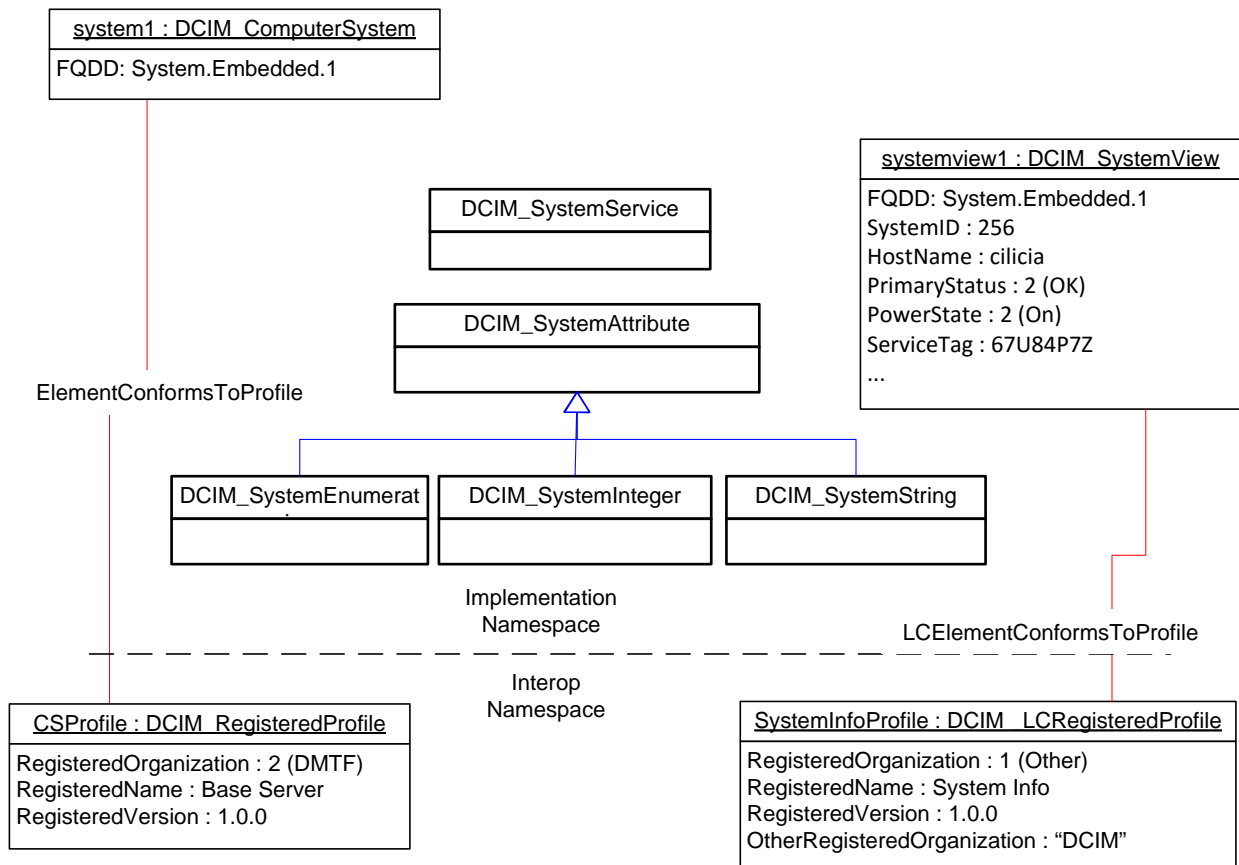


Figure 2. System Info Profile Implementation

## 7. Implementation Description

This section describes the requirements and guidelines for implementing Dell System Info Profile.

Table 2. Class Requirements: System Info Profile

Element Name	Requirement	Description
<b>Classes</b>		
DCIM_SystemView	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.1.
DCIM_HostNetworkInterfaceView	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.2.
DCIM_SystemEnumeration	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.3
DCIM_SystemString	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.4

Element Name	Requirement	Description
DCIM_SystemInteger	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.5
DCIM_SystemManagementService	Mandatory	The class shall be implemented in the <i>Implementation Namespace: root/dcim</i> . See section 7.7.
DCIM_LCElementConformsToProfile	Mandatory	The class shall be implemented in both the Interop Namespace: root/interop and Implementation Namespace: root/dcims. See sections 7.1 and 7.8
DCIM_LCRegisteredProfile	Mandatory	The class shall be implemented in the <i>Interop Namespace: root/interop</i> . See section 7.8
<b>Indications</b>		
None defined in this profile		

## 7.1. DCIM\_SystemView – System View

This section describes the implementation for the DCIM\_SystemView class.

This class shall be instantiated in the Implementation Namespace: root/dcim.

The DCIM\_LCElementConformsToProfile association(s) shall reference the DCIM\_SystemView instance(s).

### 7.1.1. Resource URIs for WinRM®

The class Resource URI shall be “http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemView?\_\_cimnamespace=root/dcim”

The key property shall be the InstanceID.

The instance Resource URI for DCIM\_SystemView instance shall be:

“http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemView?\_\_cimnamespace=root/dcim+InstanceID=System.Embedded.1”

### 7.1.2. Operations

The following table lists the operations implemented on DCIM\_SystemView.

**Table 3.** DCIM\_SystemView – Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI

### 7.1.3. Properties

The following table details the implemented properties for DCIM\_SystemView instance that represents the host system. The “Requirements” column shall denote whether the property is implemented (for requirement definitions, see section 3). The “Additional Requirements” column shall denote either possible values for the property, or requirements on the value formulation.

**Table 4.** DCIM\_SystemView – Properties

Property Name	Requirements	Type	Requirement and Description
InstanceID	Mandatory	string	The property shall be “System.Embedded.1”
FQDD	Mandatory	string	The property shall be “System.Embedded.1”
DeviceDescription	Mandatory	string	A string containing the friendly Fully Qualified Device Description, a property that describes the device and its location
AssetTag	Mandatory	string	Asset tag of the system.
BaseBoardChassisSlot	Optional	String	The property represents the modular chassis slot numbers that the server blade occupies in the modular enclosure. This property shall be represented for modular server blades.
BatteryRollupStatus	Mandatory	uint32	The property shall contain the battery rollup status of all the system components and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error).</li> </ul> This field will be shown as null if the corresponding sensor is not supported BatteryRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.
BIOSReleaseDate	Mandatory	String	String number of the BIOS release date. The date string, if supplied, is in mm/dd/yyyy format.
BIOSVersionString	Mandatory	String	System BIOS version.
BladeGeometry	Optional	uint16	The property shall represent the geometric dimension of the server blade enclosure in modular enclosure described. The property defines value maps for the geometry description in slot height and width. This property shall be represented for modular server blades. <ul style="list-style-type: none"> <li>• 0 – singleWidthHalfHeight</li> <li>• 1 – dualWidthHalfHeight</li> <li>• 2 – singleWidthFullHeight</li> <li>• 3 – dualWidthFullHeight</li> <li>• 4 – singleWidthQuarterHeight</li> <li>• 5 – 1UHalfWidth</li> <li>• 6 – 1UQuarterWidth</li> <li>• 7 – 1UFullWidth</li> <li>• 255 – Not Applicable</li> </ul>
BoardPartNumber	Mandatory	String	The property shall represent the motherboard part number.
BoardSerialNumber	Mandatory	String	The property shall represent the motherboard serial number.
EstimatedSystemAirflow	Mandatory	uint16	The property shall represent estimated airflow over the chassis in Cubic Feet per Minute. A value of 255 would indicate that the value is Not Applicable.
EstimatedExhaustTemperature	Mandatory	uint16	Calculated, not measure, exhaust temperature in Degree Celsius. A value of 255 would indicate that the value is Not Applicable.

Property Name	Requirements	Type	Requirement and Description
ChassisName	Mandatory	String	The property shall be “Main System Chassis” for monolithic and “Server Blade” for modular server blades.
ChassisServiceTag	Optional	String	This property represents the service tag for the modular enclosure chassis. This property shall be represented for modular server blades.
ChassisModel	Optional	String	This property represents the chassis model for the modular enclosure chassis.
ChassisSystemHeight	Mandatory	uint16	The property shall be in U of rack space units. The property shall be applicable only for monolithic server.
CMCIP	Optional	String	This property represents the IP address for the modular enclosure chassis management controller (CMC). This property shall be represented for modular server blades.
CPLDVersion	Mandatory	String	The property shall represent the CPLD version.
CPURollupStatus	Mandatory	uint32	The property shall contain the rollup status of all the CPUs and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> This property will be shown as null if the corresponding sensor is not supported CPURollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.
ExpressServiceCode	Mandatory	String	Express Service Code of the system.
FanRollupStatus	Mandatory	uint32	The property shall contain the fan rollup status of all the system components and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error).</li> </ul> This property will be shown as null if the corresponding sensor is not supported FanRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.
HostName	Mandatory	String	System name string in ASCII.
LicensingRollupStatus	Mandatory	uint32	The property shall contain the licensing rollup status of all the system components and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error).</li> </ul> LicensingRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.

Property Name	Requirements	Type	Requirement and Description
LifecycleControllerVersion	Mandatory	String	The property shall represent the overall product release version for the Lifecycle Controller (LC). The property format shall be M + "." + N + "." + U where: M - the major version (in numeric form); N - the minor version (in numeric form); and U - the update version (in numeric form). NOTE: The property does not represent a particular firmware version that LC consists of but rather the overall LC product version.
Manufacturer	Mandatory	String	System Manufacturer string. For example: DELL Inc.
MaxCPUSockets	Mandatory	uint32	Maximum CPU sockets in the system.
MaxDIMMSlots	Mandatory	uint32	The number of slots or sockets available for memory devices in the system memory array.
MaxPCleSlots	Mandatory	uint32	Maximum PCIe slots in the system.
MemoryOperationMode	Mandatory	String	System memory operation mode. Denotes the mode of operation for system memory such as mirrored, advanced ECC, or optimized mode.
Model	Mandatory	String	Model of the system. For example: PowerEdge R720.
PlatformGUID	Mandatory	String	System GUID uniquely identifies the system. The property is also known as BIOS GUID. This GUID matches in value with the representation of the GUID surfaced through OS based GUI and SNMP.
PopulatedCPUSockets	Mandatory	uint32	Populated CPU sockets in the system.
PopulatedDIMMSlots	Mandatory	uint32	System memory sockets current capacity.
PopulatedPCleSlots	Mandatory	uint32	Populated PCIe slots in the system.
PowerCap	Mandatory	Uint32	The current power cap (in Watts) of the associated managed system element.
PowerCapEnabledState	Mandatory	uint16	Whether the cap on the power consumption is enabled.
PowerState	Mandatory	uint16	The current power state of the system.

Property Name	Requirements	Type	Requirement and Description
PrimaryStatus	Mandatory	uint32	<p>The property shall contain current information on the system health state excluding storage sub-systems. PrimaryStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p> <p>The property shall contain the rollup status of the system components including BIOS sensors, Storage Cables: SAS cable, Signal cables and power cables, Riser card mismatch, Mezz card mismatch, Mezz card missing, Riser missing, Internal Drive and sensor events, and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>On clearing the SEL, the property will return value 1(OK)</p> <p>This property will be shown as null if the corresponding sensor is not supported</p>
PSRollupStatus	Mandatory	uint32	<p>The property shall contain the power supply rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>PSRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
RollupStatus	Mandatory	uint32	<p>The property shall contain the rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>RollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
ServerAllocation	Optional	uint32	<p>The property shall represent the power allocated by Chassis Manager to the blade server in Watt.</p> <p>This property shall be represented for modular server blades.</p>
ServiceTag	Mandatory	String	Service tag of the system.
IsOEMBranded	Mandatory	Uint8	This property is used to identify whether the system is OEM branded or not. Possible values are 1 True or 0 False

Property Name	Requirements	Type	Requirement and Description
smbiosGUID	Mandatory	String	System GUID uniquely identifies the system. The property is also known as BIOS GUID. The smbios GUID value matches exactly the SMBIOS representation of the GUID.
StorageRollupStatus	Mandatory	uint32	The property shall contain the storage rollup status of all the system components and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> StorageRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.
SysMemErrorMethodology	Mandatory	uint16	The primary hardware error correction or detection method supported by the system's memory array.
SysMemFailOverState	Mandatory	String	System memory fail over state.
SysMemLocation	Mandatory	uint16	The physical location of the memory array, whether on the system board or an add-in board.
SysMemPrimaryStatus	Mandatory	uint32	SystemMemoryPrimaryStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status for the system memory.
SysMemTotalSize	Mandatory	uint32	The property shall be in Mbytes. The maximum memory capacity in MB.
SysMemMaxCapacitySize	Mandatory	Uint64	The property shall be in Mbytes. The maximum memory capacity in MB that could be installed on the platform. Note that this property represents the sum of totals for the possible memory that could be installed in each slot regardless of currently installed memory capacity.
SystemID	Mandatory	uint32	System ID describes the model of the system in integer value. The SystemID property is usually used to identify the compatibility of the updateable software/firmware.
SystemRevision	Mandatory	uint16	System Revision describes whether the platform was the first or second revision of the corresponding model. The revisions are usually correlated with an upgrade of the CPU model in the same platform model.
TempRollupStatus	Mandatory	uint32	The property shall contain the temperature rollup status of all the system components and shall contain one of the following values: <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> This property will be shown as null if the corresponding sensor is not supported. TempRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.



Property Name	Requirements	Type	Requirement and Description
UUID	Mandatory	String	<p>UUID uniquely identifies the system. The property is also known as BIOS GUID.</p> <p>The UUID value matches the WMI® representation of the UUID/GUID.</p>
VoltRollupStatus	Mandatory	uint32	<p>The property shall contain the voltage rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>VoltRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
LastSystemInventoryTime	Mandatory	String	<p>This property provides the last time "System Inventory Collection On Reboot(CSIOR)" was performed. The value is represented as yyyyymmddHHMMSS.</p>
LastUpdateTime	Mandatory	String	<p>This property provides the last time the data was updated. The value is represented as yyyyymmddHHMMSS</p>
IDSDMRollupStatus	Mandatory	Uint32	<p>IDSDMRollupStatus provides the live status of IDSDM (Internal Dual SD Mode) sensors</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p>
IntrusionRollupStatus	Mandatory	Uint32	<p>IntrusionRollupStatus provides the live status of chassis intrusion sensors</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p>
CurrentRollupStatus	Mandatory	uint32	<p>The property shall contain the current rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>CurrentRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>

Property Name	Requirements	Type	Requirement and Description
MemoryRollupStatus	Mandatory	uint32	<p>The property shall contain the memory rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>MemoryRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
SDCardRollupStatus	Mandatory	uint32	<p>The property shall contain the SD card rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>SDCardRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
TempStatisticsRollupStatus	Mandatory	uint32	<p>The property shall contain temperature statistics rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>This property will be shown as null if the corresponding sensor is not supported.</p> <p>TempStatisticsRollupStatus provides a high level status value, intended to align with Red-Yellow-Green type representation of status.</p>
SystemGeneration	Mandatory	String	The generation of the platform
NodeID	Mandatory	String	Unique property of blade based on service tag
SELRollupStatus	Mandatory	uint32	<p>The property shall contain the SEL rollup status of all the system components and shall contain one of the following values:</p> <ul style="list-style-type: none"> <li>• 0 – (Unknown)</li> <li>• 1 – (OK)</li> <li>• 2 – (Degraded)</li> <li>• 3 – (Error)</li> </ul> <p>"SELRollupStatus" provides live status of SEL.</p>

Note: "Memory Operation mode is shown as Unknown for UDIMM since it is not supported".

## 7.2. DCIM\_HostNetworkInterfaceView – NetworkInterface View

This section describes the implementation for the DCIM\_HostNetworkInterfaceView class.

This class shall be instantiated in the Implementation Namespace: root/dcim.

### 7.2.1. Resource URIs for WinRM®

The class Resource URI shall be “http://schemas.dmtf.org/wbem/wscim/1/cim-schema/2/DCIM\_HostNetworkInterfaceView?\_\_cimnamespace=root/dcim”

The key property shall be the InstanceID.

The instance Resource URI for DCIM\_SystemView instance shall be:

“http://schemas.dmtf.org/wbem/wscim/1/cim-schema/2/DCIM\_HostNetworkInterfaceView?\_\_cimnamespace=root/dcim+InstanceID=System.Embedded.1”

### 7.2.2. Operations

The following table lists the operations implemented on DCIM\_HostNetworkInterfaceView.

**Table 5.** DCIM\_HostNetworkInterfaceView – Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI

### 7.2.3. Properties

The following table details the implemented properties for DCIM\_HostNetworkInterfaceView instance that represents the host system. The “Requirements” column shall denote whether the property is implemented (for requirement definitions, see section 3). The “Additional Requirements” column shall denote either possible values for the property, or requirements on the value formulation.

**Table 6.** DCIM\_HostNetworkInterfaceView – Properties

Property Name	Requirements	Type	Requirement and Description
InstanceID	Mandatory	String	Unique value representing one IP address.
DeviceFQDD	Optional	String[]	List of Fully Qualified Device Description for the Network Device
DeviceDescription	Mandatory	String	Interface description
Status	Mandatory	Uint8	Status of the Interface <ul style="list-style-type: none"><li>• Up</li><li>• down</li><li>• Testing</li><li>• Unknown</li><li>• Dormant</li><li>• Not Present</li><li>• Lower layer down</li></ul>

Property Name	Requirements	Type	Requirement and Description
Type	Mandatory	Uint8	Type of Interface <ul style="list-style-type: none"> <li>• Other</li> <li>• Ethernet</li> <li>• Tokenring</li> <li>• Point-To-Point</li> <li>• Loopback</li> <li>• ATM</li> <li>• IEEE80211 Wireless</li> <li>• Tunnel</li> <li>• IEEE1394 Firewire</li> </ul>
Name	Mandatory	string	Name of the Interface
DHCPEnabled	Mandatory	Boolean	This property states whether DHCP is enabled or not <ul style="list-style-type: none"> <li>• No</li> <li>• Yes</li> </ul>
MACAddress	Mandatory	String	A string containing the MAC address.
IPv4DNSServer	Optional	String[]	List of IPv4 DNS Servers present
IPv4Gateway	Optional	String[]	Array of IPv4 Gateway addresses
IPv4DHCPserver	Optional	String	DHCP Server for IPv4 addressing
IPv4Address	Optional	String[]	Host IPv4 Address
IPv4SubnetMask	Optional	String[]	Host Network's Mask. Only valid for IPv4 addresses.
IPv6Address	Optional	String[]	Host IPv6 Address
IPv6Gateway	Optional	String[]	Array of IPv6 Gateway addresses
IPv6DHCPserver	Optional	String	DHCP Server for IPv6 addressing
IPv6PrefixLength	Optional	Uint8	IPV6 Link Local Prefix Length. Only valid for IPv6 addresses.
IPv6AddrScope	Optional	Uint32	Array of IPv6 address scope (Per IPv6 address)
IPv6DNSServer	Optional	String[]	List of IPv6 DNS Servers present

### 7.3. DCIM\_SystemEnumeration – System Enumeration Attributes

This section describes the implementation for the DCIM\_SystemEnumeration class.

Each DCIM\_SystemEnumeration instance is logically associated to a DCIM\_SystemView instance, where the DCIM\_SystemEnumeration.FQDD property is equal to the FQDD property on the DCIM\_SystemView instance.

This class shall be instantiated in the Implementation Namespace: root/dcim.

#### 7.3.1. Resource URIs for WinRM®

The class Resource URI shall be “http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemEnumeration?\_\_cimnamespace=root/dcim”

The key property shall be the InstanceID.

The instance Resource URI for DCIM\_SystemEnumeration instance shall be:

“http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemEnumeration?\_\_cimnamespace=root/dcim+InstanceID= <FQDD>:<AttributeName>”

### 7.3.2. Operations

The following table lists the operations implemented on DCIM\_SystemEnumeration.

**Table 7.** DCIM\_SystemEnumeration – Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI
DCIM_SystemManagementService.SetAttribute()	Mandatory	See section 8.1
DCIM_SystemManagementService.SetAttributes()	Mandatory	See section 8.2

### 7.3.3. Class Properties

The following table lists the implemented properties for DCIM\_SystemEnumeration instance representing a system attribute. The “Requirements” column shall denote whether the property is implemented (for requirement definitions, see section 3). The “Additional Requirements” column shall denote either possible values for the property, or requirements on the value formulation..

**Table 8.** Class: DCIM\_SystemEnumeration

Properties	Requirements	Type	Additional Requirements
InstanceID	Mandatory	String	The property value shall be formed as follows: “System.Embedded.1:<AttributeName property value>”.
AttributeName	Mandatory	String	The property value shall be from the “AttributeName” column in Table 11 and Table 16.
AttributeDisplayName	Mandatory	String	The property value shall be from the “AttributeDisplayName” column in Table 11 and Table 16.
GroupID	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.
GroupDisplayName	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.
CurrentValue[]	Mandatory	String	The property value shall be one of the values in the “PossibleValues” column at the corresponding row in Table 11 and Table 16.
DefaultValue[]	Mandatory	String	The property value shall be one of the values in the “PossibleValues” column at the corresponding row in Table 11 and Table 16.
PendingValue[]	Mandatory	String	The property value shall be one of the values in the “PossibleValues” column at the corresponding row in Table 11 and Table 16.
IsReadOnly	Mandatory	Boolean	The property value shall be from the “IsReadOnly” column in Table 11 and Table 16.
FQDD	Mandatory	String	The property shall be set to “System.Embedded.1”.
DisplayOrder	Optional	uint16	The property shall represent the sequence number denoting the preferred placement of the attribute in the list of all system attributes.
Dependency	Optional	String	The property shall be NULL.

Properties	Requirements	Type	Additional Requirements
PossibleValues[]	Mandatory	String	The property value shall be equal to the array of the values in “PossibleValues” column at the corresponding row in Table 11 and Table 16.

## 7.4. DCIM\_SystemString – System String Attributes

This section describes the implementation for the DCIM\_SystemString class that represents a string type System attribute.

This class shall be instantiated in the Implementation Namespace: root/dcim.

### 7.4.1. Resource URIs for WinRM®

The class Resource URI shall be “http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemString?\_\_cimnamespace=root/dcim”

The key property shall be the InstanceID.

The instance Resource URI for DCIM\_SystemString instance shall be:

http://schemas.dell.com/wbem/wscim/1/cim-

schema/2/DCIM\_SystemString?\_\_cimnamespace=root/dcim+InstanceID= System.Embedded.1:<AttributeName>  
(AttributeName comes from Table 8)

### 7.4.2. Operations

The following table lists the operations implemented on DCIM\_SystemString.

**Table 9.** DCIM\_SystemString - Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI
DCIM_SystemManagementService.SetAttribute()	Mandatory	See section 8.1
DCIM_SystemManagementService.SetAttributes()	Mandatory	See section 8.2

### 7.4.3. Class Properties

The following table lists the implemented properties for DCIM\_SystemString instance representing a system string attribute. The “Requirements” column shall denote whether the property is implemented (for requirement definitions, see section 3). The “Additional Requirements” column shall denote either possible values for the property, or requirements on the value formulation

**Table 10.** Class: DCIM\_SystemString

Properties	Requirements	Type	Additional Requirements
InstanceID	Mandatory	String	The property value shall be formed as follows: System.Embedded.1:<AttributeName property value>”.
AttributeName	Mandatory	String	The property value shall be from the “AttributeName” column in Table 13 and Table 15.
AttributeDisplayName	Mandatory	String	The property value shall be from the “AttributeDisplayName” column in Table 13 and Table 15.
GroupID	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.
GroupDisplayName	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.

Properties	Requirements	Type	Additional Requirements
CurrentValue[]	Mandatory	String	The property value shall represent the current value of the attribute.
DefaultValue[]	Mandatory	String	The property value shall represent the default value of the attribute.
PendingValue[]	Mandatory	String	The property value shall represent the pending value of the attribute. If the property value is NULL, then the attribute has no pending value.
IsReadOnly	Mandatory	Boolean	The property value shall be the value in the “IsReadOnly” column at the corresponding row in Table 12, and Table 14.
FQDD	Mandatory	String	The property shall be set to “System.Embedded.1”.
DisplayOrder	Optional	uint16	The property shall represent the sequence number denoting the preferred placement of the attribute in the list of all system attributes.
Dependency	Optional	String	The property shall be NULL.
MinLength	Mandatory	UInt64	The property value shall be the value in the “MinLength” column at the corresponding row in Table 12, and Table 14.
MaxLength	Mandatory	UInt64	The property value shall be the value in the “MaxLength” column at the corresponding row in Table 12, and Table 14.

## 7.5. DCIM\_SystemInteger – System Integer Attributes

This section describes the implementation for the DCIM\_SystemInteger class.

Each DCIM\_SystemInteger instance is logically associated to a DCIM\_SystemView instance, where the DCIM\_SystemInteger.FQDD property is equal to the FQDD property on the DCIM\_SystemView instance.

This class shall be instantiated in the Implementation Namespace: root/dcim.

### 7.5.1. Resource URIs for WinRM®

The class Resource URI shall be “http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemInteger?\_\_cimnamespace=root/dcim”

The key property shall be the InstanceID.

The instance Resource URI for DCIM\_SystemInteger instance shall be:

“http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemInteger?\_\_cimnamespace=root/dcim+InstanceID= <FQDD>:<AttributeName>”

### 7.5.2. Operations

The following table lists the operations implemented on DCIM\_SystemInteger.

**Table 11.** DCIM\_SystemInteger - Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI
DCIM_SystemManagementService.SetAttribute()	Mandatory	See section 8.1
DCIM_SystemManagementService.SetAttributes()	Mandatory	See section 8.2

### 7.5.3. Class Properties

The following table lists the implemented properties for DCIM\_SystemInteger instance representing a system attribute. The “Requirements” column shall denote whether the property is implemented (for requirement definitions, see section 3). The “Additional Requirements” column shall denote either possible values for the property, or requirements on the value formulation

**Table 12.** Class: DCIM\_SystemInteger

Properties	Requirement	Type	Additional Requirements
InstanceID	Mandatory	String	The property value shall be formed as follows: “System.Embedded.1:<AttributeName property value>”.
AttributeName	Mandatory	String	The property value shall be from the “AttributeName” column in Table 13, Table 15, and Table 17.
AttributeDisplayName	Mandatory	String	The property value shall be from the “AttributeDisplayName” column in Table 13, Table 15, and Table 17.
GroupID	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.
GroupDisplayName	Mandatory	String	See section 7.5.1, 7.5.2, 7.5.3 and 7.5.4.
CurrentValue[]	Mandatory	String	The property value shall represent the current value of the attribute.
DefaultValue[]	Mandatory	String	The property value shall represent the default value of the attribute.
PendingValue[]	Mandatory	String	The property value shall represent the pending value of the attribute. If the property value is NULL, then the attribute has no pending value.
IsReadOnly	Mandatory	Boolean	The property value shall be from the “IsReadOnly” column in Table 13, Table 15, and Table 17.
FQDD	Mandatory	String	The property shall be set to “System.Embedded.1”.
DisplayOrder	Optional	uint16	The property shall represent the sequence number denoting the preferred placement of the attribute in the list of all system attributes.
Dependency	Optional	String	The property shall be NULL.
LowerBound	Mandatory	uint64	The property value shall be from the “LowerBound” column in Table 13, Table 15, and Table 17.
UpperBound	Mandatory	uint64	The property value shall be from the “UpperBound” column in Table 13, Table 15, and Table 17.

## 7.6. System Attributes

This section lists and describes the attributes and their logical grouping.

### 7.6.1. Server Power Attributes

This section describes the attributes for managing system’s power. The attributes are used to set power cap and thresholds, manage power allocation, and redundancy settings.

The GroupID property for the DCIM\_SystemEnumeration, DCIM\_SystemString, and DCIM\_SystemInteger shall be “ServerPwr.1”.



The GroupDisplayName property for the DCIM\_SystemEnumeration, DCIM\_SystemString, and DCIM\_SystemInteger shall be "Server Power".

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each of the column headings correspond to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contain the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 13.** DCIM\_SystemEnumeration Server Power Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues	Description
PowerCapSetting	Power Cap Setting	FALSE	<ul style="list-style-type: none"> <li>• "Disabled"</li> <li>• "Enabled"</li> </ul>	Enable or disable the cap on the system power consumption.
PSRedPolicy	Power Supply Redundancy Policy	FALSE	<ul style="list-style-type: none"> <li>• "N/A"</li> <li>• "Not Redundant"</li> <li>• "AC/Input"</li> <li>• "Redundant"</li> <li>• "PSU Redundant"</li> </ul>	Enables monitoring of the power supply redundancy. NOTE: Power Supply Profile describes the power supply redundancy status based on this attribute value.
PSPFCEnabled	Power Supply PFC Enable	FALSE	<ul style="list-style-type: none"> <li>• "Disabled"</li> <li>• "Enabled"</li> </ul>	Enable or Disable the Power Supply Power Factor Corrector on the system.
PSRapidOn	PSRapidOn	FALSE	<ul style="list-style-type: none"> <li>• "Disabled"</li> <li>• "Enabled"</li> </ul>	Enable or Disable the Power Supply RapidOn
RapidOnPrimary PSU	Rapid on Primary PSU	FALSE	<ul style="list-style-type: none"> <li>• "PSU1"</li> <li>• "PSU2"</li> <li>• "PSU1"</li> <li>• "PSU3"</li> <li>• "PSU2"</li> <li>• "PSU4"</li> </ul>	Enable or Disable the RapidOnPrimary Power Supply Unit.

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 14.** DCIM\_SystemString Server Power Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
ActivePolicyName	Active Power Cap Policy Name	TRUE	0	128	

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading correspond to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 15.** DCIM\_SystemInteger Server Power Attributes

AttributeName	AttributeDisplayName	IsRead Only	Lower Bound	Upper Bound	Remarks
PowerCapValue <sup>1</sup>	Power Cap Value	FALSE			
PowerCapMaxThres <sup>1</sup>	Power Cap Max Threshold	TRUE			This attribute will not be available in C64xx series of platforms

AttributeName	AttributeDisplayName	IsRead Only	Lower Bound	Upper Bound	Remarks
PowerCapMinThres <sup>1</sup>	Power Cap Min Threshold	TRUE			This attribute will not be available in C64xx series of platforms
pciePowerAllocation <sup>1</sup>	PCIe Power Power Allocation	FALSE			
ActivePowerCapVal <sup>1</sup>	Active Power Cap Value	TRUE	0	65535	
ActivePowerCapValBTUhr	Active Power Cap Value in BTU/hr	TRUE	0	65535	
RapidOnPrimSecPSUMask	Rapid on Primary Sec PSU Mask	TRUE			
RapidOnPrimaryPSU	Rapid on Primary PSU	FALSE			

NOTE: 1 – The attributes PendingValue, CurrentValue and DefaultValue are in Watt units.

## 7.6.2. Server Topology Attributes

This section describes the attributes for managing system's topology. The attributes are used to manage location and physical configuration settings.

The GroupID property for the DCIM\_SystemEnumeration, DCIM\_SystemString, and DCIM\_SystemInteger shall be "ServerTopology.1".

The GroupDisplayName property for the DCIM\_SystemEnumeration, DCIM\_SystemString, and DCIM\_SystemInteger shall be "Server Topology".

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 16.** DCIM\_SystemString Server Topology Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
DataCenterName	Data Center Name	FALSE	0	128	
AisleName	Aisle Name	FALSE	0	128	
RackName	Rack Name	FALSE	0	128	
ChassisName	Chassis Name(Modular Only)	TRUE	0	64	
BladeSlotNumInChassis	Blade Slot Num In Chassis(Modular Only)	TRUE	0	64	
RoomName	Room Name	TRUE	0	128	RoomName

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 17.** DCIM\_SystemInteger Server Topology Attributes

AttributeName	AttributeDisplayName	IsReadOnly	LowerBound	UpperBound
RackSlot	Rack Slot	FALSE	1	255
SizeOfManagedSystemInU	Size of Managed System in U	TRUE		

### 7.6.3. LCD Attributes

This section describes the attributes for managing system’s power. The attributes are used to set the system LCD settings.

The GroupID property for the DCIM\_SystemEnumeration and DCIM\_SystemString shall be “LCD.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration and DCIM\_SystemString shall be “LCD”.

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each column heading corresponds to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contains the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 18.** DCIM\_SystemEnumeration LCD Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
Configuration	LCD Configuration	FALSE	<ul style="list-style-type: none"> <li>• User Defined</li> <li>• Model Name</li> <li>• None</li> <li>• iDRAC IPv4 Address</li> <li>• iDRAC MAC Address</li> <li>• OS System Name</li> <li>• Service Tag</li> <li>• IPv6 Address</li> <li>• Ambient Temperature</li> <li>• System Watts</li> <li>• Asset Tag</li> <li>• OEM PM LCD Override</li> </ul>
vConsoleIndication	vConsole Indication	FALSE	<ul style="list-style-type: none"> <li>• Enabled</li> <li>• Disabled</li> </ul>
QualifierTemp	Ambient Temperature Qualifier	FALSE	<ul style="list-style-type: none"> <li>• C</li> <li>• F</li> </ul>
QualifierWatt	System Watt Qualifier	FALSE	<ul style="list-style-type: none"> <li>• Watts</li> <li>• BTU/hr</li> </ul>

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 19.** DCIM\_SystemString LCD Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
CurrentDisplay	Current LCD Display String	TRUE	0	62	
UserDefinedString	User Defined String for LCD	FALSE	0	62	

### 7.6.4. Thermal Configuration Attributes

This section describes the attributes for managing system’s power. The attributes are used to set the system thermal configuration.

The GroupID property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger shall be “ThermalConfig.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger “shall be “Thermal Configuration”.

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each column heading corresponds to a property name on the DCIM\_SystemEnumeration class. The Description column contains the

description for each of the attribute. Each row contains the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 20.** DCIM\_SystemEnumeration Thermal Configuration Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
FreshAirCompliantConfiguration	Fresh Air Compliant Configuration	TRUE	<ul style="list-style-type: none"> <li>• “Not Applicable”</li> <li>• “Yes”</li> <li>• “No”</li> </ul>

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 21.** DCIM\_SystemInteger Thermal Configuration Attributes

AttributeName	AttributeDisplayName	IsReadOnly	LowerBound	UpperBound
EventGenerationInterval	Event Generation Interval	FALSE	0 (disables event generation)	365
CriticalEventGenerationInterval	Critical Event Generation Interval	FALSE	0	365

### 7.6.5. Server OS Attributes

This section describes the attributes for managing system’s operating system. The attributes are used to manage server OS name, OS version and host name.

The GroupID property for the DCIM\_SystemEnumeration, DCIM\_SystemString shall be “ServerOS.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration, DCIM\_SystemString, and DCIM\_SystemInteger shall be “Server Operating System”.

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 22.** DCIM\_SystemString Server OS Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
HostName	Host Name	FALSE	0	62	
OSName	Operating System Name	FALSE	0	62	
OSVersion	Operating System Version	TRUE	0	62	

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 23.** DCIM\_SystemInteger Server OS Attributes

AttributeName	Attribute Description	IsReadOnly	LowerBound	UpperBound
ServerPoweredOnTime	Server Powered On Time Duration	TRUE		

### 7.6.6. Thermal Settings Attributes

This section describes the attributes for setting the manageable system’s power. The attributes are used to set the system thermal Settings.

The GroupID property for the DCIM\_SystemEnumeration shall be “ThermalSettings.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration shall be “Thermal Settings”.

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each column heading corresponds to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contains the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 24.** DCIM\_SystemEnumeration Thermal Settings Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
ThermalProfile	Thermal Profile	FALSE	<ul style="list-style-type: none"> <li>• Auto</li> <li>• Maximum performance</li> <li>• Minimum power</li> </ul>
AirExhaustTemp	Average Air Exhaust Temperature	FALSE	70,40,45,50,55,60,65
FanSpeedOffset	Fan Speed Offset	FALSE	<ul style="list-style-type: none"> <li>• None</li> <li>• Low Fan Speed</li> <li>• High Fan Speed</li> <li>• Medium Fan Speed</li> <li>• Max Fan Speed</li> </ul>
BaseAlgorithhm	Base Algorithm	FALSE	
ThirdPartyPCIFanResponse	Fan Speed Response for Third-Party PCI Cards	FALSE	<ul style="list-style-type: none"> <li>• "Disabled"</li> <li>• "Enabled"</li> </ul>

**Table 25.** DCIM\_SystemInteger Thermal Settings Attributes

AttributeName	AttributeDisplayName	IsReadOnly	LowerBound	UpperBound
MinimumFanSpeed	Minimum Fan Speed	FALSE	0	65535
MFSMinimumLimit	MFS Minimum Limit	TRUE		
MFSMaximumLimit	MFS Maximum Limit	TRUE		
FanSpeedLowOffsetVal	Fan Speed Low Offset Value	TRUE		
FanSpeedMediumOffsetVal	Fan Speed Medium Offset Value	TRUE		
FanSpeedHighOffsetVal	Fan Speed High Offset Value	TRUE		
FanSpeedMaxOffsetVal	Fan Speed Max Offset Value	TRUE		

### 7.6.7. Quick Sync Attributes

This section describes the attributes for managing system's quick sync. The attributes are used to set Quick Sync Access, Quick Sync Presence, Quick Sync Inactivity Timer Enable and Quick Sync Inactivity Timeout.

The GroupID property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger shall be "QuickSync.1".

The GroupDisplayName property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger shall be "Quick Sync".

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each of the column headings correspond to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contain the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 26.** DCIM\_SystemEnumeration Sync Quick Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues	Description
Access	Quick Sync Access	FALSE	<ul style="list-style-type: none"> <li>Disabled</li> <li>Read- Only</li> <li>Read-Write</li> </ul> Note: The default value is "Read Write"	Represents the configuration of Quick Sync feature.
Presence	Quick Sync Presence	TRUE	<ul style="list-style-type: none"> <li>Not Supported</li> <li>Absent</li> <li>Present</li> </ul>	Represents whether the Quick Sync feature is present or not
InactivityTimerEnable	Quick Sync Inactivity Timer Enable	FALSE	<ul style="list-style-type: none"> <li>Enabled</li> <li>Disabled</li> </ul> Note: The default value is "Enable".	Represents enabling or disabling the Inactivity Timer.
WifiEnable	Quick Sync WiFi	FALSE	<ul style="list-style-type: none"> <li>0 – Disabled</li> <li>1 – Enabled</li> </ul> Default: Enabled	Represent whether the quick sync Wi-Fi is enabled or not.
ReadAuthentication	Quick Sync Read Authentication	FALSE	<ul style="list-style-type: none"> <li>0 – Disabled</li> <li>1 – Enabled</li> </ul> Default: Enabled	Represents whether the quick sync read authentication is enabled or not

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 27.** DCIM\_SystemInteger Sync Quick Attributes

AttributeName	AttributeDisplayName	IsReadOnly	LowerBound	UpperBound
InactivityTimeout	Quick Sync Inactivity Timeout value.	FALSE	15 Note: The default value is "120". Default has changed from "30" to "120" from version 2.x.x to 3.x.x	3600

### 7.6.8. Backplane SGPIO Mode Attributes

This section describes the attributes for backplane operating mode. The attributes are used to read the current bus mode of backplane.

The GroupID property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger shall be "Backplane.1".

The GroupDisplayName property for the DCIM\_SystemEnumeration and DCIM\_SystemInteger shall be "BackplaneBusMode".

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each of the column headings correspond to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contain the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 28.** DCIM\_SystemEnumeration Backplane SGPIO Mode Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues	Description
BackplaneBusMode	BackplaneBusMode	TRUE	"Unknown","I2C","SGPIO"	Represents the current busmode of BackPlane

### 7.6.9. Diagnostics Attributes

This section describes the attributes for diagnostics. The attribute(s) can be used to view the OS App Collection Time.

The GroupID property for the DCIM\_SystemString shall be “Diagnostics.1”.

The GroupDisplayName property for the DCIM\_SystemString shall be “Server Information”.

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 29.** DCIM\_SystemString Diagnostic Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
OSAppCollectionTime	OS App Collection Time	TRUE	0	64	

### 7.6.10. Chassis Control Attributes

This section describes the attributes related to Chassis Control.

The GroupID property for the DCIM\_SystemEnumeration shall be “ChassisControl.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration shall be “Chassis Control”.

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each column heading corresponds to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contains the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 30.** DCIM\_SystemEnumeration Chassis Control Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
ChassisManagementMonitoring	Chassis Management and Monitoring	FALSE	<ul style="list-style-type: none"> <li>• Disabled</li> <li>• Enabled</li> </ul>
ChassisManagementatServer	Chassis Management at Server	TRUE	<ul style="list-style-type: none"> <li>• None</li> <li>• Monitor</li> <li>• Manage and Monitor</li> </ul>

### 7.6.11. Chassis PowerState Attributes

This section describes the attributes related to Chassis PowerState.

The GroupID property for the DCIM\_SystemEnumeration shall be “ChassisPwrState.1”.

The GroupDisplayName property for the DCIM\_SystemEnumeration shall be “ChassisPowerstate”.

The following table lists the values for the DCIM\_SystemEnumeration of this group. Each column heading corresponds to a property name on the DCIM\_SystemEnumeration class. The Description column contains the description for each of the attribute. Each row contains the values for the properties listed in the column headings. The PossibleValues property is an array property represented in the table as comma delimited list.

**Table 31.** DCIM\_SystemEnumeration Chassis Control Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
ChassisLEDState	Chassis LED State	FALSE	<ul style="list-style-type: none"> <li>• Unknown</li> <li>• Blinking</li> <li>• Off</li> </ul>

## 7.6.12. Chassis SC-BMC Attributes

This section describes the attributes for cosmos platform. The attributes are chassisServiceTag, ChassisPowerCap and ChassisInfraPowerCap.

The GroupID property for the DCIM\_SystemInteger, DCIM\_SystemString shall be “SC-BMC.1”.

The GroupDisplayName property for the DCIM\_SystemString, and DCIM\_SystemInteger shall be “SC-BMC”.

The following table lists the values for the DCIM\_SystemString of this group. Each column heading corresponds to a property name on the DCIM\_SystemString class. The Value Expression column contains constraints on string value formulation. Each row contains the values for the properties listed in the column headings.

**Table 32.** DCIM\_SystemString Chassis SC-BMC Attributes

AttributeName	Attribute Description	IsReadOnly	MinLength	MaxLength	Value Expression
ChassisServiceTag	Chassis Service Tag	FALSE	0	64	

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings.

**Table 33.** DCIM\_SystemInteger Chassis SC-BMC Attributes

AttributeName	Attribute Description	IsReadOnly	LowerBound	UpperBound
ChassisInfraPower	Chassis Infra Power	FALSE	0	2400
ChassisPowerCap	Chassis Power Cap	FALSE	0	2400

## 7.6.13. Storage attributes

This section describes the attributes related to storage group.

The GroupID property for the DCIM\_SystemInteger shall be “Storage.1”.

The GroupDisplayName property for the DCIM\_SystemInteger shall be “Storage”.

The following table lists the values for the DCIM\_SystemInteger of this group. Each column heading corresponds to a property name on the DCIM\_SystemInteger class. Each row contains the values for the properties listed in the column headings

**Table 34.** DCIM\_SystemInteger Storage Attributes

AttributeName	AttributeDisplayName	IsReadOnly	PossibleValues
RemainingRatedWriteEnduranceAlertThreshold	RemainingRatedWriteEnduranceAlertThreshold	FALSE	99%,...1% Default = 10%
AvailableSpareAlertThreshold	AvailableSpareAlertThreshold	FALSE	99%,...1% Default = 10%

## 7.7. DCIM\_SystemManagementService – System Management Service

This section describes the implementation for the DCIM\_SystemManagementService class.

This class shall be instantiated in the Implementation Namespace: root/dcim.

### 7.7.1. Resource URIs

The class Resource URI shall be “http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_SystemManagementService?\_\_cimnamespace=root/dcim”

The key property shall be the SystemCreationClassName, SystemName, CreationClassName, and Name.



The instance Resource URI for DCIM\_SystemManagementService instance shall be:

"http://schemas.dell.com/wbem/wscim/1/cim-

schema/2/DCIM\_SystemManagementService?\_\_cimnamespace=root/dcim+

SystemCreationClassName=DCIM\_ComputerSystem+SystemName=srv:system+CreationClassName=DCIM\_SystemManagementService+Name=DCIM:SystemManagementService"

## 7.7.2. Operations

The following table lists the operations implemented on DCIM\_SystemManagementService.

**Table 35.** DCIM\_SystemManagementService - Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI
Invoke	Mandatory	Instance URI
DCIM_SystemManagementService.SetAttribute()	Mandatory	See section 8.1
DCIM_SystemManagementService.SetAttributes()	Mandatory	See section 8.2
DCIM_SystemManagementService.CreateTargetedConfigJob()	Mandatory	See section 8.3
DCIM_SystemManagementService.DeletePendingConfiguration()	Mandatory	See section 8.4
DCIM_SystemManagementService.ShowErrorsOnLCD()	Mandatory	See section 8.5
DCIM_SystemManagementService.IdentifyChassis()	Mandatory	See section 8.6

## 7.7.3. Properties

The following table lists the implemented properties for DCIM\_SystemManagementService instance representing system management service in a system. The "Requirements" column shall denote whether the property is implemented (for requirement definitions, see section 3). The "Additional Requirements" column shall denote either possible values for the property, or requirements on the value formulation.

**Table 36.** DCIM\_SystemManagementService- Properties

Property Name	Requirements	Description/Additional Requirement
SystemCreationClassName	Mandatory	The property value shall be "DCIM_ComputerSystem".
CreationClassName	Mandatory	The property value shall be "DCIM_SystemManagementService".
SystemName	Mandatory	The property value shall be "srv:system".
Name	Mandatory	This property shall have a value of "DCIM:SystemManagementService"
ElementName	Mandatory	The property value shall be "System Management Service".

## 7.8. System Info Profile Registration

This section describes the implementation for the DCIM\_LCRegisteredProfile class.

This class shall be instantiated in the Interop Namespace: root/interop.

The DCIM\_ElementConformsToProfile association(s) shall reference the DCIM\_LCRegisteredProfile instance.

### 7.8.1. Resource URIs for WinRM®

The class Resource URI shall be "http://schemas.dmtf.org/wbem/wscim/1/cim-schema/2/CIM\_RegisteredProfile?\_\_cimnamespace=root/interop"

The key property shall be the InstanceID property.

The instance Resource URI shall be: "http://schemas.dell.com/wbem/wscim/1/cim-schema/2/DCIM\_LCRegisteredProfile?\_cimnamespace=root/interop+InstanceID=DCIM: SystemInfo:1.0.0"

## 7.8.2. Operations

The following table lists the operations implemented on for DCIM\_LCRegisteredProfile.

**Table 37.** DCIM\_LCRegisteredProfile - Operations

Operation Name	Requirements	Required Input
Get	Mandatory	Instance URI
Enumerate	Mandatory	Class URI

## 7.8.3. Properties

The following table lists the implemented properties for DCIM\_LCRegisteredProfile instance representing System Info Profile implementation. The "Requirements" column shall denote whether the property is implemented (for requirement definitions, see section 3). The "Additional Requirements" column shall denote either possible values for the property, or requirements on the value formulation

**Table 38.** DCIM\_LCRegisteredProfile

Property Name	Type	Requirement	Additional Requirements
InstanceID	String	Mandatory	DCIM:SystemInfo:1.0.0
RegisteredName	String	Mandatory	This property shall have the value "System Info".
RegisteredVersion	String	Mandatory	This property shall have the value "1.4.0".
RegisteredOrganization	Uint16	Mandatory	This property shall have the value 1 (Other).
OtherRegisteredOrganization	String	Mandatory	The property value shall match "DCIM".
AdvertiseTypes[]	Uint16	Mandatory	The property array shall contain: ["1(Other), 1(Other)"]
AdvertiseTypeDescriptions[]	String	Mandatory	The property array shall contain: "WS-Identify", "Interop Namespace"

# 8. Methods

This section details the requirements for supporting extrinsic methods for the CIM elements defined by this profile.

## 8.1. DCIM\_SystemManagementService.SetAttribute()

The SetAttribute() method is used to set or change the value of a system attribute.

Invocation of the SetAttribute() method shall change the value of the attribute's CurrentValue or attribute's PendingValue property to the value specified by the AttributeValue parameter if the attribute's IsReadOnly property is FALSE. If this method is invoked when the attribute's IsReadOnly property is TRUE, it shall result in no change to the value of the attribute's CurrentValue property. The result of changing this value is described with the SetResult parameter.

Return code values for the SetAttribute() method are specified in Table 39 and parameters are specified in Table 40. Invoking the SetAttribute() method multiple times can result in the earlier requests being overwritten or lost.

**Table 39.** SetAttribute() Method: Return Code Values

Value	Description
0	Completed with no error
2	Failed

**Table 40.** SetAttribute() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	Target	String	Shall be set to "System.Embedded.1"
IN, REQ	AttributeName	String	Shall be the GroupID property value followed by "#" character and then followed by the AttributeName property value for the attribute to be modified. Example: "ServerPwr.1#PowerCapSetting"
IN, REQ	AttributeValue[]	String	Shall contain the desired attribute value. If the value is valid, the CurrentValue or PendingValue property of the specified attribute will be modified.
OUT	SetResult	String	Returns: <ul style="list-style-type: none"> <li>"Set CurrentValue property" when the attributes current value is set.</li> <li>"Set PendingValue property" when the attributes pending value is set.</li> </ul>
OUT	RebootRequired	String	Returns: <ul style="list-style-type: none"> <li>"Yes" if reboot is required,</li> <li>"No" if reboot is not required.</li> </ul>
OUT	MessageID	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry
OUT	Message	String	Error Message
OUT	MessageArguments[]	String	Error MessageArguments

**Table 41.** SetAttribute() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) %s	AttributeName/AttributeValue
SYS004	Invalid parameter value for %s	AttributeName/AttributeValue
SYS005	AttributeName and AttributeValue count mismatch	
SYS006	Cannot set ReadOnly AttributeName %s	AttributeName
SYS007	Input out of range for %s	AttributeName
SYS008	Invalid boolean in AttributeValue for AttributeName %s	AttributeName
SYS009	String exceeds maximum length for AttributeName %s	AttributeName
SYS010	Invalid character in AttributeValue for AttributeName %s	AttributeName
SYS011	Configuration is already committed, cannot set the configuration	
SYS012	User is not authorized to perform this operation	
SYS013	Invalid AttributeName %s	AttributeName
SYS014	Invalid AttributeValue for AttributeName %s	AttributeName
SYS015	Job created	
SYS016	Job completed with errors	

MessageID (OUT parameter)	Message	MessageArguments[]
SYS017	Job failed	
SYS018	Job completed	
SYS019	Required Dependency input not found	
SYS020	Invalid Required Attribute value	
SYS023	No pending configurations	
SYS024	Attribute dependency failed	
JCP017	Maximum job limit reached, cannot create new jobs	
LC062	An instance of Export or Import System Configuration is already running.	

## 8.2. DCIM\_SystemManagementService.SetAttributes()

The SetAttributes() method is used to set or change the values of a group of attributes.

Invocation of the SetAttributes() method shall change the values of the attribute's CurrentValue or PendingValue properties that correspond to the names specified by the AttributeName parameter and the values specified by the AttributeValue parameter if the respective attribute's IsReadOnly property is FALSE.. If this method is invoked when the attribute's IsReadOnly property is TRUE, it shall result in no change to the value of the attribute's CurrentValue property.

Return code values for the SetAttributes() method are specified in Table 42 and parameters are specified in Table 43.

Invoking the SetAttributes() method multiple times can result in the earlier requests being overwritten or lost.

**Table 42.** SetAttributes() Method: Return Code Values

Value	Description
0	Completed with no error
2	Failed

**Table 43.** SetAttributes() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	Target	String	Shall be set to "System.Embedded.1"
IN, REQ	AttributeName[]	String	Shall contain array of attributes where each element shall be the GroupID property value followed by "#" character and then followed by the AttributeName property value for the attribute to be modified. Example: "ServerPwr.1#PowerCapSetting"
IN, REQ	AttributeValue[]	String	Shall contain the desired attribute values. If the value is valid, the CurrentValue or PendingValue property of the specified attribute will be modified. Note: Attributes with multi-element array values shall not be set using this method.
OUT	SetResult[]	String	Returns: "Set CurrentValue property" when the attributes current value is set. "Set PendingValue property" when the attributes pending value is set.

Qualifiers	Name	Type	Description/Values
OUT	RebootRequired[]	String	Returns: "Yes" if reboot is required, "No" if reboot is not required.
OUT	MessageID[]	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry
OUT	Message[]	String	Error Message
OUT	MessageArguments[]	String	Error MessageArguments

**Table 44.** SetAttributes() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The Command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) %s	AttributeName/AttributeValue
SYS004	Invalid parameter value for %s	AttributeName/AttributeValue
SYS005	AttributeName and AttributeValue count mismatch	
SYS006	Cannot set ReadOnly AttributeName %s	AttributeName
SYS007	Input out of range for %s	AttributeName
SYS008	Invalid boolean in AttributeValue for AttributeName %s	AttributeName
SYS009	String exceeds maximum length for AttributeName %s	AttributeName
SYS010	Invalid character in AttributeValue for AttributeName %s	AttributeName
SYS011	Configuration already committed, cannot set configuration	
SYS012	User is not Authorized to perform this operation	
SYS013	Invalid AttributeName %s	AttributeName
SYS014	Invalid AttributeValue for AttributeName %s	AttributeName
SYS015	Job created	
SYS016	Job completed with errors	
SYS017	Job failed	
SYS018	Job completed	
SYS019	Required Dependency input not found	
SYS020	Invalid Required Attribute value	
SYS023	No pending configurations	
SYS024	Attribute dependency failed	
JCP017	Maximum job limit reached, cannot create new jobs	
LC062	An instance of Export or Import System Configuration is already running.	

### 8.3. DCIM\_SystemManagementService.CreateTargetedConfigJob()

The CreateTargetedConfigJob() method is used to apply the pending values created by the SetAttribute, SetAttributes, ChangeBootSourceState, and ChangeBootOrderByInstanceID methods. The successful execution of this method creates a job to apply the pending values.

The CreateTargetedConfigJob() method supports the following optional input parameters:

- **RebootJobType:** When provided in the input parameters, it creates a specific reboot job to “PowerCycle”, “Graceful Reboot without forced shutdown”, or “Graceful Reboot with forced shutdown”. This parameter only creates the RebootJob and does not schedule it.  
NOTE: Many attributes in the profile do not require a reboot job. Thus, it may not be necessary to specify this parameter.
- **ScheduledStartTime:** When provided in the input parameters, schedules the “configuration job” and the optional “reboot job” at the specified start time. A special value of “TIME\_NOW” schedules the job(s) immediately.
- **UntilTime:** This parameter has a dependency on “ScheduledStartTime”, together “ScheduledStartTime” and “UntilTime” define a time window for scheduling the job(s). Once scheduled, jobs will be executed within the time window.

If CreateTargetedConfigJob method is executed without the three optional parameters discussed above, then configuration job is created but not scheduled. However, this configuration job can be scheduled later using the DCIM\_JobService.SetupJobQueue () method from the “Job Control Profile”. DCIM\_JobService.SetupJobQueue () can be executed to schedule several configuration jobs including the reboot job. Refer to “Job Control Profile” for more details.

Return code values for the CreateTargetedConfigJob() method are specified in Table 45 and parameters are specified in Table 46.

Subsequent calls to CreateTargetedConfigJob after the first CreateTargetedConfigJob will result in error until the first job is completed."

**Table 45.** CreateTargetedConfigJob() Method: Return Code Values

Value	Description
2	Failed
4096	Job Created

**Table 46.** CreateTargetedConfigJob() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	Target	String	Shall be set to “System.Embedded.1”
IN	ScheduledStartTime	String	Start time for the job execution in format: yyyyymmddhhmmss. The string "TIME_NOW" means immediate.
IN	UntilTime	String	End time for the job execution in format: yyyyymmddhhmmss. If this parameter is not NULL, then ScheduledStartTime parameter shall also be specified.
OUT	Job	CIM_ConcreteJob REF	Reference to the newly created pending value application job.
OUT	MessageID	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry.
OUT	Message	String	Error Message

Qualifiers	Name	Type	Description/Values
OUT	MessageArguments[]	String	Error MessageArguments

**Table 47.** CreateTargetedConfigJob() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) %s	AttributeName/AttributeValue
SYS004	Invalid parameter value for %s	AttributeName/AttributeValue
SYS005	AttributeName and AttributeValue count mismatch	
SYS006	Cannot set ReadOnly AttributeName %s	AttributeName
SYS007	Input out of range for %s	AttributeName
SYS008	Invalid boolean in AttributeValue for AttributeName %s	AttributeName
SYS009	String exceeds maximum length for AttributeName %s	AttributeName
SYS010	Invalid character in AttributeValue for AttributeName %s	AttributeName
SYS011	Configuration already committed, cannot set configuration	
SYS012	User is not Authorized to perform this operation	
SYS013	Invalid AttributeName %s	AttributeName
SYS014	Invalid AttributeValue for AttributeName %s	AttributeName
SYS015	Job created	
SYS016	Job completed with errors	
SYS017	Job failed	
SYS018	Job completed	
SYS019	Required Dependency input not found	
SYS020	Invalid Required Attribute value	
SYS023	No pending configurations	
SYS024	Attribute dependency failed	
SYS029	Unsupported parameter name <parameter name>	Parameter Name
JCP017	Maximum job limit reached, cannot create new jobs	
LC062	An instance of Export or Import System Configuration is already running.	

## 8.4. DCIM\_SystemManagementService.DeletePendingConfiguration()

The DeletePendingConfiguration() method is used to cancel the pending values created by the SetAttribute and SetAttributes methods. The DeletePendingConfiguration() method cancels the pending configuration changes made before the configuration job is created with CreateTargetedConfigJob(). This method only operates on the pending changes prior to CreateTargetedConfigJob() being called. After the configuration job is created, the pending changes can only be canceled by calling DeleteJobQueue() method in the Job Control profile.

Return code values for the DeletePendingConfiguration() method are specified in Table 48 and parameters are specified in Table 49.

**Table 48.** DeletePendingConfiguration() Method: Return Code Values

Value	Description
0	Completed with no error
2	Failed

**Table 49.** DeletePendingConfiguration() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	Target	String	Shall be equal to "System.Embedded.1"
OUT	MessageID	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry.
OUT	Message	String	Error Message
OUT	MessageArguments[]	String	Error MessageArguments

**Table 50.** DeletePendingConfiguration() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) %s	AttributeName/AttributeValue
SYS004	Invalid parameter value for %s	AttributeName/AttributeValue
SYS005	AttributeName and AttributeValue count mismatch	
SYS006	Cannot set ReadOnly AttributeName %s	AttributeName
SYS007	Input out of range for %s	AttributeName
SYS008	Invalid boolean in AttributeValue for AttributeName %s	AttributeName
SYS009	String exceeds maximum length for AttributeName %s	AttributeName
SYS010	Invalid character in AttributeValue for AttributeName %s	AttributeName
SYS011	Configuration already committed, cannot set configuration	
SYS012	User is not authorized to perform this operation	
SYS013	Invalid AttributeName %s	AttributeName
SYS014	Invalid AttributeValue for AttributeName %s	AttributeName
SYS015	Job created	
SYS016	Job completed with errors	
SYS017	Job failed	
SYS018	Job completed	
SYS019	Required Dependency input not found	
SYS020	Invalid Required Attribute value	
SYS023	No pending configurations	
SYS024	Attribute dependency failed	



MessageID (OUT parameter)	Message	MessageArguments[]
JCP017	Maximum job limit reached, cannot create new jobs	
LC062	An instance of Export or Import System Configuration is already running.	

## 8.5. DCIM\_SystemManagementService.ShowErrorsOnLCD()

The ShowErrorsOnLCD() method is used to hide and unhide LCD Errors.

Return code values for the ShowErrorsOnLCD() method are specified in Table 51 and parameters are specified in Table 52.

**Table 51.** ShowErrorsOnLCD() Method: Return Code Values

Value	Description
0	Completed with no error
2	Failed

**Table 52.** ShowErrorsOnLCD() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	Show	Boolean	Whether to show or hide LCD errors
OUT	MessageID	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry.
OUT	Message	String	Error Message
OUT	MessageArguments[]	String	Error MessageArguments

**Table 53.** ShowErrorsOnLCD() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) <parameter name>	Show
SYS004	Invalid parameter value for <parameter name>	Show
SYS024	Attribute dependency failed	

## 8.6. DCIM\_SystemManagementService.IdentifyChassis()

The IdentifyChassis() method is used to turn on and off LEDs on the chassis in order to identify the system.

Return code values for the IdentifyChassis() method are specified in Table 54 and parameters are specified in Table 55.

**Table 54.** IdentifyChassis() Method: Return Code Values

Value	Description
0	Completed with no error
2	Failed

**Table 55.** IdentifyChassis() Method: Parameters

Qualifiers	Name	Type	Description/Values
IN, REQ	IdentifyState	UInt8	This parameter represents the requested state of the identifying LED. <ul style="list-style-type: none"> <li>• 0 – Disabled</li> <li>• 1 – Enabled</li> <li>• 2 – Time Limited Enabled</li> </ul>
IN	DurationLimit	UInt8	This parameter represents the requested time limit in seconds for identifying chassis before the identifying LED turns back off. The parameter shall be specified and non-NULL, if the IdentifyState parameter has value of 2 – “Time Limited Enabled”.
OUT	MessageID	String	Error Message ID may be used to look-up in the Dell Message registry files. For more information, see Error Message Registry.
OUT	Message	String	Error Message
OUT	MessageArguments[]	String	Error MessageArguments

**Table 56.** IdentifyChassis() Method: Standard Messages

MessageID (OUT parameter)	Message	MessageArguments[]
SYS001	The command was successful	
SYS002	The command failed	
SYS003	Missing parameter(s) <parameter name>	DurationLimit/IdentifyState
SYS004	Invalid parameter value for <parameter name>	Show
SYS024	Attribute dependency failed	

## 9. Use Cases

See Lifecycle Controller (LC) Integration Best Practices Guide.

## 10. CIM Elements

No additional details specified.

## 11. Privilege and License Requirement

The following table describes the privilege and license requirements for the listed operations.

**Table 57.** Privilege and License Requirements

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemEnumeration	LCD.1# Configuration	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# PowerCapSetting	ENUMERATE, GET	Login	LM_POWER_MONITORING
DCIM_SystemEnumeration	ServerPwr.1# PSRedPolicy	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# PSPFCEEnabled	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemEnumeration	ServerPwr.1# PSRapidOn	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# RapidOnPrimaryPSU	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalSettings.1# ThermalProfile	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalSettings.1# AirExhaustTemp	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalSettings.1# FanSpeedOffset	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalConfig.1# FreshAirCompliantConfiguration	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# vConsoleIndication	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# QualifierWatt	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# QualifierTemp	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerInfo.1# AssetTagSetByDCMI	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ChassisInfo.1# ChassisType	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# Presence	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# Access	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# InactivityTimerEnable	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	Backplane.1# BackplaneBusMode	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ChassisControl.1# ChassisManagementMonitoring	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# ReadAuthentication	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# WifiEnable	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# ChassisIdentifyEnable	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemEnumeration	LCD.1# HideErrs	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# ErrorDisplayMode	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# FrontPanelLocking	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# LicenseMsgEnable	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# PSUMismatchOverride	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ChassisPwrState.1# ChassisLEDState	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	LCD.1# NMIResetOverride	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	QuickSync.1# Status	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# PowerBudgetOverride	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	PCleSlotLFM.1# SlotState	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	PCleSlotLFM.1# 3rdPartyCard	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# UnderVoltageCLSTOVERRIDE	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwr.1# OverTemperatureCLSTOVERRIDE	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	PCleSlotLFM.1# LFMMode	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalSettings.1# PCleSlotLFMSupport	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerPwrMon.1# PowerConfigReset	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ChassisControl.1# ChassisManagementatServer	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ServerInfo.1# SledConfig	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	MachineTrust.1# PerformFactoryIdentityCertValidation	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemEnumeration	ThermalSettings.1# AirExhaustTempSupport	ENUMERATE, GET	Login	
DCIM_SystemEnumeration	ThermalSettings.1# SystemCFMSupport	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PowerCapValue	ENUMERATE, GET	Login	LM_POWER_MONITORING
DCIM_SystemInteger	ServerPwr.1# PowerCapMaxThres	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PowerCapMinThres	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# ActivePowerCapVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerTopology.1# RackSlot	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerTopology.1# SizeOfManagedSystemInU	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerOS.1# ServerPoweredOnTime	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# MinimumFanSpeed	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# MFSMinimumLimit	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# MFSMaximumLimit	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# FanSpeedLowOffsetVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# FanSpeedMediumOffsetVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# FanSpeedHighOffsetVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalSettings.1# FanSpeedMaxOffsetVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalConfig.1# EventGenerationInterval	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalConfig.1# CriticalEventGenerationInterval	ENUMERATE, GET	Login	
DCIM_SystemInteger	QuickSync.1# InactivityTimeout	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemInteger	Storage.1# RemainingRatedWriteEnduranceAlertThreshold	ENUMERATE, GET	Login	
DCIM_SystemInteger	Storage.1# AvailableSpareAlertThreshold	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PercGracefulShutdownWarning	ENUMERATE, GET	Login	
DCIM_SystemInteger	Backplane.1# BackplaneSplitMode	ENUMERATE, GET	Login	
DCIM_SystemInteger	LCD.1# ChassisIdentifyDuration	ENUMERATE, GET	Login	
DCIM_SystemInteger	LCD.1# NumberErrsVisible	ENUMERATE, GET	Login	
DCIM_SystemInteger	LCD.1# NumberErrsHidden	ENUMERATE, GET	Login	
DCIM_SystemInteger	ThermalHistorical.1# IntervalInSeconds	ENUMERATE, GET	Login	
DCIM_SystemInteger	SC-BMC.1# ChassisServiceTagLen	ENUMERATE, GET	Login	
DCIM_SystemInteger	SC-BMC.1# ChassisServiceTagSet	ENUMERATE, GET	Login	
DCIM_SystemInteger	SC-BMC.1# ChassisServiceTagCRC	ENUMERATE, GET	Login	
DCIM_SystemInteger	SC-BMC.1# ChassisPowerCap	ENUMERATE, GET	Login	
DCIM_SystemInteger	SC-BMC.1# ChassisInfraPower	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PSUHotSpareWakethreshold	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PSUHotSpareSleepthreshold	ENUMERATE, GET	Login	
DCIM_SystemInteger	PCleSlotLFM.1# MaxLFM	ENUMERATE, GET	Login	
DCIM_SystemInteger	PCleSlotLFM.1# CustomLFM	ENUMERATE, GET	Login	
DCIM_SystemInteger	PowerHistorical.1# IntervalInSeconds	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemInteger	QuickSync.1# AuthFailureCount	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# GpGPUActiveEntries	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# PeakPowerStartTime	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# CumulativePowerStartTime	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# PeakPowerWatts	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# PeakPowerTime	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# PeakCurrentTime	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwrMon.1# AccumulativePower	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# SimComponentVal	ENUMERATE, GET	Login	
DCIM_SystemInteger	ServerPwr.1# PowerAllocated	ENUMERATE, GET	Login	
DCIM_SystemString	LCD.1# CurrentDisplay	ENUMERATE, GET	Login	
DCIM_SystemString	LCD.1# UserDefinedString	ENUMERATE, GET	Login	
DCIM_SystemString	ServerPwr.1# ActivePolicyName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# DataCenterName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# AisleName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# RackName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# ChassisName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# BladeSlotNumInChassis	ENUMERATE, GET	Login	
DCIM_SystemString	ServerOS.1# HostName	ENUMERATE, GET	Login	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_SystemString	ServerOS.1# OSName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerOS.1# OSVersion	ENUMERATE, GET	Login	
DCIM_SystemString	ServerTopology.1# RoomName	ENUMERATE, GET	Login	
DCIM_SystemString	Diagnostics.1# OSAppCollectionTime	ENUMERATE, GET	Login	
DCIM_SystemString	SC-BMC.1# ChassisServiceTag	ENUMERATE, GET	Login	
DCIM_SystemString	ServerInfo.1# AssetTag	ENUMERATE, GET	Login	
DCIM_SystemString	ChassisInfo.1# ChassisModel	ENUMERATE, GET	Login	
DCIM_SystemString	ChassisInfo.1# ChassisServiceTag	ENUMERATE, GET	Login	
DCIM_SystemString	ChassisInfo.1# ChassisName	ENUMERATE, GET	Login	
DCIM_SystemString	ServerInfo.1# ServiceTag	ENUMERATE, GET	Login	
DCIM_SystemString	ServerInfo.1# RChassisServiceTag	ENUMERATE, GET	Login	
DCIM_SystemString	ServerInfo.1# SysAssetTag	ENUMERATE, GET	Login	
DCIM_SystemString	ServerInfo.1# NodeID	ENUMERATE, GET	Login	
DCIM_SystemString	SATAInventory.1# SATAFQDDString	ENUMERATE, GET	Login	
DCIM_SystemString	SATAInventory.1# SlotNumber	ENUMERATE, GET	Login	
DCIM_SystemString	PCleSlotLFM.1# CardType	ENUMERATE, GET	Login	
DCIM_SystemString	PCleSlotLFM.1# TargetLFM	ENUMERATE, GET	Login	
DCIM_SystemString	ServerOS.1# OEMOSVersion	ENUMERATE, GET	Login	



Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# UserDefinedString	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# Configuration	INVOKE	Login, Configure, Configure Users	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PowerCapValue	INVOKE	Login, Configure	LM_POWER_MONITORING
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PowerCapSetting	INVOKE	Login, Configure	LM_POWER_MONITORING
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSRedPolicy	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSPFCEnabled	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSRapidOn	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# RapidOnPrimaryPSU	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerTopology.1# DataCenterName	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerTopology.1# AisleName	INVOKE	Login, Configure	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerTopology.1# RackName	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerTopology.1# RackSlot	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalSettings.1# ThermalProfile	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalSettings.1# AirExhaustTemp	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalSettings.1# FanSpeedOffset	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalSettings.1# MinimumFanSpeed	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalConfig.1# EventGenerationInterval	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalConfig.1# CriticalEventGenerationInterval	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerOS.1# HostName	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerOS.1# OSName	INVOKE	Login, Configure	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerTopology.1# RoomName	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# vConsoleIndication	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# QualifierWatt	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# QualifierTemp	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerInfo.1# AssetTag	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerInfo.1# AssetTagSetByDCMI	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# Access	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# InactivityTimerEnable	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# InactivityTimeout	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ChassisControl.1# ChassisManagementMonitoring	INVOKE	Login, System control	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	Storage.1# RemainingRatedWriteEnduranceAlertThreshold	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	Storage.1# AvailableSpareAlertThreshold	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# ReadAuthentication	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# WifiEnable	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PercGracefulShutdownWarning	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	Backplane.1# BackplaneSplitMode	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# ChassisIdentifyEnable	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# ChassisIdentifyDuration	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# HideErrs	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# ErrorDisplayMode	INVOKE	Login, System control	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# FrontPanelLocking	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# LicenseMsgEnable	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSUMismatchOverride	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalHistorical.1# IntervalInSeconds	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerInfo.1# SysAssetTag	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerInfo.1# NodeID	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ChassisPwrState.1# ChassisLEDState	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	LCD.1# NMIRResetOverride	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SATAInventory.1# SATAFQDDString	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SATAInventory.1# SlotNumber	INVOKE	Login, Configure	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SATAInventory.1# DeviceProp	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SC-BMC.1# ChassisServiceTagLen	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SC-BMC.1# ChassisServiceTagSet	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SC-BMC.1# ChassisServiceTagCRC	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	SC-BMC.1# ChassisPowerCap	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	DIMMInfo.1# LocationMemoryInfo	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSUHotSpareWakethreshold	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PSUHotSpareSleepthreshold	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# PowerBudgetOverride	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	PCISlotLFM.1# CustomLFM	INVOKE	Login, Configure	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	PowerHistorical.1# IntervalInSeconds	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# UnderVoltageCLSTOVERRIDE	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# OverTemperatureCLSTOVERRIDE	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# AuthFailureCount	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	QuickSync.1# AuthFailureTime	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwr.1# GpGPUActiveEntries	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	PCleSlotLFM.1# LFMMode	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ThermalSettings.1# PCleSlotLFMSupport	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerPwrMon.1# PowerConfigReset	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttribute DCIM_Systemmanagement Service.SetAttributes	ServerInfo.1# SledConfig	INVOKE	Login, Configure	

Class and Method	Instance (Group ID. Attribute name)	Operation	Required user privileges	Required License
DCIM_Systemmanagement Service.SetAttribute	ServerPwr.1#	INVOKE	Login, Configure	
DCIM_Systemmanagement Service.SetAttributes	SimComponentVal			
DCIM_Systemmanagement Service.SetAttribute	ServerPwr.1#	INVOKE	Login, System control	
DCIM_Systemmanagement Service.SetAttributes	PowerAllocated			

**Table 58.** Privilege and License Requirements

Class and Method	Operation	User Privilege Required	License Required
DCIM_SystemView	ENUMERATE, GET	Login	None.
DCIM_SystemInteger	ENUMERATE, GET	Login	None.
DCIM_HostNetworkInterfaceView	ENUMERATE, GET	Login	None
DCIM_SystemEnumeration	ENUMERATE, GET	Login	None.
DCIM_SystemString	ENUMERATE, GET	Login	None.
DCIM_System Management Service	ENUMERATE, GET	Login	None.
DCIM_SystemManagementService.SetAttribute()	INVOKE	Login, Configure	LM_POWER_BUDGETING & LM_REMOTE_CONFIGURATION
DCIM_SystemManagementService.SetAttributes()	INVOKE	Login, Configure	LM_POWER_BUDGETING & LM_REMOTE_CONFIGURATION
DCIM_SystemManagementService.CreateTargetedConfigJob()	INVOKE	Login, Configure	LM_REMOTE_CONFIGURATION
DCIM_SystemManagementService.DeletePendingConfiguration()	INVOKE	Login, Configure	LM_REMOTE_CONFIGURATION
DCIM_SystemManagementService.ShowErrorsOnLCD()	INVOKE	Login, System Operations	LM_REMOTE_CONFIGURATION
DCIM_SystemManagementService.IdentifyChassis()	INVOKE	Login, System Operations	LM_REMOTE_CONFIGURATION
DCIM_LCRegisteredProfile	ENUMERATE, GET	Login	None.
DCIM_LCElementConformsToProfile	ENUMERATE, GET	Login	None.

## 12. Change log

Version	Date	Description
4.0.0	20-Jun-2017	Added Chassis related attributes
		Quick Sync attribute update
		Added Storage attributes



	Added Ducati 1.5 Changes:
	Updated Extended health Info
	Updated SystemView with Iso Chassis SC-BMC EMBranded property
	Updated SystemInt and SystemString attributes with hassis SC-BMC Group for COSMOS Platform.
	Updated SystemGeneration and Node ID in DCIM_SystemView
	Updated BladeGeometry details in DCIM_SystemView
	Updated SystemView with IsoEMBranded property
	Updated default value of attribute "InactivityTimeout" under DCIM_SystemInteger class.
	updated privilege and License requirments table for RemainingRatedWriteEnduranceAlertThreshold and AvailableSpareAlertThreshold attributes
	Updated Attribute privileges
	SELRollUpStatus property added to DCIM_SystemView